UiO **Det juridiske fakultet**

Liability for climate-related damage caused by emissions under Norwegian tort law

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1 Introduction

1.1 Topic and research question

This thesis aims to analyse whether limited liability companies may be liable for damage caused by their greenhouse gas emissions under Norwegian tort law. Climate lawsuits based on tort law from various jurisdictions in recent decades will be pointed to, and the question is whether this framework can lead to accountability for large private emission sources in Norway. As Norwegian tort law is based on case law, the existing and future court precedents are crucial in the analysis.

Global attempts to hold corporations legally accountable for emissions based on tort law have mostly been unsuccessful.¹ There are, however, reasons to believe that this might change. Science and public opinion are rapidly evolving, and this new context might provide an opportunity to rethink the interpretation of the tort law system. Climate litigation has become a worldwide trend. Globally, more than 2000 climate change-related cases have been identified.² Around one-quarter of these were filed between 2020 and 2022. Many of these cases are so-called strategic climate litigation initiated to exert bottom-up pressure on governments or corporations. The Shell judgement³ is an excellent example of this. In 2021 a Dutch court ordered the oil and gas company Shell to cut its emissions by 45 per cent by 2030 based on an unwritten code of conduct. This is the first time a limited liability company has been given such a far-reaching mitigation obligation based on tort law. Private liability in the law of torts is becoming a potential means for addressing wrongs which have already been caused or may be caused in the future by global warming.

It is natural to ask oneself what the role of tort law is when dealing with climate change. Given the recent climate litigation trend,⁴ it would not be surprising if Norwegian courts faced this issue. How would they handle such questions? What requirements does case-law based Norwegian tort law put on limited liability companies regarding mitigation? In this thesis, I will answer these questions.

¹ See e.g., American Electric Power Co v Connecticut (2005); California v. General Motors (2009); Kivalina v. ExxonMobil (2009); Comer v Murphy Oil (2012)

² Setzer (2022) p. 1

³ Milieudefensie et al. v. Royal Dutch Shell (2021)

⁴ Luciano Lliuya v. RWE AG (filed 2015); Leghari v. Federation of Pakistan (2018); Milieudefensie et al. v. Royal Dutch Shell (2021)

1.2 Background - climate change

IPCC, an internationally accepted authority on the climate issue, has stated that 'it is unequivocal that human influence has warmed the atmosphere, ocean and land'.⁵ This effect is caused by greenhouse gas emissions generated through human activity and has caused widespread adverse impacts. IPCC has stated with high confidence that human-induced climate change has increased frequency and intensity of climate and weather extremes, including hot extremes on land and in the ocean, heavy participation events, drought and fire weather, wildfires, and sea level rise.⁶ Low-likelihood outcomes such as ice-sheet collapse, abrupt ocean circulation changes, some compound extreme events, and warming substantially larger than the assessed very likely range of future warming cannot be ruled out.⁷ The rise in weather and climate extremes has led to irreversible impacts as natural and human systems are pushed beyond their ability to adapt.⁸

To curb climate change, we must limit the cumulative emissions of greenhouse gases. Because of this, the international community created a temperature goal in the Paris Agreement; to limit global warming to well below 2C and pursue efforts to limit it to 1.5C.⁹ This goal is globally accepted and enjoys strong consensus. All global modelled pathways that limit warming to 1.5 C with no or limited overshoot, and those that limit warming to 2C, involve rapid and deep and, in most cases, immediate greenhouse gas emission reductions in all sectors.¹⁰ To avoid an increase in threat to people, ecosystems and biodiversity, 'urgent, effective and equitable mitigation actions'¹¹ are needed. *Climate change* is a pressing issue that requires action.

⁵ IPCC AR6 Synthesis report Summary for Policymakers (2023) p. 5

⁶ IPCC AR6 WGII Summary for Policymakers (2022) p. 9

⁷ IPCC AR6 WGI The Physical Science Basis (2021) p. 27

⁸ IPCC AR6 WGII Summary for Policymakers (2022) p. 9

⁹ Paris Agreement Art. 2.1 (a)

¹⁰ IPCC AR6 WGIII Mitigation of Climate Change (2022) p. 24

¹¹ Ibid. p. 40

1.3 Relevance of Litigation and non-state Actors

Climate change is a large-scale societal problem. Because of this, the issue has largely been left to states and the field of public law. Several approaches have been tried to deal with the issue in the past decades, both domestically and internationally. The most notable effort has been made by the UN, creating a comprehensive climate regime. This regime, consisting of the UN-FCCC, the Kyoto Protocol and the Paris Agreement, is crucial in today's work against climate change. It brings states together, pledging to mitigate.

Despite the international framework and domestic activity, current ambitions are insufficient to achieve the temperature goal. Even if states fulfil their pledges made under the Paris Agreement, a 2.5-degree increase is expected.¹² States need to do more, and emissions need to be lowered. However, the complexity of the matter makes climate change a wicked problem.¹³ Climate change is global and intergenerational due to its long-term and potentially irreversible effects. It is caused by a wide range of production and consumption processes requiring complex collective action. The problem will only be managed if all states, or the biggest emitters, cooperate in potentially costly, large-scale shifts in their economic and energy systems.¹⁴ Further, the issue of climate change impacts several aspects of a country's national policy, such as energy, agriculture, transportation, and urban planning. It has potentially enormous economic stakes. In addition to the complexity, short-term election cycles compel governments to prioritise immediate concerns. Many countries have little appetite to take costly action now to address seemingly long-term threats.

From an economic point of view, climate harm is considered a negative externality. It is a cost caused by an economic actor that is not suffered by the same actor. Thus, the emitter is often lacking an economic incentive to mitigate. We must find the most efficient way to deal with this, but we are not seeing the kind of collaboration needed on the international scene as regard to climate change. The issue represents an enormous diplomatic puzzle, and the international community struggles to deliver legally binding obligations. Disparities between states in wealth, interests and vulnerabilities lead to different opinions on what would constitute a fair

¹² UN Climate Press release (2022)

¹³ Stang (2015) p. 1

¹⁴ Bodansky (2017) p. 6

outcome. How to handle questions such as historical responsibility, rights of future generations, and fair division of burdens based on current capabilities are pressing. There has been strong reluctance against state liability for loss and damage, which remains one of the most controversial issues.¹⁵

Because of the lack of achievements in the climate work, legal options for enforcing effective action are being considered and applied increasingly. Through climate litigation, the hope is to make the defendants mitigate, adapt, or compensate for losses resulting from climate change. Litigation aimed at governments aims to influence public policy with climate change implications. When politicians are inactive, courts are activated.

Recently, we have seen some groundbreaking examples of successful climate litigation. In 2019 the Dutch supreme court ruled in the Urgenda case that the Dutch government was acting unlawfully in contravention of articles 2 and 8 of European Convention on Human Rights (ECHR) by failing to reduce greenhouse gas emissions by at least 25 per cent by end-2020.¹⁶ Only months after the Urgenda case was filed, the equally momentous Leghari case was announced. According to the Lahore High Court, the government's delay in implementing Pakistan's climate policy breached the country's human rights obligations.¹⁷ At the moment of writing, other significant cases are pending in the European Human Rights Court.¹⁸ The cases are to be dealt with in the grand chamber because the cases raise serious questions affecting the interpretation of the ECHR. The outcome of the cases in ECHR could lead to shock waves throughout Europe. The far-reaching conclusions in the Urgenda and Leghiri cases created momentum. Similar cases emerged in courts in several jurisdictions afterwards. Whether litigation is the way to go and the judge's role in the matter will remain controversial. Separation of powers and the role of the judiciary in the climate change context may be problematic.¹⁹ Despite the controversies concerning litigation, the number of such cases indicates that the movement enjoys great enthusiasm.

¹⁵ Decision 1/CP.21, para. 51explicitly states that Art. 8 in the Paris Agreement shall not provide basis for state liability

¹⁶ Urgenda Foundation v. State of Netherlands (2019)

¹⁷ Leghari v. Federation of Pakistan (2018)

¹⁸ Verein KlimaSeniorinnen Schweiz and Others v. Switzerland (filed 2020); Duarte Aggostinho and Others

v.Portugal and 32 other states (filed 2020)

¹⁹ Colby (2020)

Much of the attention in climate litigation and climate law has been placed on states and intergovernmental organisations. We are, however, dependent on the actions of non-state actors as well if we want to avoid climate disaster. This is especially true when politicians and state actors are acting inadequately. Corporations and other private entities are responsible for a large part of the emissions and enjoy great power. Therefore, initiatives to make private actors do their part, such as the Race to zero campaign²⁰ and the United Nations guiding principles on business and human rights (UNGP),²¹ have arisen. The Paris Agreement also explicitly mentions the role of non-state actors by inviting and welcoming action.²² Common for these initiatives, however, is that they are so-called soft law principles without legally binding obligations. Imposing new legally binding obligations for non-state actors has been challenging and politically controversial. Attempts to create such obligations have been attempted in several countries.²³ Even though we have seen the creation of certain obligations, these frameworks usually need more rules about responsibility and enforcement mechanisms. It is, therefore, limited how effective these frameworks are in making private actors mitigate. Often, companies enjoying a great deal of freedom when it comes to mitigation. When that is the case, many companies are not making the needed commitments to reduce emissions.²⁴

In brief, the world faces a massive and highly complex problem that politicians seemingly cannot handle. On top of this, we are left with a situation where corporations have great power and massive emissions without great responsibility. The need to improve corporate accountability has been debated for years, and the governance gap needs to be covered to meet the climate goals. Therefore, climate law and litigation is hugely relevant. The difficulty in creating new binding mitigation obligations for corporations gives rise to the question of whether existing domestic law imposes obligations for private companies to mitigate. This leads to the question of this thesis; could the Norwegian tort law framework be used to hold companies liable for their emissions?

²⁰ Race to zero (2020)

²¹ UN Guiding Principles on Business and Human Rights

²² Decision 1/CP.21 para. 117 and 118

²³ Åpenhetsloven in Norway. See Prop. 150 L (2020–2021) para. 3.3

²⁴ Dickie (2023)

1.4 Methodology and legal sources

There are certain distinctive features of the methodology worth mentioning. The nature of Norwegian tort law raises particular methodological challenges. First, the rulesets used in this thesis are non-statutory and developed in an interaction between legal practice and theory.²⁵ Thus, these sources will form the primary basis of the analysis. Secondly, tort law is imbued with discretionary assessments, which necessitate an extensive use of considerations of reasonableness. Considerations of reasonableness form an open category where it can be challenging to specify a positive criterion for what is considered relevant. However, considerations such as justice, repair, prevention, pulverization, balancing of interests, and risk allocation are particularly prominent in this area of law. These elements are accompanied by tort law's dynamic character, which means that the understanding can change in line with changing social conditions. The characteristics of tort law make it very flexible and give the interpolator considerable leeway. Therefore, the gap between an acceptable interpretation and the final outcome in a court case can be significant. As long as we lack an authoritative clarification on the research question, it is difficult to draw firm conclusions, and the area is challenging to navigate. This is particularly true when the question concerns climate change, which has clear political implications.

Further, as tort law's applicability to climate change has yet to be tested in Norwegian courts, and the subject is understudied within our jurisdiction, looking to legal opinions from other jurisdictions will be natural. Such reasoning is not given more weight than the value of the argument and is not of precedential value for Norwegian law. It is clear, however, that in Norwegian law, a judge is free to be inspired by high-quality and reasonable argumentation regardless of source.²⁶ Thus, case law, literature, and sources from several other jurisdictions, such as the US, the Netherlands, and international instruments will be drawn on throughout the thesis. International sources are used to better understand the field of law and as an inspiration for Norwegian law; the arguments' persuasive value is of interest. However, I will not undertake a full comparative analysis. Therefore, comparative and international sources will only be used as examples and inspiration unless otherwise stated.

²⁵ Norwegian law includes some codifications in special legislation, see for instance the Act relating to compensation in certain circumstances, Section 2-1

²⁶ Høgberg (2019) p. 269. See e.g., RT-2009-1531, para. 15, where foreign arguments are used

Lastly, every topic that falls within climate law is evolving rapidly. This massive legal development may be methodologically challenging. Existing rules may be outdated, and new sources may be created during the writing of this thesis. Scientific discoveries may also take place. The use of sources which occur after August 2022 will be limited.

1.5 Limitations and Clarifications

In this thesis, the focus will be placed on corporate responsibility from a civil liability perspective and existing tort law rules. Unwritten strict liability and the unwritten duty of care are the two legal grounds that will be examined. When talking about liability for emissions, several perspectives are of interest. It would, however, be far too comprehensive to investigate other possible grounds of liability. Therefore, liability under statutory law will fall outside this thesis's scope.²⁷ The measurement of potential responsibility will not be commented on. The focus will be on whether and to what extent responsibility may occur.

Limited liability companies as legal persons are the subject of this thesis. For the sake of simplicity, these will be referred to as companies throughout the thesis. There has been an exciting development concerning the possible liability for board members, CEOs, or other people in charge of a company's actions. These questions are interesting and closely related to the one at hand. Unfortunately, there is not enough time and space to cover this, as these questions are too broad to be included. The same goes for the possibility of applying injunctive relief in Norwegian tort law.

Given the planetary scope of the climate issue, any policy or measure concerning it will, in some sense, be of international interest. However, it is essential to note that Norwegian law is the subject of this thesis. International sources will be used and mentioned, but this is to understand the Norwegian framework better.

²⁷ Statutory company law does not regulate the company's own liability in Norway, as it might do in other jurisdictions

1.6 Outline and Overview

Chapter two will give an overview of tort law and its use in the climate change field. Both advantages and disadvantages of this field of law will be identified. Chapter three will, as a preliminary step to carrying out a more detailed analysis of the requirements under tort law, consider the building blocks of a potential tort case concerning climate change. Here, I will shortly comment on procedural aspects such as standing, likely actors and the accounting method used when assessing behaviour. As the requirement of relevant damage is relatively easy to fulfil in such a case, this will also be quickly reviewed in this chapter.

In chapters four, five and six, I will analyse the most controversial elements of tort law concerning the climate change issue, grounds of liability and causation. Two possible grounds of liability will be examined: the unwritten strict liability and the unwritten duty of care. These three chapters constitute the main part of the thesis. The aim is to answer whether an actor may be liable for emitting vast amounts of greenhouse gases and whether it is possible to establish causality between his emissions and climate-related damages. These chapters examine the extent to which a claim brought by a plaintiff against a non-state defendant alleging climate-related damage, based on tort law, can be brought, and successfully defended in the Norwegian courts. I will also seek to answer how the courts are likely to act.

Lastly, in chapter seven, I will present some concluding reflections. Here, the analyses will be summarised and held together. The climate change issue is highly political and widely discussed. Action is needed, but is litigation and tort law the right way of dealing with the issue, and what implications would it have?

2 Tort law and climate change

2.1 Applying tort law to the issue

The thought of applying tort law as a tool to get companies to lower their emissions is not new. There is case law from other jurisdictions in the field, and the topic has been widely discussed in the literature internationally.²⁸ In the following chapter, I will point to the positive features of tort law and the motivation for using it. Pursuant to and relying on earlier compensation claims, legal problems concerning climate change liability will be identified. Lastly, I will account for developments in the field and reflect on the legal approach.

Tort law has several positive features for mitigating climate change. The legal construction of tort law already exists all around the world. Unlike the establishment of all other instruments addressing climate change, like international agreements and administrative rules, tort law is a legal instrument that does not need to be created through tedious and time-consuming political procedures.²⁹ In addition, tort law is a generally available instrument for compensation of losses with considerable preventative effect. Through tort law, the cost of damage is moved from the injured party to the one responsible for the damage. The goal is to prevent damage and, where this is not possible, to restore the situation prior to the injury. This notion of justice is one of the main ideas and purposes behind the legal construction of tort law. As noted by van Dam: 'Courts are not simply guided by the formal requirements of liability, but they are also – probably and hopefully ultimately even more strongly – driven by their sense of justice'.³⁰

There are primarily two strong motivators behind the private climate litigation movement. First, the appropriateness of claims. The biggest emitters, especially the Carbon Majors, are as we will see below, responsible for vast amounts of human-made carbon emissions in the atmosphere.³¹ These corporations have profited from their emitting activity while outsourcing the actual cost to others. Considering justice and fairness, it will appear reasonable that those causing and profiting from actions also bear the costs for damages caused by this activity. The corporations that are big emitters, such as those in sectors like energy and transport, could bear collective and legal responsibility for climate change. Fairness and justice are among the ground pillars of tort law, constituting a solid argument in favour of applying tort law to the issue.

²⁸ See e.g., Faure (2012); Weisbacch (2012); Burger (2020)

²⁹ Hinteregger (2017)

³⁰ van Dam (2013) p. 144

³¹ Heede (2014)

Secondly, the potential effectiveness of private litigation based on tort is a motivation behind the movement. Private climate litigation may be the most effective form of litigation. Hsu states: 'Seeking direct civil liability against those responsible for emissions is the only strategy that holds any promise of being a magic bullet'.³² We have yet to witness that civil liability litigation has this tremendous effect. Still, as we recently have seen successful attempts to hold private actors responsible for their emissions, one should not disregard that such litigation may have huge impacts on behaviour. A lawsuit of this kind can serve several purposes; compensation to injured parties, deterrence, regulatory change, and raising awareness. Due to the enormous power corporations hold in today's society, a successful litigation case would have a huge impact. Private entities are essential actors in the efforts to reach a low-carbon society; their role is vital. Not only will a successful strategic case affect the defendant in the specific case, but litigation may also have an enormous ripple effect on the whole corporate sector. By punishing one actor, the whole sector will be taught a lesson. The possibility of being held accountable and the vast financial effects such liability would have on corporations would likely lead to a fundamental change in behaviour. In this regard, it is worth noting that even if a lawsuit of this kind is unsuccessful in the courtroom, proceedings may nevertheless be a powerful means. Due to the massive public attention climate litigation cases receive, proceedings may damage a company's reputation and lead to a shift in public opinion.

2.2 Barriers

Despite the positive features of tort law and the great motivators behind private climate litigation, significant barriers may prevent liability for climate change-related damage. Tort law is primarily meant for situations where one victim is injured by one identifiable actor, whereby the causal link between the known damage suffered by the known victim and the activity of an identifiable injurer is quite clear and not debated. This is not the case for climate-related damages. Because of the special features of the climate change issue, climate change-related damages do not fit into the traditional picture of tort law. This matter has made it challenging to apply tort law to the issue of climate change, and this is illustrated through the earlier failings of private climate litigation lawsuits.

³² Hsu (2008) p. 13

Attempts to hold entities legally accountable for climate-related damages have been made several times, and the question is not simply of theoretical interest. The first endeavours were made in the United States. Some high-profile cases spanned US courts from 2005 to 2015.³³ Most cases were filed against oil, gas, and electric companies, with victims claiming their actions aggravated damages they suffered from extreme weather events. These cases have been referred to as the first wave of private climate litigation.³⁴ Common for the cases is that they argued that the carbon-emitting behaviour of corporations damaged legally protected interests and that this damage, therefore, should be remedied. All the cases were unsuccessful, with both procedural and substantive thresholds standing in the lawsuits' way. Despite being US-law specific, the elements discussed in the cases are central to tort law in several legal systems, including the Norwegian one. Thus, the cases draw up some important lessons and illustrate some of the main obstacles in applying tort law in climate litigation: the non-justiciability of political questions, lack of standing, and lack of causality.

The first issue plaintiffs faced was the non-justiciability of a political question. Several cases in the first wave of litigation, such as California v. General Motors, American Electric Power Co v Connecticut, Comer v Murphy Oil and Kivalina v. ExxonMobil, were all dismissed on this ground. Defendants successfully argued that the questions were more suited to resolution by the political branches of government than by courts. The US has indeed a rigid interpretation of the separation of powers, and this principle is interpreted differently across jurisdictions and in other countries. However, the political domain argument is not limited to the US, as the separation of powers will raise questions about the legitimacy of courts taking on such matters.³⁵ This also includes the recognition that courts may not be suitable to make such decisions, as decisions related to the climate issue must consider complex damages and broad ecological and economic considerations that affect the whole of society.³⁶

Secondly, defendants in the first wave of litigation struggled to gain standing. This procedural requirement presupposes that only parties legally interested in the case may bring a lawsuit

³³ See e.g. California v. General Motors (2009); American Electric Power Co v Connecticut (2005); Kivalina v. ExxonMobil (2009); Comer v Murphy Oil (2012)

³⁴ Ganguly (2018)

³⁵ Colby (2020)

³⁶ Ibid.

and is a general procedural requirement in several jurisdictions. Because of the nature and complexity of climate change, plaintiffs in the first wave struggled with proving that their injury was traceable to the defendant's misconduct and that the courts should redress it. Everyone does contribute to the issue of climate change, and everyone will to some extent, experience its effects. Qualifying as a plaintiff and delineating a defendant's class is, therefore, difficult.

The latter is closely related to the last major barrier plaintiffs in the first wave faced, that of causality. The legal tests and theories to establish causation vary between jurisdictions. However, the principle itself is near universal.³⁷ Causation is both a procedural and material condition in compensation cases. Plaintiffs in the first wave found it almost impossible to establish a link between the defendant's behaviour and the specific damage. In the Kivalina case, the court stated that there was 'no realistic possibility of tracing any particular alleged effect of global warming to any particular emissions by any specific person, entity, (or) group at any particular point in time.'³⁸

The first wave of private climate litigation illustrates that there are significant challenges linked to the use of tort law as a tool to get companies to mitigate. Additionally, as cases were dismissed already at the procedural stage, the substantive requirements in tort law were not properly tested. Further difficulties, which were not made clear during these cases, may therefore arise. For instance, whether there is a basis for liability, which is a question under substantive law, will be highly disputed. Thus, it is clear that bringing a claim under tort law will be challenging and potential plaintiffs face significant barriers. Despite the challenges, however, certain developments have made future cases more likely to gain traction. We will look at this below.

2.3 Contextual development

The political question doctrine, lack of standing, and causation issues led to the failure of the first attempts to hold corporations responsible for emissions. These barriers are, in many

³⁷ Stuart-Smith (2021) p. 6

³⁸ Kivalina v. ExxonMobil (2009)

ways, difficult to overcome. Notwithstanding these barriers, the number of cases being brought indicates that the private climate litigation movement enjoys great enthusiasm and momentum; the second wave of private climate litigation is underway.³⁹ Litigation today looks different from the litigation cases only a few years ago, and the second wave is not doomed to fail. Some exciting developments give future cases better chances of succeeding in the courtroom. As argued by others, the second wave of private climate litigation is based on a broader range of arguments. It is happening in a rapidly evolving scientific, discursive, and constitutional context.⁴⁰ Future plaintiffs will benefit substantially from these developments, and the main barriers to applying tort law to the issue may be easier to overcome. Considering the progress, climate change liability is no longer unimaginable, and the probability of succeeding in court has increased.

The societal context has changed. Today, there is more focus on the climate issue than at the beginning of the century. The contextual development is true both in society as a whole and in the courtrooms. The issue becomes harder to overlook because of the increased visibility of climate change effects and the growing science in the field. In the past years, courts and adjunctive bodies have been unexpectedly encouraging towards plaintiffs. This encouraging attitude has been visible in both public and private climate litigation and can, for instance, be illustrated by the above-mentioned Urgenda,⁴¹ Leghari,⁴² and Shell⁴³ cases. Also worth mentioning in this regard is the Commission on Human Rights of the Philippines' final report on the investigation into corporate responsibility for climate change.⁴⁴ The plaintiffs requested the Philippines Commission on Human Rights to investigate the role of Carbon Majors in causing climate change and ocean acidification. The groundbreaking report found legal ground to hold fossil fuel firms liable for environmental damage. Thus, both states and companies have been held legally responsible for emissions in today's society. This shows the force of today's private litigation movement. Particularly interesting in this regard is the fact

³⁹ See e.g., Luciano Lliuya v. RWE AG (filed 2015); County of San Mateo v Chevron Corp (filed 2017); Guy Abrehams v Commonwealth Bank of Australia (2021); New York v BP plc (filed 2018); Milieudefensie et al. v. Royal Dutch Shell (2021); Commission on Human Rights of the Philippines (2022)
⁴⁰ Granglu (2018) p. 2

⁴¹ Urgenda Foundation v. State of Netherlands (2019)

⁴² Leghari v. Federation of Pakistan (2018)

⁴³ Milieudefensie et al. v. Royal Dutch Shell (2021)

⁴⁴ Commission on Human Rights of the Philippines (2022)

that this is a trend appearing in several jurisdictions, across continents. Climate law has a transnational effect, with actors influencing each other across borders and jurisdictions.

The evolving science helps to explain the shift in context and the court's increased willingness to rule on the issue. Mainly three developments in science are of interest to plaintiffs in liability lawsuits; the growth and consolidation of climate science released by IPCC, the increased possibility of quantifying the proportional contribution of the world's largest emitters to climate change, and developments in attribution science.

2.4 Evolving science

The science behind climate change has never enjoyed as strong a consensus as today. The IPCC reports on the state of the issue and gives a comprehensive assessment of the science. The general causation, which concerns the relationship between the defendant's action and climate change, is easier to establish today because of the growth and consolidation of climate science by IPPC. Not only is the general science of climate change completer and more trusted today, but it has never been as clear. IPPC established that the estimated emissions from existing fossil fuel infrastructure already exceed the remaining carbon budget for limiting warming to 1.5 degrees. Future emissions from planned fossil fuel infrastructure are set to exhaust even the 2-degree carbon budget.⁴⁵ Knowledge of climate change mechanisms, causes and effects is hugely advanced. Dutch courts have, both in the Urgenda case and the Shell case, embraced IPPC assessments as unquestionable evidence of climate change.⁴⁶ This use illustrates the standing of the reports and that courts may rely on IPPC reports establishing general causation.

In addition to the fact that the general science behind climate change enjoys more substantial consensus today, it has also become easier to quantify businesses' historical emissions. As mentioned earlier, it has been extremely difficult to attribute liability for climate change to particular actors. Because of climate change's temporal and global scope, defendants have successfully argued that their emissions neither have a significant impact nor are the direct

⁴⁵ IPCC AR6 WGIII Mitigation of Climate Change (2022) p. 90

⁴⁶ Urgenda Foundation v. State of Netherlands (2019); Milieudefensie et al. v. Royal Dutch Shell (2021)

cause of climate-related damage. Regarding causation, climate change has been viewed as a consequence of collective actions rather than individual activities. This view is also partly why liability has been treated as a political question. In today's scientific context, however, advances have enabled researchers to identify groups responsible for significant contributions to the climate crisis. Science is becoming increasingly more able to measure the influence of each actor.

The climate accountability institute quantifies the historical emissions from a set of Carbon Majors. This measure includes accounting for carbon and methane emissions of the top twenty investor-owned and state-owned oil, gas and coal companies.⁴⁷ In addition, Richard Heed has published peer-reviewed science in which he maps which institutions have been the root cause of global warming.⁴⁸ He concludes that nearly two-thirds of CO2 emitted since the 1750s can be traced to the 90 most significant fossil fuels and cement producers, the so-called Carbon Majors. ⁴⁹ This research eventually became the Carbon Majors Report with an online database.⁵⁰ According to this, one hundred fossil fuel producers are linked to 71 per cent of industrial greenhouse gas emissions since 1988.⁵¹ Most of the actors identified in the research are still operating today. This might be a turning point in holding entities legally accountable for climate change. Now it is possible to quantify the historical emissions and specific contributions from significant carbon emitters.

Attribution science is another scientific development that might lead to a massive change in liability lawsuits. There is no exact definition of the term, but attribution science is often referred to as the field of research which seeks to establish the most likely causes of an event. In the case of climate change, it investigates the effects human activities have on the global system and the link between climate and extreme weather. The aim is to understand how human-induced changes in the concentrations of greenhouse gases affect other climate variables. With this research, it might be possible to determine whether and to what extent an emitter is responsible for specific climate change-related events. Thus, attribution science may be the key to establishing both specific and general causation between an actor's emissions and a

⁴⁷ Climate Accountability Institute (2020)

⁴⁸ Heede (2014)

⁴⁹ Ibid.

⁵⁰ Griffin (2017)

⁵¹ Ibid.

plaintiff's damage. With advanced attribution science, we can create a factual chain which runs from greenhouse gas emissions to global warming, to regional warming, to an impact, and lastly to a specific damage. Recently, there have been advances in attribution science. Today we have a body of research which aims to link entities and activities to specific impacts.⁵² Scientists have made significant progress towards quantifying the effect human activities have on different components of the climate system.⁵³ The prospect of fine-grained attribution is improving, and it is increasingly recognised that the scientific evidence from attribution science serves as an essential basis for identifying causation.

The Carbon Major research and attribution science is already being used in litigation. The quantification of businesses' historical emissions was deployed in the above-mentioned Philippines Reconstruction Movement and Greenpeace Southeast Asia case. This campaign was shaped by the studies on Carbon Majors' attributions. Also, the pending German case, Lliuya v RWE,⁵⁴ takes advantage of the developed science. The specific sum asked for in the lawsuit is equivalent to emissions the research attributes to the company RWE. The court has accepted climate models as valid sources of legal evidence and concluded that whether the actor's emissions are contributing is a question of scientific determination. We still await a ruling in the latter case, but it is nevertheless an exciting development.

Concerning research, however, it is essential to note that the level of uncertainty underpinning the findings and the extent they are subject to scientific debate should decide the weight given to the material. It is important to keep in mind that particularly attribution science is a form of natural science that is relatively new. Many findings are not peer reviewed and some methods are not well known in the scientific community. The findings may also be sensitive to how the research question is framed.

Thus, when applying new research, judges must be mindful and refrain from using flawed information. All relevant information and all plausible alternative explanations for the bad outcome must be articulated when drawing a conclusion about which explanation is more likely in the case. What constitutes relevant information for drawing a scientific conclusion is a matter of scientific judgement. There must be a certain standard to ensure that the expert's

⁵² Burger (2020) p. 69

⁵³ Ibid. p. 77

⁵⁴ Luciano Lliuya v. RWE AG (filed 2015)

testimony is 'scientific knowledge. ' As I will come back to under the discussion of causation, judges should be aware that there are different levels of confidence for different impacts and pay close attention to the evidence submitted. That said, all scientific evidence is subject to uncertainties, and the available science is much more advanced than many of the expert testimonies given in other cases. The scientific developments pointed to are all very suitable for climate litigation.

2.5 Concluding reflections

Over time, the chances of overcoming the hurdles faced in the first wave of private litigation are increasing rapidly. Nevertheless, even with the abovementioned developments, success is not guaranteed in private litigation cases. For tort law to be successfully applied to the issue, courts must use existing rules or case law and provide them with a rather broad interpretation. They might not do that, and despite evolving science, courts may still refrain from ruling in such cases. Many have strong opinions about this topic and strongly oppose the idea of courts holding corporations liable for climate-related damages under tort law. The argument is that tort law is ill-equipped to deal with societal problems at a scale such as climate change. Regulations by the authorities may be more suitable. However, courts have played an essential role in preventing adverse developments in the past and may still in the future.

Legal developments and shifts in the legal mindset often happen rapidly and haphazardly. Such shifts or developments may occur because of pressing issues and the need to deal with them. With climate change being a tremendous challenge, we might see such a shift or development in the judicial society. For inspiration, looking at successful claims against tobacco manufacturers is natural.⁵⁵ It was long doubted that tobacco producers could be held liable, but history showed otherwise. The same shift may happen in the case of climate-related damage as well. We have already seen some groundbreaking rulings which constitute the first steps in this direction, and the willingness of courts to act seems greater. The outcome of cases such as Urgenda and Shell was unthinkable only a few years ago. The possibility that courts will hold corporations liable for climate-related damage in the future cannot be excluded. One thing is at least for sure; there will be many of these kinds of lawsuits in the

⁵⁵ E.g., from the US Cipollone v. Liggett Group (1992); Engle v. Liggett Group (2006)

coming time. Courts will be flooded with these cases, and because of developments, it will be increasingly more difficult to dismiss such claims. As stated by Setzer: 'While it remains unlikely that all plaintiffs will emerge victorious, it is even more improbable that this wave of momentum will leave the law unchanged. '⁵⁶

This chapter has identified some aspects, challenges, and developments of the use of torts in relation to the climate change issue. These findings provide a backdrop for the analysis of Norwegian law. There, the prospects of climate litigation based on tort law in Norway will be discussed.

3 Building blocks for a tort case in Norway

3.1 The Norwegian Context

In this chapter, I will consider the building blocks of a potential tort case concerning climate change. As we have seen in the previous chapters, such cases have been brought in other jurisdictions. This is not the case in Norway, where we have yet to see such a question being dealt with by the courts. Considering climate litigation's important functions, and the international development in the field, it will not be surprising if cases testing the feasibility of tortbased climate litigation are brought here in the future.

Norway has a developed regulatory framework concerning climate change. Under the Paris Agreement, Norway has submitted a goal to cut emissions by 55 per cent by 2030, and in 2017 Norway adopted a climate law.⁵⁷ The law aims to promote the implementation of Norway's climate targets, and specific policies and measures have been put in place. For instance, more than 80 per cent of the emissions in Norway are covered by different fees or the capand-trade system in the EU. In addition to such economic measures, Norway's climate plan includes legal measures and support schemes. The government has expressed that it is determined to cooperate with the EU as soon as their strengthened climate regulations are adopted. More generally, the right to a healthy environment is also sought protected in the Norwegian

⁵⁶ Granglu (2018) p. 28

⁵⁷ Klimaloven

Constitution article 112.⁵⁸ All these measures and actions make Norway appear as one of the most ambitious countries regarding the green transition. Thus, the climate change issue is undoubtedly of interest in Norway. The topic is regularly written about in Norwegian newspapers and is and it is frequently discussed on the political scene.

Despite this, however, the law and policy in Norway have been criticized, and there are calls for strengthened policies.⁵⁹ Many argue that there is no shortage of ambitious goals in Norway but rather a shortage of concrete tools to reach these goals.⁶⁰ Actually, a survey found that only 15 per cent of the Norwegian public believes that Norway will reach the goal of a 55 per cent cut in emissions by 2030, and only 1 in 4 believes that the Norwegian politicians are do-ing enough to reduce emissions and counteract climate change.⁶¹

The country's oil activity is the best example of Norway's paradoxical climate policy. At the same time as having ambitious climate goals, Norway has the largest oil reserve in Western Europe and is one of the world's biggest oil exporters. According to a large consensus across multiple modelled climate and energy pathways, developing any new oil and gas fields is incompatible with limiting warming to 1.5C.⁶² Future emissions from planned fossil fuel infrastructure are set to exhaust even the 2-degree carbon budget.⁶³ Despite this, Norway stood for 3.53 per cent of the global oil trade in 2020, making it the tenth-largest oil exporter in the world.⁶⁴ Oil production has slowed over the 21 century, but the government continues supporting oil and gas exploration expansion. Private actors play an essential role in this activity. Thus, companies domiciled in Norway and potentially subject to Norwegian law emit significant amounts of greenhouse gases.

The largest petroleum operator on the Norwegian continental shelf is the public limited company Equinor. With its headquarters based in Stavanger, the company is one of the world's biggest oil sellers. It is Europe's second biggest gas supplier, with a market share of about 14

⁵⁸ This is the article the previous climate lawsuit was based on. They failed, but the court acknowledged that the article imposes obligations on the state, see HR-2020-2472-P para. 143

⁵⁹ See e.g., Andaur (2022) and Climate Action Tracker (2022)

⁶⁰ Holsether (2022)

⁶¹ Mathismoen (2022)

⁶² IPCC AR6 WGIII Mitigation of Climate Change (2022) p. 90

⁶³ Ibid. p. 90

⁶⁴ Twin (2022)

per cent.⁶⁵ In 2017, the operating result of the company was 13,771 billion.⁶⁶ Measured this way, Equinor was the world's 11th-largest oil company.⁶⁷ The company has contributed significantly to emissions around the world and is regarded as one of the so-called Carbon Majors identified in Heed's research.⁶⁸

It is conceivable that those affected by climate change, both residents in Norway and other countries, may wish to litigate in Norwegian courts on the basis that they have been, or will be in the future, harmed by climate change and therefore entitled to compensation. Equinor or other private actors, by virtue of being big emitters, would be natural targets if such a tort-based liability claim was made in Norway.

Norwegian tort law provides interesting opportunities for potential plaintiffs. First, Norwegian law contains liability based on negligence. Equivalent legal constructions exist in several different jurisdictions, and it largely resembles the ground of liability successfully deployed in the Shell case. In addition to liability based on negligence, Norwegian law also contains a form of far-reaching strict liability not seen in other jurisdictions.⁶⁹ This ground of liability is general and can be applied to all private economic activity and makes it possible to hold the tortfeasor liable even if he did not act negligently. Despite these legal constructions, Norwegian courts have not dealt with compensation claims for climate-related damage.⁷⁰ This can possibly be explained by the difficulties such cases previously have faced when they have been raised in other jurisdictions and the relative novelty of the matter. Such a case would also be long-lasting and costly due to its inevitable factual complexity and legally pioneering nature, deterring potential plaintiffs.

If a climate lawsuit based on tort law was brought within the Norwegian jurisdiction, how would the procedural aspects be handled, and who would be the likely actors? I will answer these questions in the following paragraph. After that, as there are several different ways of calculating an actor's emissions, I will comment upon which accounting method courts should use when doing so. At the end of this chapter, I will comment on the requirement of relevant

⁶⁵ Store norske leksikon (2023)

⁶⁶ Ibid.

⁶⁷ Ibid.

⁶⁸ Heede (2014)

⁶⁹ Hagstrøm (2019) p. 147

⁷⁰ HR-2020-2472-P is the climate lawsuit we have had in Norway. It did not concern tort, however. It was based on Art. 112 in the Constitution

damage. I am including this requirement under building blocks as it is not particularly controversial and does not need extensive discussion.

3.2 Process and Actors

The requirements for establishing standing under Norwegian law are found in The Disputes Act Article 1-3.⁷¹ In order to bring a case to Norwegian courts, the claim must concern a legal question as opposed to a political question. Further, the claim must be relevant, and the plaintiff must be connected to the claim. A claim will be relevant as long as it does not concern future, hypothetical, or previous legal issues, which the parties currently do not have a current need to clarify.⁷² Connection, on its hand, will be fulfilled if there is a connection of such a nature that the plaintiff has a protectable interest in obtaining a judgment against the relevant defendant.⁷³ Despite differences in wording, the principles are fairly similar to those of US procedural law. As we saw in the previous chapter, plaintiffs in the first wave struggled with satisfying these requirements in the United States. This will probably not be the case if such a claim is brought in Norwegian courts today, as I will explain below.

A tort-based compensation claim is likely regarded as a legal claim. Assessing whether the behaviour is in line with the existing tort law is principally a task of the court. As long as the plaintiff submits an issue which, in the plaintiff's view, should be regarded along the lines of tort law, the case should not be declared inadmissible for reasons related to presumed overriding political features.⁷⁴ In cases concerning climate change, it is difficult to pronounce without indirectly invoking a view on regulatory aspects of climate policy. However, the fact that a question also has political aspects, which is the case with many legal questions, should not deprive it of its character as a legal question. US courts might have held a different view on this in the cases abovementioned cases. However, their view on this specific question is of little

⁷¹ Tvisteloven Art. 1-3

⁷² Backer (2015) p. 223 and 225

⁷³ Ibid. (2015) p. 231

⁷⁴ In literature discussing the separation of powers in connection with the previous climate case, I understand the discussion to concern the substantive question, not the procedural one. See e.g., Stavang (2021); Fougner (2021); Boe (2021)

relevance to us, as US courts are far more politicized than Norwegian courts. There may be disagreement, but as far as I can see, there are no grounds for rejecting this as a political issue in Norway. A claim for compensation based on Norwegian tort law will likely be regarded as a legal question and accepted by the Norwegian courts.

Nevertheless, even if the question meets the procedural requirements and is to be considered a question of law, the political implications will affect the processing of the case. Arguments based on the separation of powers will be relevant and almost inevitably essential in a Norwe-gian climate case based on tort law. As an illustration, one can look to the previous Norwe-gian climate case,⁷⁵ where the defendants based their case heavily on the argument of separation of powers. A similar line of argument can be expected in a tort case concerning emissions, where the defendant may argue that the courts must be restrained in the examination. Thus, instead of rejecting the question on a procedural basis, the separation of powers will have a prominent role under the assessments of substantive law instead.

Regarding the procedural requirement's relevance and connection, these will likely be fulfilled if a plaintiff has climate-related damage on his part to show for. If so, the plaintiff needs the legal uncertainty clarified, and the issue concerns his own rights and duties. In any case, Norwegian law is such that the plaintiff's assumptions about the facts are usually used as a basis for legal issues related to enforcement.⁷⁶ The courts are careful not to preempt discussions that belong under substantive law. In a tort case, connection and causality amount to much the same, and this discussion is likely to be held when discussing the substantive law. Thus, a tort case concerning climate-related damages is unlikely to be dismissed on these grounds.

Concerning possible plaintiffs, Norwegian law provides broad access to legal action for individuals, associations, and organizations.⁷⁷ In principle, anyone who suffers from climate-related damage may be a plaintiff in such a case. However, the most likely categories of plaintiffs are individuals, NGOs, businesses, quasi-public organizations, central government and local authorities, and municipalities. Notably, plaintiffs may not be limited to residents in Norway. As we have seen, attempts to hold entities legally accountable for climate-related

⁷⁵ HR-2020-2472-P

⁷⁶ Backer (2015) p. 401

⁷⁷ Ibid. p. 202

damages have been made several times in other jurisdictions. These actions to hold emitters liable for damages caused by climate change impacts have been predominantly domestic. It is not a given that this trend will continue. Instead, it is possible that foreign nations or citizens may bring actions against Norway-based companies. The abovementioned Lliuya v. RWE is an example of a cross-border case, as a Peruvian citizen is suing a German company under German law.⁷⁸ As dramatic effects of climate change will occur all around the world, the possibility of suing across borders will provide an avenue for all vulnerable victims of global warming.

Lastly, one might think that the list of potential defendants is potentially exhaustible, as everyone contributes to climate change. However, as we will see, the causation requirement contains an insignificant threshold. Thus, only actors with a significant contribution to climate change are likely to be subjected to a successful action. The bar is likely to be set relatively high, and only a few have the capacity to cross the insignificant threshold. Probable defendants are, therefore, the biggest emitters, such as entities that burn fossil fuels on a large scale, entities that supply fossil fuels, and manufacturers that rely on fossil fuels.

3.3 Accounting method - the inclusion of scope 3-emissions

When assessing an emitting actor's behaviour, an essential question for the courts is what emissions to consider. Which accounting approach should the courts use when quantifying the actors' emissions? This question is of great importance, as the amount of emissions can determine whether liability is imposed.

Alone, physical science cannot fully answer the question of who is responsible for emissions, as responsibility may be appointed in many ways. Several approaches for divining responsibility for emissions can be used – territorial, extraction-based, and consumption-based. One may also use the terminology scope 1-, 2- and 3 emissions to categorise the different kinds of emissions a company creates in its operations and value chain. Scope 1 emissions cover the

⁷⁸ Luciano Lliuya v. RWE AG (filed 2015)

emissions from sources that an actor controls directly, and scope 2 emissions are those a company causes indirectly. Attributing these to an actor and including them in an assessment of behaviour is not particularly controversial. It is the inclusion of scope 3 emissions that is more uncertain. Scope 3 emissions are not produced by the company itself or the result of activities controlled by them, but emissions the company is indirectly responsible for, up and down its value chain.⁷⁹ Thus, scope 3 emissions include the emissions arising when products are consumed. As the situation appears today, many companies do not include or fully cover scope 3 emissions when they assess their own behavior or set climate targets.⁸⁰ This means that very significant parts of emissions originating from a company are not accounted for.

The NDCs in the Paris Agreement are based on territorial emissions; states are responsible for emissions within their borders. Because of this, one might believe that this approach must also be used exclusively in other instances. For instance, there have been examples of defendants arguing that including scope 3 emissions in the assessment would subvert international policy frameworks.⁸¹ However, the technical accounting rules in the NDCs do not limit or affect parties' responsibilities. The NDCs in the Paris Agreement provide a mechanism to support one specific measure and to achieve that aim. A universal standard for emission accounting outside the scope of the agreement has not been created simply because the territorial accounting approach was used for the NDCs in the Paris Agreement. The NDCs and its accounting method do not represent the totality of the policy response to the climate change issue. Thus, it is entirely possible to use other, and for the purpose, better accounting methods. Instead of using territorial-based accounting methods when considering a company's emissions, I argue that all emissions under the defendant's effective control must be included when quantifying the actors' emissions. This approach would in many instances lie close to the consumption-based approach and thus include scope 3 emissions.

Making producers and generators responsible for scope 3 emissions might seem unfair, as it lets consumers off the hook. There are, however, good reasons to focus on the companies. Ethically, companies and producers have long known about the risk posed by using their products; they have lobbied against regulation and ultimately profit the most from the

⁷⁹ National grid

⁸⁰ Dickie (2023)

⁸¹ Waratah Coal Pty Ltd v. Youth Verdict et al (2022)

consumption.⁸² Practically, focusing on a small group of well-informed companies is more accessible than a huge group of poorly informed consumers.⁸³ By deciding what and how to produce, companies can effectively influence the amount of greenhouse gases tied to the use and consumption of their products. It is the actor who effectively controls the emissions, which most easily can prevent them. Thus, it is reasonable that they are also responsible for such emissions. Besides, some of the costs imposed on the companies will flow down to the consumers, sending the appropriate price signals and preventing an unfair allocation between producer and consumer.⁸⁴ Additionally, scope 3 emissions account for carbon leakage to other countries via trade. Researchers have found that it would be relatively easy for countries to produce consumption-based inventories based on readily available data.⁸⁵ The fact that a consumption-based approach would be relatively inexpensive and not more technically challenging than the territorial approach implies that defendants should not be able to reject this approach based on practical concerns.

The idea of making the territorial harm caused by exported combusted emissions a part of a company's legal responsibility is not new. Courts in Europe, the US, and Australia have used this approach.⁸⁶ In the Norwegian climate case, the Supreme Court held that the Norwegian Constitution covers territorial harm caused by exported emissions of oil and gas extracted in Norway because the 'authorities may influence directly on or take measures against' these emissions.⁸⁷ The decision implies that the authorities cannot look at territorial emissions in isolation but also consider greenhouse gas emissions from exported oil and gas. Thus, the court was not bound by the fact that the NDCs build upon a territorial-based approach. Instead, it is more appropriate to say that the assessment was based on the doctrine of effective control, which has been used in several other jurisdictions.⁸⁸ Whether emissions fell within the effective control of the company was also a decisive question in the Shell judgement,

⁸² See e.g., McGreal (2021); Hall (2015); McGreal (2022)

⁸³ Burger (2020) p. 134

⁸⁴ Ibid.

⁸⁵ Ibid.

⁸⁶ Waratah Coal Pty Ltd v. Youth Verdict et al (2022) para. 25, 26, 695, 717; Milieudefensie et al. v. Royal Dutch Shell (2021); Ctr. for Biological Diversity v. Bernhardt (2020) p. 19–23; Sovereign Inupiat for a Living Artic et al v. Bureau of Land Management et al. (2020) p. 28–31; Friends of the Earth et al. v. Debra A. Haaland et al. Civil Action (2022) p. 23–40; Gloucester Resources Ltd v. Minister for Planning (2019) para. 499–513

⁸⁷ HR-2020-2472-P para. 149

⁸⁸ Sandvig (2021) which points to CCPR/C/GC/35 and Advisory Opinion OC-23/17

when assessing their responsibilities. There, the court stated that it is increasingly endorsed in international guidelines that companies are accountable for combustion emissions.⁸⁹ This view is also in line with the opinion of the European Network of National Human Rights Institutions, which argues that the emissions the company is indirectly responsible for up and down the value chain, scope 3 emissions, are to be included.⁹⁰

As we have seen, there is good reason to apply a consumption-based approach when quantifying a defendant's emissions. Courts and different actors have already used and argued for this method. In my opinion, this approach should be used by Norwegian courts. Thus, when I speak of an actor's emissions in the following, all emissions that fall within the actor's effective control are included.

3.4 Relevant damage or loss under tort law

The first requirement that must be fulfilled for Norwegian tort law to be applicable is that the plaintiff must have suffered damage that affected an interest protected under the tort system.⁹¹ Damage can generally be divided into three main groups; personal injuries, property damage, or economic damage. The personal integrity and ownership interest are immediately considered to be protected under tort law.⁹² When such damage occurs, the reduction in the injured party's financial position is to be compensated. Tortious damages are an economic term. Thus, the main rule in Norwegian law is that only financial damage is compensated.⁹³ In the context of this thesis, all harm caused by anthropogenic climate change may fall under the term climate-related damage.

IPPC has accounted for observed and projected climate change impacts and risks in its report.⁹⁴ From this, it is evident that climate change will have substantial negative consequences

⁸⁹ Milieudefensie et al. v. Royal Dutch Shell (2021) para. 4.4.11 – 4.4.25, especially 4.4.18

⁹⁰ Written observations in application no. 39371/20 para. 7-10

⁹¹ HR-2017-2352-A para. 33

⁹² Hagstrøm (2019) p. 53. Ideal interests, interests that have a prominent aspect beyond the financial, are often protected by the law, see e.g., Forurensingsloven, Naturmangfoldsloven, Granneloven.

⁹³ Hagstrøm (2019) p. 52

⁹⁴ IPCC AR6 WGII Summary for Policymakers (2022)

on human societies and the natural environment. Slow-onset events such as sea level rise, ocean acidification, loss of biodiversity, and desertification, as well as changes in the frequency, intensity, and distribution of extreme weather events, will undoubtedly lead to both economic and non-economic damages. For instance, economic damage may include damage to homes, infrastructure, and crops. Non-economic damage may include harm to human health and mobility, loss of access to territory, and loss and damage to biodiversity and habitats. IPCC is highly confident that the increased frequency and intensity of extremes have reduced food and water security, hindering efforts to meet SDGs.⁹⁵ Adverse effect on physical and mental health is expected, as well as human mortality and morbidity.⁹⁶ It is important to stress that the effects of climate change are not something that lies long into the future; it is already happening.

The line between economic and non-economic damages is not necessarily easy to draw. Nevertheless, climate change will have huge impacts and inevitably damage people, nature, property, and financial assets. A lot of the damages will be highly severe and, in total, extremely costly. The fact that climate change can lead to substantial damage to livelihoods is already established in the Norwegian Supreme Court. In HR-2020-24-72-P paragraph 167, the court stated that 'there is no doubt that the consequences of climate change in Norway will lead to the loss of human life, for example, through floods or landslides'.⁹⁷

Due to the scope and width of potential climate-related damages, it is easy to imagine practical examples of compensation claims. Whoever ends up experiencing climate-related damage might file a compensation claim against an actor they consider responsible, such as a Carbon Major. For instance, private property owners whose property has been damaged by flooding or coastal erosion; or farmers who have experienced crop failure due to drought or floods as land and crops are affected might claim compensation. Public parties, such as health authorities, may also suffer damage, enabling them to raise compensation claims.

The exact type of damage assessed and whether it is covered under Norwegian tort law depends on the case's specific facts. Nevertheless, Norwegian tort law establishes comprehensive protection against personal injury, property damage, and damage to financial assets. Most

⁹⁵ Ibid. p. 9

⁹⁶ Idid.

⁹⁷ My translation from Norwegian

of the loss and damage caused by climate change concerns these kinds of injuries and would be protected. Thus, many climate-related damages would likely be relevant, and this requirement would not be challenging to satisfy. Therefore, the first requirement under Norwegian tort law, relevant damage, will, in most cases, be fulfilled. This requirement is not considered the most controversial in climate litigation; the following topics are far more debated.

4 Unwritten strict liability

4.1 Introduction

In addition to relevant damage, there must also be a basis for liability in order to apply tort law to the issue of climate change. One potential ground of liability is the unwritten strict liability in Norwegian tort law.⁹⁸

As the industrial revolution started in Norway in the midst of 1800, the society changed, and the need for new legal constructions appeared. The new industries and technical devices created a constant danger for the surroundings. A tort law system only based on negligence, where the tortfeasor was free of liability for accidental damage, was no longer sufficient. The need and wish to protect the surroundings against extraordinary risks created by the industrial revolution was the backdrop of the creation of the unwritten strict liability in Norwegian law. Considerations of justice and balancing of interest indicate that the one who profits from the activity, which creates an extraordinary risk, should bear the cost if the risk materializes.⁹⁹ As important as these considerations is the fact that damages are statistically predictable for the owner of a business and that the cost, therefore, can be pulverized in various ways.¹⁰⁰ A strict liability would also incentivize the owner to prevent damages.¹⁰¹

^{98 &#}x27;Ulovfestet objektiv ansvar' in Norwegian

⁹⁹ Hagstrøm (2020) p. 176

¹⁰⁰ Rt-2014-656 para. 34

¹⁰¹ Ibid. para. 34

The development of strict liability happened step by step in the courts. The first judgements did not explicitly declare that they created a new liability form; they instead operated within existing legal constructions. The reasoning was complex, consisting of various arguments. The need to legitimize the decisions and test the feasibility was perhaps the reason for this masking. Nevertheless, a breakthrough of the unwritten strict liability happened in Rt-1875-330, *Lysakerdommen*. A factory, legally producing explosives, exploded. The explosion caused substantive damage to the neighbouring property. Producing explosives is a dangerous activity, creating risk for the surroundings. When the risk materialized, which was likely that it at one point would have, the factory was responsible. Later, in Rt-1900-753, the Supreme Court acknowledged that a new form of liability had been created and in Rt-1905-715, the final breakthrough was made. The latter is the clear precedent of the unwritten strict liability in Norwegian law.

The unwritten strict liability was created in an interaction between case law and literature, and the development is unparalleled in the Norwegian history of law. It all started with a need in society created by the industrial revolution, a need not dealt with by the legislators. The courts responded to this need by first creating liability for *dangerous businesses* and later by expanding the liability to include damage as a result of a constant risk to the surroundings.¹⁰² The liability now includes devices, and the requirements for applying the doctrine have been somewhat relaxed. The creation of the unwritten strict liability is an interesting example of the law dealing with pressing social issues through law-making activity in courts.

The unwritten strict liability is thus a basis of liability that can be imposed when a company causes accidental damage, even when the activity is lawful and subjective fault cannot be demonstrated. Certain cumulative requirements must be met for the ground to be applied; the business itself must entail a *constant, typical*, and *extraordinary risk*, and the damage must be due to this risk.¹⁰³ If such a risk causes damage, it depends on a broad balance of interests as to whether liability should be applied.¹⁰⁴ Therefore, the doctrine builds on risk considerations and a balancing of interests.¹⁰⁵ The legal ground is far-reaching and general. It intervenes in all areas of social life in that it can be applied to all private economic activity and, eventually,

¹⁰² Rt-2009-1237 para. 62

¹⁰³ Jusinfo

¹⁰⁴ Hagstrøm (2019) p. 175

¹⁰⁵ RT-2003-1546 para. 40

also in the public sector.¹⁰⁶ From a social-economic point of view, the responsibility is significant. The doctrine is dynamic, and according to Rt-2009-1237, the development of the liability cannot be assumed to be over.

In the following, the requirements of strict liability will be examined, and I will be discussed whether emitting companies may be liable under the doctrine. The unwritten strict liability in Norwegian law is developed through comprehensive case law. When the scope of the responsibility is sought to be determined, it must be based on this case law.¹⁰⁷ The question is whether this legal ground can be applied to the activity of a major emitter in Norway.

4.2 Extraordinary risk

The risk must *be extraordinary* in order to invoke the doctrine of unwritten strict liability, and this requirement has been central in recent case law.¹⁰⁸ The terminology used in case law is inconsistent, as the wording has varied. Nevertheless, the understanding is the same.¹⁰⁹ It is a requirement concerning the dangers of a company or a device, which for the most part, has been referred to as *extraordinary risk*.

The question is whether the risk of the harmful activity or facility is significantly greater than that generally encountered in society, often referred to as the risk of everyday life.¹¹⁰ Everyday phenomena are not something that strict liability protects against. It is not decisive whether the activity or business that causes damage is part of everyday life, but if the risk is.¹¹¹ It can, for instance, be argued that smoking and using contraception pills are a part of everyday life for many people. However, the severe health risks these products may create cannot be said to be a part of everyday life and therefore entail an extraordinary risk for the

¹⁰⁶ Hagstrøm (2019) p. 179

¹⁰⁷ RT-2003-1546 para. 39

¹⁰⁸ HR-2019-52-A para. 35

¹⁰⁹ Hagstrøm (2019) p. 182

¹¹⁰ HR-2019-52-A para. 35

¹¹¹ Hagstrøm (2019) p. 193, see also RT-1972-965 and RT-2003-1546

individual user.¹¹² The exact content of the requirement may vary according to the area of life and the nature of the risk.¹¹³ A concrete and specific risk assessment must be made in every case. The court's assessment consists of a combination of two factors: the probability that damage will occur and the extent of the possible damage.¹¹⁴ Together, these factors constitute the company's or device's damage capacity.

The bigger the damage capacity, the more likely the risk is regarded as extraordinary. Concerning the probability that damage will occur, it is not required that damage occurs frequently or regularly. However, if damage occurs very rarely, this is an argument against imposing liability.¹¹⁵ Still, although a low frequency of damage speaks against liability, it is not excluded to impose liability for devices that rarely cause damage; the damage capacity can still be considerable if the possible extent of harm is significant. Occasionally the possible extent of damage is the all-supporting argument for liability. In exceptional cases, liability is imposed based on this element alone.¹¹⁶ It is not a requirement that the risk is unexpected.¹¹⁷

By emitting vast amounts of greenhouse gases, major emitters contribute to climate change, which will lead to damaging impacts. It is undisputed that this emitting activity is lawful and a part of everyday life. The relevant question, however, is whether the risk they create through this activity is part of everyday life or if it is a risk significantly greater than that generally encountered in society. Do major emitters create an extraordinary risk by emitting?

Above, under 3.3 on relevant damage, both the impacts of climate change and potential damages were highlighted. In the world today, we have already seen and will continue to see severe damage to people, property, and financial assets caused by climate change. Due to the degree of danger created and the potentially extreme costs climate change will cause, the possible extent of damage should be considered great. In previous case law, such as the

¹¹² Smoking judgement RT-2003-1546 concerning tobacco producers' liability and Contraceptive Pill judgement RT-1992-64 concerning contraceptive pill manufacturer's liability

¹¹³ Rt-1991-1303 p. 1306

¹¹⁴ RT-1991-1303 p. 1306

¹¹⁵ Hagstrøm (2019) p. 188

¹¹⁶ See e.g., RT-1875-330; RT-1932-416; RT-2000-915; RT-1991-1303 p. 1306

¹¹⁷ Hagstrøm (2019) p. 182 and RT-2003-1546

Lysaker¹¹⁸ or the Smoking judgement¹¹⁹, significant damage to property and human health was considered extraordinary. Climate-related damage, such as the destruction of homes, in-frastructure, and the loss of lives is just as significant. Thus, such risks should be regarded to go beyond the risk of everyday life and are considerably greater than that generally encountered in society.

Further, it is statistically predictable that climate-related damages will occur at some point in the future. In the Contraceptive Pill judgement II, RT-1992-64, the producer of contraception pills became liable after a woman suffered severe health issues after using the pills. The court stated that, 'it is a vanishingly small proportion of users who are affected, but the consequences for those affected can be catastrophic'.¹²⁰ In that case, the possible extent of damage is weighted more heavily than the likelihood of damage. The same reasoning can be applied to the issue of emissions. The likelihood of suffering climate-related damage directly from emissions is not necessarily that great in the near future. However, the consequences will be severe for those affected. Because of this, it is reasonable to argue that the risk major emitters create by emitting greenhouse gases is extraordinary.

4.3 Constant and typical risk

The risk needs to be *constant* for strict liability to apply. Constant does not necessarily mean that the risk must be persistent – even and uninterrupted – but it must not have the characteristics of being a single event.¹²¹ As case law states, the risk cannot be sporadic, mutually independent single phenomena but inevitable consequences of constant activity.¹²² An indication of whether this requirement is fulfilled is whether it was foreseeable for the tortfeasor that damage could occur from the activity.

¹¹⁸ RT-1875-330

¹¹⁹ RT-2003-1546

¹²⁰ RT-1992-64 p. 79, my translation

¹²¹ Hagstrøm (2019) p. 205

¹²² RT-1948-719 p. 721

Major emitters constantly emit greenhouse gases, especially those working with oil and gas production. Their business model is based on emitting and is a necessary part of their operation. It is this activity that constantly creates extraordinary risk for the surroundings. Major emitters contribution to climate change, and the following impacts are an inevitable consequence of their activity. This way, it is also foreseeable to them that damage could occur.

In addition to being constant, the risk must be *typical*. Typical means that the risk must be linked to factors characteristic of the harmful device or company and that it is of a type that is not widespread in society otherwise.¹²³ It is, therefore, decisive whether the company, by its nature, exposes the surroundings to a risk that they are generally not exposed to. The damage must result from the specific company's specific risk. If similar accidents could just as well appear from almost all businesses and products, this speaks against imposing strict liability.¹²⁴ In that case, the risk cannot be considered typical for a specific company.

In Norway and the Western world today, everyone, whether they like to or not, contributes to the issue of climate change. It is, in fact, almost impossible to live everyday life without a carbon footprint. This is especially true for producers and manufacturers. Emitting activity is, therefore, widespread in society today. This may indicate that the requirement that the risk must be typical, is not fulfilled.

However, it is reasonable to differentiate between the ordinary and general emitting activity in society and the emitting activity of the major emitters. In 2021 the average Norwegian had a carbon footprint of 7,6 tons of CO2 annually.¹²⁵ On the other hand, Equinor's total scope one and scope two emissions of greenhouse gases in 2021 were at a staggering 12,1 million tons.¹²⁶ If we add scope 3 emissions, which I argue we should, the number would be even higher. In fact, 63 per cent of cumulative worldwide emissions of industrial CO2 and methane between 1751 and 2010 can be traced to the 90 major carbon entities.¹²⁷ Thus, the emissions of the Carbon Majors vastly exceed that of others in society. These kinds of emissions, which are far higher than the emissions of others, cannot be said to be typical for society at large.

¹²³ Hagstrøm (2019) p. 201

¹²⁴ See e.g., RT-1948-719; RT-1955-46; RT-1960-841; RT-1939-766

¹²⁵ Energi og klima (2023)

¹²⁶ Sustainability report Equinor (2021) p. 4

¹²⁷ Heede (2014)
Instead, such emissions should be considered a characteristic of the Carbon Majors. These enormous emissions expose the surroundings to risks they are generally not exposed to, and the impacts of climate change would not have been as severe if it were not for them.

By constantly emitting vast amounts of greenhouse gases, an activity typical for the major emitters, they can be said to create a constant and typical risk for the surroundings.

4.4 Overall assessment based on consideration of interest, the consideration of pulverization, the consideration of prevention

Extraordinary, typical, and constant risk is not enough to impose strict liability. It is also required that the considerations that bear the doctrine of strict liability, taken together, indicate that the risk should be placed on the tortfeasor. An overall assessment must be made, where an overweight of broader societal interests must speak for liability. In this overall assessment, both considerations of the parties in the relevant case and more general interests of societal nature are included.¹²⁸ This is a discretionary and broad assessment made by the court, where opposing considerations must be weighed against each other. It is a balance of interests-test. The most important considerations in this respect are the consideration of interest, the consideration of pulverisation, the consideration of prevention, and the consideration of a concrete reasonable result.¹²⁹ How these interests are weighed against each other depends on the specific case, and the liability is grounded considerably broader than in one of the interests alone.

The consideration of interest presupposes that whoever benefits from a business also must bear the costs of this business. If the business causes damage, they are consequently not to be borne by one who happens to be affected but by one who benefits from it. Whoever profits from a business should also be charged for the losses the business causes. The consideration of pulverization, on its hand, is closely tied to socioeconomic considerations. The loss still exists even if it is moved from the injured party to the tortfeasor. From a socioeconomic standpoint, it is irrelevant who bears the cost. However, if damages are predictable for the

¹²⁸ Rt-2003-1546 para. 65

¹²⁹ Hagstrøm (2019) p. 213. See also Rt-2001-1646 p. 1656-1657

company, the costs can be pulverized through insurance or other means. Whoever has the opportunity to factor the risk of loss into their operating costs is closer to bearing the cost. Further, strict liability is imposed even though there is no negligence, but it can still have a preventative effect. Therefore, the consideration of prevention may speak in favour of strict liability. Strict liability may create an incentive to reduce the risk of damage, leading to increased damage prevention in general society.

As long as one establishes causality between a company's emissions and the damage, the consideration of interest speaks in favour of imposing liability. This is one of the main motivations behind the idea of applying tort law to the issue of climate change in the first place. Major emitters are profiting from their emitting activity, and when they cause damage this way, the consideration of interest implies that they also should bear the cost of this activity. The industry has had enormous revenues, and it may appear reasonable that it should also bear some of the financial expenses and burdens associated with emissions. This situation is similar to the situations that created the need for strict liability to begin with. The breakthrough judgement from 1875, *Lysaker judgement*¹³⁰, dealt with a factory that, through its profiting activity, created damage to others. It was the consideration of interest that essentially led to liability. This situation is similar to that of major emitters today.

The consideration of pulverization may also speak in favor of imposing strict liability. Today, science is evident in the fact that emissions of greenhouse gases will lead to higher temperatures, which in turn will lead to impacts and damages. When a company emits vast amounts of greenhouse gases, it is predictable to them that damage may occur because of this. For professional and well-run companies, which most of the biggest private emitters are, it is usual that the business strategy includes some risk assessment to assess the company's prospects. For instance, Equinor Energy AS included a risk review in its 2021 annual report.¹³¹ There, they identified a wide range of risks that could result in significant losses. Among the risk, costs relating to climate change was pointed at. In this context, compensation of costs related to persons and/or entities claiming damages as a result of Equinor's activities were explicitly mentioned.¹³² This is a specific example of a Carbon Major assessing risk relating to climate change. When doing so, they can consider the risk and the cost attached to it in future

¹³⁰ Rt-1875-330

¹³¹ Equinor Energy (2021)

¹³² Ibid. p. 11

operations. Unlike the randomly injured party, the company can, and actually do, factor the risk of loss into their operating costs.

Major emitters have also decided how to produce their products in many industries. This way, they have had a greater chance of preventing damage connected to their emissions than the injured party. With this knowledge and possibility, companies can pulverize the costs in several ways, for instance, through price regulations, reduced operating costs, or reduced stock dividends and other profits for the owners. It seems unreasonable that the industry should be able to spend large sums of money on marketing measures aimed at increasing sales and lobbying aimed to prevent public measures but that they should not pay compensation to those harmed by the products. Like other insurance schemes, such as those for accidental oil spills and environmental damage, climate-related damage can also be ensured. Thus, companies have more opportunities to bear the cost and are closer to doing so than the randomly injured party.

Imposing strict liability would also have a significant preventive effect. Today, we find ourselves in a situation where maintaining the status quo will lead to irreversible and catastrophic impacts. To avoid this and reach the goals set by the international community in the Paris Agreement, there must be a significant reduction in the emissions of greenhouse gases. Major emitters have achieved enormous profits from their emitting activity for decades while outsourcing the actual cost to others. As long as it stays economically beneficial for actors to emit greenhouse gases, they will most likely keep emitting them. By imposing strict liability, however, the actual cost of the emitting activity would fall on the emitters. As mentioned earlier, the costs of climate impacts are enormous. It would be highly costly for companies if they were to be held liable for climate-related damage. With strict liability, suddenly, companies could find themselves in a situation where emitting activity would be more costly than profitable. Strict liability would incentivise climate-friendly behaviour for every company driven by profit. Such an incentive could tremendously affect the whole industry and help prevent climate-related damage. This way, strict liability would have a preventive function.

4.5 Overweight of broader societal interest against the individual company interests

In addition to the considerations mentioned above, concrete reasonableness is relevant in the overall assessment. In Rt-1975-1081 page 1083, emphasis is placed on what the court considered reasonable and natural. *Reasonableness* is a vague term requiring a discretionary assessment. What the court deems reasonable depends on the case's specifics and is, therefore, difficult to comment upon in general terms. The legality of the activity, policy considerations, acceptance of risks, arbitrary effects, and the need in society have been pointed at in case law.¹³³

The case against major emitters largely resembles the case against the tobacco industry. In the debate about liability for damages for the tobacco industry, the legality of the products was often mentioned as a defence for the industry.¹³⁴ The idea was that when tobacco products are permitted, even though these products are known to have harmful effects, the industry cannot be met with 'sanctions' through tort law.¹³⁵ After all, the tobacco companies have not done anything illegal. However, in principle, legality and liability are two completely different matters. In our society, several legal products and companies must be liable for compensation based on strict liability when harmful effects occur. This is, for instance, the case for car use, the production and sale of pharmaceuticals, and the production and sale of explosives. If any of these activities have side effects, expected or unexpected ones, the manufacturer cannot defend himself against liability because the activity is legal. This has always been the case with strict liability. The unwritten doctrine of strict liability was never meant to regulate illegal activity; instead, it was created to regulate the legal activity, which created risk for the surroundings.

The Lysaker judgement¹³⁶, the Water Line judgement¹³⁷, and the Contraceptive Pill II judgement¹³⁸ are all fundamental cases in the doctrine of strict liability; they all deal with legal activity. The purpose of the doctrine was to deal with precisely these kinds of issues, and it was

135 Ibid.

¹³³ RT-2003-1546

¹³⁴ Kjønstad (2000)

¹³⁶ RT-1875-330 Lysaker-dommen

¹³⁷ RT-1905-715 Vannledningsdommen

¹³⁸ RT-1992-64 P-pille dom II

created through the courts' law-making activity. This highlights that the application of the doctrine, in this case, would not be particularly problematic in relation to the principle of separation of powers. It would not be a power grab by the judiciary to apply the doctrine of strict liability. The doctrine has always been applied in situations where the legislative power has, either through active action or the absence of regulation, allowed the activity to remain legal but where it still has been a need for compensation in some cases. The issue is whether the tortfeasor or the injured party is the closest to bearing the financial loss resulting from an accident. There is no condition for liability that the perpetrator is to blame for the damage that has occurred, nor is there any condition that the activity is illegal. The fact that the activity of major emitters is legal is, therefore, no hindrance to imposing strict liability, and it cannot be used as a decisive argument.

Even though legality is not decisive and cannot stand in the way of imposing liability, disharmony in the legal system can be an argument against it. In the *Smoking judgement*¹³⁹, this line of argument was important. The court stated that 'an objective liability for damages for the manufacturer that also includes damages caused by the use of fault-free products in a regular way would be in clear disharmony with the authorities' acceptance of tobacco as a legal product. If such liability is to be established, in my opinion, this should be done by legislation and not by the courts without such legislation expanding the framework for the unwritten objective liability'.¹⁴⁰ The court further held that if the strict liability included tobacco, it would remove itself from the kind of risk the ground of liability was created to cover. It would expand the liability and could lead to unexpected consequences.¹⁴¹ Thus, in the Smoking judgement, the legality held together with the disharmony liability would create, led to liability not being imposed.

This line of argument might also be used to argue against applying strict liability to major emitters. In today's society, emitting activity is both legal and often encouraged by the government. In the case of Equinor, this company has provided welfare and growth in the Norwegian society. The company has also provided energy and stability in the current energy crisis. The Norwegian government continues to support oil and gas exploration expansion, and the

¹³⁹ RT-2003-1546

¹⁴⁰ Ibid. para. 70, my translation

¹⁴¹ Ibid. para. 69

oil industry is subsidized.¹⁴² It might therefore seem contradictory and appear as disharmonious with a system where the Norwegian public institutions both support the activity and impose liability on it. However, this is not necessarily true. As mentioned under the Norwegian context, the Norwegian government has ratified both the UNFCCC and the Paris Agreement. These conventions contain the temperature goal of limiting global warming to 1.5 degrees or at least well below 2 degrees. Through their NDCs, the Norwegian government has also expressed an intention to mitigate vast amounts of greenhouse gases. Science is evident in the fact that continued exploration of fossil fuels is incompatible with these goals.¹⁴³ Thus, the fundamental contradiction and disharmony would not be to impose strict liability but rather to have a government acting in contradiction with their stated intentions and agreements they have ratified.

Imposing strict liability in the case of emitting activity would not represent an expansion of the doctrine either, and such activity should not fall outside the scope of strict liability. In the Smoking judgement, the court was clear on the fact that strict liability did not include tobacco. The point was that using products like tobacco and alcohol would unavoidably damage its users. Such damage is not an accidental incident that occasionally; instead, it is an inevitable consequence of using the product. Damage from using these kinds of products differs significantly from damage from using products like contraception pills, which only occurs to a small number of users. This illustrates the boundaries of strict liability. Damages from tobacco fall outside the scope of the strict liability, while damages from contraception pills constitute a significant group of cases under the doctrine.

It is true that every ton of greenhouse gases emitted into the atmosphere contributes to climate change and increases the probability of damage occurring. Thus, we are talking about the expected effects of emissions which makes the emitting activity more comparable to tobacco and alcohol than to contraception pills. Still, there are reasons to include climate-related damage under strict liability. First, the fact that emitting vast amounts of greenhouse gases is harmful does not constitute a solid argument against imposing liability. The fact that significant adverse effects can be expected from large emissions cannot create non-liability. Instead, this is precisely why strict liability was created. Imposing such liability on major emitters would not

¹⁴² See for instance the government's proposal for a revised oil tax package, Holtsmark (2023)

¹⁴³ IPCC AR6 WGIII Mitigation of Climate Change (2022) p. 90

separate it from other strict liability cases; it would align with the historical development. Secondly, an essential distinction from the Smoking judgement is that the injured parties have not accepted the risk in the case of climate-related damages.¹⁴⁴ The underlying rationale for the strict liability is that the damage is due to the realization of a risk that the injured party can hardly protect against, so it appears unpredictable from the injured party's perspective. In contrast to the case of smokers using the product despite knowledge about the health impacts, parties injured by climate events have not had the same opportunity to prevent damage; they have not accepted any risk.

Still, one could argue that imposing strict liability in the case of climate-related damages would be difficult to manage, with arbitrary effects, and it could have unexpected and negative consequences. In Western society today, nearly all everyday activities lead to emissions. However, imposing liability would be manageable given the significant threshold discussed under the causality requirement. A clearly defined group would be susceptible to compensation claims. More problematic is the fact that society, to a large extent, relies on the activity of the major emitting companies. In addition to their products and services, they also create growth and welfare in society. In many ways, society benefits from their activity. Thus, imposing strict liability could, all else held equal, negatively affect the companies, and have unexpected and negative consequences on society.

However, the fact that the world faces the twin challenge of mitigating emissions while meeting the global energy demand of the rapidly growing population does not change the picture either. Access to affordable and reliable energy is of enormous importance and is included in the UN sustainable development goals. Carbon Majors such as Equinor have been essential in this respect. In an overall assessment, this does not necessarily mean that major emitters should not be liable for climate-related damages. In the Shell judgement, this exact issue was discussed. There, the court found that 'there is a connection between the UNSDG and the climate goals of the Paris Agreement and other agreements made for the implementation of the UN Climate Convention. It is not the intention of SDG 7 ("Ensure access to affordable, reliable, sustainable and modern energy for all"), (...), to detract from the Paris Agreement or to interfere with these goals. This also follows from SDG 13 ("Take urgent action to combat

¹⁴⁴ There might be peculiarities in specific cases which imply that risk have been accepted somehow, where to draw the line will then be an important question

climate change and its impacts")'.¹⁴⁵ The court concluded that the need for energy could not be a reason or a company not to meet its reduction obligation.

Even though the Shell judgement is from another jurisdiction concerning a different legal question, the reasoning could also have a bearing on a Norwegian case. The energy need should not be a decisive argument against legal efforts to incentivize mitigation. These interests are equal in the UN system and do not need to be contradictory. Furthermore, one can question whether liability for vast emissions would have such negative consequences. Many argue that we would experience an energy crisis if oil and gas companies scaled back operations. For instance, the OPEC secretary general said in his remark on COP26 on 10 November 2021 that a failure to listen to all voices on issues such as reducing emissions, energy affordability, and security could lead to unintended consequences.¹⁴⁶ These consequences could include market distortions, heightened volatility, and energy shortfalls. However, all this is evident in 2022, even though fossil fuels still dominate the energy market. In its 2022 World Energy Outlook (WEO), the International Energy Agency (IEA) stated that accelerating investment in clean energy and efficiency, not new fossil fuels, is the answer to both climate and energy crises. The current energy crisis is caused by underinvestment in renewable energy and the resultant dependence on oil, gas, and coal. The analysis of IEA shows that nations with high shares of renewable energy supply avoided some of the worst impacts of the energy crisis.¹⁴⁷ Liability for vast emissions of greenhouse gases would not create a crisis for society.

Instead, imposing strict liability would be a step toward filling a pressing societal need. To make a company responsible for climate-related damage would make them internalize the externalities of its production. It would be a financial burden creating an incentive to sustainably produce energy or other products. Liability will have far-reaching consequences for the company, which could curb potential growth.¹⁴⁸ However, the interests served with liability outweighs the company's commercial interest, as I see it. Due to the severe threats and risks posed by emissions, companies may be required to take drastic measures, including financial sacrifices in the short term, to limit emissions to prevent dangerous climate change. The compelling common interest that is served by imposing liability outweighs the negative

¹⁴⁵ Milieudefensie et al. v. Royal Dutch Shell (2021) para. 4.4.42

¹⁴⁶ Meredith (2021)

¹⁴⁷ OCI team (2022)

¹⁴⁸ Kaminski (2023)

consequences a company might face and the short-term commercial interest of a company. Further, as I will point out under the culpa assessment, petroleum companies will need to transition away in the longer term. The possible forcing of that transition through strict liability may, therefore, also in some cases be a possibility for the company.

4.6 Conclusion on strict liability

Since its creation in the 18th century, the doctrine of unwritten strict liability has been imposed on lawful companies that have caused accidental damage through their activity. As stated by Wilhelmsson, the doctrine offers a productive scheme for confronting new risks. It offers a systematically and substantively effective instrument for courts eager to contribute to learning how to deal with the complex risks of contemporary society.¹⁴⁹

Above, I have outlined the argument for how the doctrine could be successfully applied in a tort case concerning climate damages. Emitting vast amounts of greenhouse gases significantly increases the probability of substantial damage to the surroundings. Major emitters can be said to create an extraordinary, typical, and constant risk to the surroundings through their activity. More uncertainty is tied to assessing whether strict liability should be applied. While the consideration of interest, pulverization, and prevention arguably speaks in favour of liability, concrete reasonableness is a more complex assessment. The goal is to search for broader societal interests, but this assessment is particularly vague, with unclear starting points and guidelines. It is especially here that the discretionary character of the doctrine appears. Given this distinctiveness, the assessment is more prone to changes in society and personal preferences.

Traditionally, major emitters have largely contributed to society's prosperity, and the idea that this activity could lead to liability was unthinkable not long ago. Today, however, the climate issue is given much more attention, and technology enables companies to continue their activity with fewer emissions. At the same time, increased scientific knowledge clarifies actors' contribution to climate change and the substantive damage that will occur. The doctrine of

¹⁴⁹ Wilhelmsson (2019)

unwritten strict liability might not have been possible to impose on major emitters in the past. Nevertheless, as society needs to grow more climate-friendly, the content of the doctrine develops. What the broader social interest is may have changed with this development. If companies, despite these developments, keep emitting, and this way causes harm, it will be increasingly more difficult to argue against strict liability in the future. Whether courts would be willing to impose it is a different question. Given the discretionary character of the doctrine, judges have much leeway. It is, therefore, hard to predict how the assessment would unfold in a courtroom. The doctrine of strict liability does offer the courts a large room of opportunity. However, this is nothing more than just that, an opportunity.

Norwegian courts may be labelled somewhat conservative and not particularly bold when entering new territory.¹⁵⁰ This attitude can, for instance, be illustrated through the Smoking judgment, where the court acted restrained and did not apply the doctrine. Even though the previous Climate judgment¹⁵¹ did not concern tort law, this is a clear example of Norwegian courts showing conservative tendencies.¹⁵² There are several reasons for this attitude, but when it comes to the climate issue, the political aspects of the question might lead to this cautiousness and reticence. Judges may be afraid of being accused of engaging in court activism and exceeding the limits of the separation of powers. Thus, even if the doctrine of strict liability quite possibly can be applied to major emitters, it is reasonable to believe that courts generally will not be very bold in making use of this opportunity. However, as climate change impacts become increasingly visible and people feel the impacts, it would be difficult to argue against the existence of a ground of liability. Instead, the reasoning could be similar to the Contraceptive pill judgement II¹⁵³ and centre around the causality requirement.

The doctrine of strict liability has never been tried to be invoked in a climate case in Norway, and it remains to be seen what the outcome in such a case would have been. However, after a rational discussion on each requirement, a strong argument can be made to impose strict liability for major emitters causing damage. The interests bearing the responsibility would be visible in such a case and imposing strict liability would align with the doctrine's historical

¹⁵⁰ Ibid.

¹⁵¹ HR-2020-2472-P

¹⁵² Lorentzen (2020)

¹⁵³ RT-1992-64

development. The doctrine of strict liability may very well be successfully deployed on major emitters in the future.

5 Negligence - the duty of care

5.1 Introduction

Another potential ground of liability that may apply to the major private emitters is the unwritten duty of care in Norwegian tort law, often referred to as *culpa* in the literature. Culpa liability is the general non-statutory basis for liability, which provides a basis for liability as a result of irresponsible conduct, provided that the tortfeasor can be blamed for being negligent. Thus, it is the rule for responsibility for negligent or intentional damage. Unless another ground of liability is applicable, culpa applies to all tortfeasors and in all damage situations.¹⁵⁴ It builds upon a basic sense of justice with ethical and moral considerations. The purpose of the norm is to prevent and compensate for damage, and it may be seen as part of the system for enforcement of the law.¹⁵⁵ In the same way as criminal law, the duty of care is a part of the legal sanction system and protects certain interests. Thus, culpa liability can be viewed as a sanction imposed on the tortfeasor because he did not act differently. This form of liability largely resembles that of other European jurisdictions. It was this legal norm the Shell case was based upon.¹⁵⁶

Culpa requires an objective assessment of the conduct and an assessment of subjective guilt.¹⁵⁷ The assessment of the tortious act conceptually distinguishes the duty of care from the strict liability. Objectively, the act must contravene a legal norm and go beyond the legal limits of freedom of action.¹⁵⁸ The act must be unlawful toward the injured party. This assessment will mainly concern whether there has been an act or omission in conflict with the written and unwritten rules of law. Legal norms are not only statuary norms but can also be created through case law or administratively. Subjectively, there must be proven guilt and a basis

¹⁵⁴ Culpa is also codified in specific situation, see e.g., the Norwegian companies act

¹⁵⁵ Hagstrøm (2019) p. 81

¹⁵⁶ Milieudefensie et al. v. Royal Dutch Shell (2021)

¹⁵⁷ Hagstrøm (2019) p. 78

for reproach; the act must be attributable to the tortfeasor as negligent or intentional. The question is whether the perpetrator deviates from what is justifiable and, based on his subjective assumptions, is to be blamed.¹⁵⁹ If the answer to this question is yes, culpa may constitute a ground for liability.

5.2 An unlawful act in Norwegian law?

5.2.1 Unlawfulness

Whether an act is to be considered unlawful is determined after a concrete and discretionary overall assessment,¹⁶⁰where several factors may be considered. The question is whether the act, from an objective point of view, satisfies the requirements for responsible behaviour.¹⁶¹ Traditionally, the content of the standard of care is often sought to be specified by asking what the bonus pater familias, a careful and reasonable 'man', would do in the place of the tortfeasor. This idealized way of acting can be helpful as general guidance in interpreting the unwritten standard of care. The aim is to clarify careful and responsible behaviour in the relevant area of life. Guidance is to be found in more tangible sources as well. General legal sources in Norwegian law are used to interpret and clarify the content of the standard of care.

The natural starting point for the assessment is the relevant norms of conduct that existed at the time of the act.¹⁶² As the legal system is full of norms that indicate how one should behave, these may provide guidance in the interpretation of the unwritten standard of care. Firstly, behavioural norms may be derived from legislation, regulations, or administrative instructions. Secondly, customs from the relevant area of life may inform the interpretation of the standard. Quite often, however, neither written norms nor customs adequately answer whether the action is unlawful. When this is the case, the courts themselves must establish a standard of conduct based on considerations of reasonableness.¹⁶³ Thus, in addition to the more objective sources, norms may be derived from sources with a far more discretionary

¹⁵⁹ Hagstrøm (2019) p. 78

¹⁶⁰ Ibid. p. 81

¹⁶¹ Ibid. p. 84

¹⁶² Ibid.

¹⁶³ Ibid. 'Reelle hesnyn'

character. This means that the unwritten standard, in principle, can be informed by a very wide range of sources. Which sources are relevant and the weight they are given will depend on the particularities of the case in question. The courts have a great deal of freedom to decide whether the behavioural norms flowing from relevant sources will be used as a basis for the culpa assessment.¹⁶⁴

Violations of norms found in laws, custom and reasonableness which exist independently of the tort system do not immediately trigger liability. Instead, they will constitute elements that help the court clarify the content of the standard and are given great importance in the assessment. If relevant behavioural norms exist, violations of them constitute a strong argument for liability to be imposed.¹⁶⁵ If, on the other hand, the tortfeasor has complied with the applicable standards of conduct in the area, his course of action will, as a starting point, be regarded as in line with proper conduct.¹⁶⁶

Suppose it is impossible to establish a breach of a standard of conduct that expressly leads to liability. In that case, it will always depend on a concrete assessment that includes general legal opinions and considerations of reasonableness.¹⁶⁷ Therefore, the assessment cannot be a schematic exercise with clear guidelines. Ultimately, it will be imbued with discretion and assessments of reasonableness. The duty of care is an open-ended and dynamic norm informed by surrounding norms to protect against harm. The standard's content may evolve according to changing social realities and standards. This calls for assessing all relevant circumstances that may clarify the content of the unwritten standard of care.

The characteristics of the unwritten standard of care imply that it is difficult to predict how the assessment will turn out on a general level. Precisely what a court will find relevant in a specific case and how it weighs the various sources is unclear. Below, I will consider various sources and norm sets that might be of interest when assessing behaviour under the culpa norm. By considering these sources, the aim is to clarify the content of the standard of care in Norwegian law in relation to major emitters. The applicability, relevance and potential impact of written laws and regulations, human rights, soft law principles, the UN climate system,

¹⁶⁴ Hagstrøm (2019) p. 99

¹⁶⁵ Ibid. p. 85

¹⁶⁶ HR-2019-318-A para. 40

¹⁶⁷ Hagstrøm (2019) p. 80

customs, and general principles of tort law will be discussed. As these sources must be seen in context and weighed against each other, no conclusions will be drawn under each point. Instead, I will collect the threads and make the legal assessment under the conclusion of unlaw-fulness.

5.2.2 Written laws and regulations which directly regulate the major emitters

It is natural to start the assessment of unlawfulness in written laws and regulations that apply to the actors.¹⁶⁸ In the case of major emitters, it is undisputed that their activity often is thoroughly regulated in laws and regulations; their activity is legal. Emitting vast amounts of greenhouse gases is a permitted activity that produces legal products traded in legitimate markets.

Given the scope of this thesis, I cannot comment upon all written rules applicable to major emitters. However, to illustrate how certain industries are regulated, we can look at the situation of oil and gas companies in Norway. In the case of oil and gas companies, they have been licensed to pollute. Such licenses are granted under the Petroleum Act and the Pollution Act, and the activity is thoroughly regulated. In the previous climate lawsuit, the Supreme Court summarized the regulation in this field:

"(T)he regulation can roughly be divided into three parts; the opening of the field, the exploration phase, and the production phase. Before each phase, there are investigations and assessments in line with the regulations that the phase in question requires. For the opening phase, the main question is whether opening the area for petroleum activities is justifiable and desirable based on an overall assessment of the advantages and disadvantages. Before a license is granted for exploration and extraction, the assessment is primarily linked to which blocks should be advertised based on the chance of discovery. There are public hearings, and the Parliament is involved in several stages. Before extraction and production, the factual consequences of extraction are assessed in more detail."¹⁶⁹ The Petroleum Act §3-1 requires a broad assessment and weighting of various interests and effects the petroleum business may cause.

¹⁶⁸ HR-2019-318-A para. 40 and RT-2002-1283 p. 1286

¹⁶⁹ HR-2020-2472-P para. 65, my translation

Economic effects, environmental and climate consequences, risk of pollution, and economic and social effects are among these interests, and the assessment must cover all stages of the petroleum business.

The above illustrates that the actions of major emitters within the oil and gas industry are not only legal but also thoroughly regulated. This is often the case for behaviour that involves emitting vast amounts of greenhouse gases. If these written norms are properly complied with, it constitutes a strong argument against considering the act unlawful and imposing liability. However, as mentioned earlier, lawfulness and liability are two separate matters. Injured parties need protection against irresponsible and unacceptable activity, even if an activity as such is legal. The fact that the activity is legal cannot mean that the general standard of care is put out of play or that the industry is granted immunity from liability. Thus, compliance with laws and regulations is not necessarily indemnifying. Liability may be imposed even if the applicable written rules have been complied with.¹⁷⁰ Several conditions can affect the relevance and weight of the behavioural norm in the culpa assessment. To what extent the norms inform the unwritten standard of care must be decided after a concrete assessment of the specific case. Some general starting points are worth mentioning, however.

Primarily, it is norms that protect against harm that is of relevance.¹⁷¹ Preventive rules have particularly been highlighted in the literature.¹⁷² Compliance with laws and regulations not meant to protect against harm, such as licenses or authorizations, is not necessarily indemnifying. Rules that will create general guarantees that activity takes place under satisfactory conditions by requiring public permission, authorization, grant, et cetera, for the business to be legal can be taken out of consideration.¹⁷³ From case law, it is clear that compliance with existing regulations does not automatically relieve liability; see, for instance, RT-2006-1519 and RT-2002-1283. In the latter case, the court began by stating that the defendant had complied with the existing regulations. However, their assessment of his behaviour did not stop there, as written rules were only 'one of many components of the assessment'.¹⁷⁴

¹⁷⁰ Hagstrøm (2019) p. 86

¹⁷¹ Ibid.

¹⁷² Kjønstad (2000) who also reference to article by Hagstrøm

¹⁷³ Hagstrøm (2019) p. 87

¹⁷⁴ RT-2002-1283 p. 1286

The purpose of the regulatory framework applying to major emitters is not necessarily to protect against the type of injury that the tort action seeks to compensate. Rather than being preventative, they may be seen as rules that regulate the operation generally. This can be illustrated by again looking at the oil and gas industry. The Petroleum Act¹⁷⁵ regulates petroleum activities in Norway. Article 10-1 sets requirements for sound petroleum operations and states that operations must ensure safety for personnel, the environment, and the economic values the facilities and vessels represent. Further, the preparatory works state that the Act aims to strongly emphasise rational and efficient solutions while maintaining a high safety- and environmental level in all parts of the business.¹⁷⁶ The Act aims to prevent certain negative impacts, for instance, oil spills. Still, according to the Petroleum Act's preparatory work, the Act's purpose is mainly to regulate the petroleum business as such.¹⁷⁷ These written norms provide general guarantees that activity occurs under satisfactory conditions by requiring public permission; they are not rulesets that seek to protect against the damage a tort case considered in this thesis would. The rulesets are not preventive in the sense of protecting against climate-related damage in the broadest sense. Instead of protecting against climate damage as discussed in this thesis, the rulesets protect the local environment and protect much narrower interests. Therefore, such written rules may be less relevant for our assessment. Thus, even though the activity is heavily regulated and obviously legal according to the specific Norwegian legislation, it is not certain that the regulations are relevant or weighs heavily in assessing the unwritten standard of care.

Further, for a written norm to be relevant, it must apply to the situation being assessed.¹⁷⁸ Written norms do not provide guidance for responsible behavior if they do not apply to the situation; they must actually cover the behavior in question.¹⁷⁹ The potential indemnifying effect of written rules must be limited to the activity they regulate. For instance, if written norms only cover a small part of the production or a small part of the emissions, the indemnifying effect must be limited to these parts. When it comes to written rules relating to the behaviour of major emitters, it is clear that there are regulatory gaps here, like in all other legal frameworks. Therefore, one cannot mindlessly point to written rules and legality in the culpa

¹⁷⁵ Petroleumsloven

¹⁷⁶ Ot.prp.nr.43 (1995-1996) para. 1

¹⁷⁷ Ot.prp.nr.43 (1995-1996) para. 8.2

¹⁷⁸ HR-2018-1234-A para. 47

¹⁷⁹ Hagstrøm (2019) p. 91-92

assessment; one must consider the specific ruleset. In all cases where the written norms do not cover the behaviour in question, compliance with the norms cannot automatically exclude liability.

Whether and to what extent written norms will be relevant and added weight in a specific case depends on the particularities of the case in question. One must carefully assess the applicable written norms and their potential relevance. The mere existence of a written norm is insufficient to have an indemnifying effect on the assessment. The regulation may not seek to protect against the harm in question, or there may be gaps in the regulatory framework. These circumstances might lead to the exclusion of the written norm or that it does not alone determine the result of the culpa assessment. Thus, compliance with written rules is not automatically indemnifying. However, if a written norm cannot be excluded, it will be highly relevant and as a starting point taken as a basis for the culpa assessment. Compliance will then provide a strong argument against considering the act unlawful. As major emitter's behaviour generally is thoroughly regulated and legal, this will usually be the main argument against liability.

5.2.3 Human rights laws

Behavioural norms relevant to assessing the activity of the major emitters may flow from other rulesets, such as human rights laws and instruments. The Norwegian Constitution article 112 establishes the right to a healthy environment. Further, articles 2 and 8 of the European Convention for the Protection of Human Rights and Fundamental Freedoms (ECHR) and Articles 6 and 17 of the International Covenant of Civil and Political Rights (ICCPR) protect the right to life and the right to respect for private and family life.¹⁸⁰ These rulesets are intended to protect against harm and could be relevant in interpreting the unwritten standard of care.

¹⁸⁰ This right is also protected in the Norwegian Constitution art. 102 which is partly based on the mentioned articles in ICCPR and the ECHR. The similarities are great and art. 102 is to be interpreted in light of these instruments, RT-2015-93 para. 57. Here, the focus is on ICCPR and ECHR as there is practice in the climate context tied to them

The Human Rights Act Article 3 has incorporated ECHR and ICCPR into Norwegian law with a semi-constitutional rank.¹⁸¹ Just like Article 112 in the Constitution, they will override national law in case of conflict. One could question, however, whether these rulesets are relevant when assessing the conduct of private actors. Article 112 is placed in the human rights chapter of the Constitution and explicitly mentions that the state authorities must take measures. Usually, the human rights apply in relationships between the state and its citizens and cannot be directly invoked with respect to private companies. The same could be said for the obligations of ECHR and ICCPR. The conventions are signed by states, which are the primary subjects in international law. Consequently, non-governmental actors are not obligated by international human rights conventions. Nevertheless, these instruments are arguably relevant when assessing the behaviour of private actors.

Regarding Article 112 in the Constitution, there are statements in the preparatory work which may indicate that the Article is relevant not only to public authorities but also to private actors.¹⁸² It is stated that the provision's first and second paragraphs will be an important factor when interpreting regulations and that the principles also will be applied when it comes to environmental problems on which the legislators have not taken a decision.¹⁸³ In light of these statements, environmental considerations will form a backdrop, and different rulesets must be interpreted in accordance with the environmental clause's principles and rights. Thus, as the clause is set to be an important factor when interpreting other legislation, it should be used to inform the culpa norm and is relevant when assessing the conduct of a major emitter.

Concerning the relevance of ECHR and ICCPR in relation to private actors, there are grounds for claiming that companies are expected to act in accordance with fundamental human rights. Article 2 of the Transparency Act¹⁸⁴ establishes that the Act applies to larger businesses domiciled in Norway and larger foreign businesses that offer goods and services in Norway and pay tax in Norway. The law requires these actors to identify and assess actual and potentially negative consequences for fundamental human rights that the business has either caused or

¹⁸¹ Menneskerettighetsloven art. 3 establishes that the provisions in the conventions and protocols implemented in the law shall take precedence in the event of conflict with provisions in other legislation. The provisions in ECHR and ICCPR are not given constitutional status, but the Human Rights Act establishes a statutory rule of precedence

¹⁸² Mestad (2021)

¹⁸³ Innst. S. nr. 163 (1991–92) p. 6

¹⁸⁴ Åpenhetloven

contributed to and to implement suitable measures to stop, prevent or limit negative consequences.¹⁸⁵ When speaking of fundamental human rights, the act includes ECHR and IC-CPR.¹⁸⁶ Thus, private actors subject to the Transparency Act are obliged to comply with these rulesets. They are thereby relevant when assessing the conduct of certain private actors and should be included in interpreting the unwritten standard of care.

Article 112 in the Constitution and ECHR and ICCPR are relevant in the culpa assessment, influencing the standard of care. Article 112 in the Constitution states that everyone has the right to a nature where productivity and diversity are preserved. The provision also protects future generations by requiring natural resources to be managed in a versatile and long-term way. The Supreme Court has, regarding the state's obligations, stated that the provision might give the 'right and duty' to refuse approval to extract oil and gas if the 'consideration for the climate or environment' so indicates.¹⁸⁷ The provision includes protection of the climate, which, based on climate and environmental considerations, may imply restrictions on what actors could do. Article 112 certainly intends to protect against climate deterioration.

However, the exact content of the provision is unclear, and the Supreme Court has not elaborated on what 'considerations of the climate or environment' entails. This lack of clarification leaves considerable room for interpretation and application, and it is difficult to say where the threshold is to be set. Nevertheless, there is an argument to be made that the Article must be assessed in light of climate science.¹⁸⁸ As the provision is intended to protect against climate deterioration, research indicating how this can be achieved would be a sensible guideline. Regardless of the exact threshold, the provision seeks to protect and emphasize environmental considerations. Thus, as this provision is important when interpreting the culpa norm, it implies that climate considerations must be heavily emphasized in the assessment. Article 112 points in the direction of considering behaviour which most obviously causes significant harm to the climate as unlawful in this context.

Regarding the ECHR, the European Court of Human Rights has yet to authoritatively decide on its application to greenhouse gas emissions. However, at the time of writing, the Grand

¹⁸⁵ The Transparency Act art. 4

¹⁸⁶ Prop. 150 L (2020-2021) to art. 3

¹⁸⁷ HR-2020-2472-P para. 223

¹⁸⁸ Sjåfjell (2016)

Chamber is set to consider three such cases against states.¹⁸⁹ They are of enormous importance and could be groundbreaking for the climate issue. The cases will be able to clarify the obligations that human rights impose on states in the climate field. Pending these decisions, we can look to UN Treaty Bodies and national courts. There are several examples of these institutions recognizing that dangerous climate change threatens the right to life and physical integrity and requires emission cuts to avert real and serious harm.¹⁹⁰ Regarding Article 6 in ICCPR, the right to life, the UN Human Rights Committee stated that 'environmental degradation, climate change and unsustainable development constitute some of the most pressing and serious threats to the ability of present and future generation to enjoy the right to life'.¹⁹¹ The UN Special Rapporteur on Human Rights has further concluded that '(T)here is now global agreement that human rights norms apply to the full spectrum of environmental issues, including climate change'.¹⁹² On this basis, I conclude that human rights are applicable for the protection against dangerous climate change. Similar to Article 112 in the Constitution, including ECHR and ICCPR in the assessment indicates that the standard must be set high in a climate context. Emitting vast amounts of greenhouse gases creates dangerous climate change, threatening fundamental human rights. This may speak in favor of characterizing major emitters' behaviour as unlawful in the concrete context of possible liability.

5.2.4 Soft law principles

In addition to laws and regulations found in Norwegian law, other written norms may be included in interpreting the unwritten standard of care. Soft law instruments, such as the UN Guiding Principles on Business and Human Rights (UNGP), the UN Global Compact (UNGC) and the OECD Guidelines for Multinational Enterprises, set out the responsibilities

¹⁸⁹ Klimaseniorinnen v. Switzerland (filed 2020); Carême v. France (filed 2021); Duarte Agostinho and Others Portugal and 32 other states (filed 2020). ECHR are also set to decide on the previous Norwegian climate case, Greenpeace Nordic and Others v. Norway (filed 2021)

¹⁹⁰ See e.g., in UN Treaty bodies: UN Human Rights committee (2016) para. 62; Joint Statement by CESCR, CEDAW, CMW, CRC and CRPD, Human Rights and Climate Change (2020) para. 3; CRC, General Comment No. 15 on the right of the child to the enjoyment of the highest attainable standard (2013); in National courts: Commune de Grande-Synthe v. France (2020) para. 3; Neubauer, et al. v Germany (2021) para.147–148; Urgenda Foundation v. State of Netherlands (2019) para. 5.6.2

¹⁹¹ UN Human Rights committee (2016) para. 62

¹⁹² UN Special Rapporteur on Human Rights and the Environment (2020)

of businesses in relation to human rights.¹⁹³ These instruments may be seen to complement each other and are endorsed by the international community as agreements on how responsible businesses should work.

These instruments are soft law, meaning they do not create any new rights or establish legally binding obligations. Instead, they function as recommendations. Therefore, legally speaking, neither courts nor companies are bound by these norms. Still, these instruments might be relevant for a Norwegian court when assessing behaviour under the culpa rule. The content in the principles is universally endorsed and reflects current values. All OECD countries have undertaken to promote the OECD guidelines, and they have established National Contact Points. The Norwegian authorities expect Norwegian businesses to use the guidelines.¹⁹⁴ This is reinforced by the fact that the above-mentioned Transparency Act is based on the UNGP and the OECD guidelines.¹⁹⁵ According to the Act itself and its preparatory work, businesses are expected to be aware of and comply with the UNGP and OECD guidelines.¹⁹⁶ Hence, Norwegian law has a presumption that the principles are complied with.¹⁹⁷ When this is the case, behavioural norms may flow from these rulesets and are relevant in interpreting the unwritten standard of care.

The soft law principles reinforce what emerged from the human rights laws discussed above. Additionally, certain statements elaborate on companies' responsibilities concerning the climate. For instance, the OECD guidelines include the following statement:

'Enterprises should, within the framework of laws, regulations and administrative practices in the countries in which they operate, and in consideration of relevant international agreements, principles, objectives, and standards, take due account of the need to protect the environment,

¹⁹³ UN Guiding Principles on Business and Human Rights, United Nations Global Compact, OECD Guidelines for Multinational Enterprises

¹⁹⁴ Norwegian Ministry of Foreign Affairs (2018) and Meld. St. 6 (2022–2023) para. 9.5.3 on state-controlled companies such as Equinor

¹⁹⁵ A new development, also seen in EU law, is that these norm sets are directly included in legislative instruments. In such instances, the rulesets are not soft law, but legally binding rulesets which may inform the standard of care

¹⁹⁶ Prop. 150 L (-2021) para. 1

¹⁹⁷ This could in some instances also flow directly from the Transparency Act itself, as e.g., Art. 4 oblige businesses to carry out due diligence assessments in line with OECD guidelines

public health and safety, and generally to conduct their activities in a manner contributing to the wider goal of sustainable development. In particular, enterprises should:

(...)

Consistent with the scientific and technical understanding of the risks, where there are threats of serious damage to the environment, taking also into account human health and safety, not use the lack of full scientific certainty as a reason for postponing cost-effective measures to prevent or minimize such damage'.¹⁹⁸ Further, in the commentary to principle 19 of the UNGP, it is stated that 'If the business enterprise has leverage to prevent or mitigate the adverse impact, it should exercise it'.¹⁹⁹

The statements found in the soft law imply that a significant degree of climate action is expected from companies. Keeping up business as usual without implementing climate measures will, in my opinion, violate these principles. Thus, as I have found that the soft law discussed above is relevant in interpreting the unwritten standard of care, they speak in favor of underlining environmental considerations. Again, this points toward viewing the major emitters' behaviour, which is extremely harmful to the environment, as unlawful.

5.2.5 UN climate system

Behavioural norms may also be drawn from the UN's climate system. The United Nations Framework Convention on Climate Change (UNFCCC) is an international treaty with nearuniversal membership. The Paris Agreement and Glasgow Climate Pact have been adopted as an extension of the Convention. The UN climate system applies to its signatories, which are states, and the goals are non-binding for companies. Thus, this material cannot be directly invoked in relation to private entities. Still, I argue that it should be relevant when assessing behaviour under the culpa rule.

The goals and reduction rates in the UN system are based on IPCC reports. As recognized by the Norwegian Supreme Court, these reports are considered the most important and best

¹⁹⁸ OECD Guidelines for Multinational Enterprises 2011 Edition p. 35

¹⁹⁹ Guiding Principles on Business and Human Rights Commentary p. 22

scientific knowledge base on climate change.²⁰⁰ The IPCC reports reflect objective scientific consensus and has been relied upon by foreign courts to determine necessary emission cuts.²⁰¹ Thus, even though the UN climate regime is non-binding towards private entities, the regime represents a universally endorsed and accepted standard for mitigation. The international consensus reflected in the agreement could be viewed as a minimum expectation for necessary action in society at large. Further, several companies have publicly endorsed the UN climate regime. For instance, Equinor states on its website that they support the Paris Agreement and a zero-emission target for society.²⁰² Especially in such a case, it would be appropriate to regard the material as relevant for the culpa assessment.

As the material, in many cases, is relevant for the assessment, it can significantly impact the standard of care demanded. Admittedly, the pathways pointed out by IPCC are potential and include many variables and alternatives. There is no answer to whether and how the different scenarios can be translated into contributions of various actors and sectors. Thus, we have no worldwide uniform approach with a standard uniform path for reducing emissions. Still, no matter the exact pathway or the exact actor involved, IPCC outlines extensive obligations and requires drastic measures. Their report stated that model pathways with no or limited overshoot of 1.5 C require global net anthropogenic CO2 emissions to decline by 45 per cent from 2010 levels by 2030, reaching net zero around 2050.²⁰³ Thus, to reach the aim of the UN climate regime and its temperature goals, it is recognized that extensive carbon dioxide emissions cuts are necessary.²⁰⁴ This is a widely endorsed consensus. By including the UN climate regime in the interpretation of the unwritten standard of care, the bar is set high. Major emitters' behaviour will likely fall short of the standard unless they take drastic measures. This material speaks in favour of characterizing their behaviour as unlawful.

²⁰⁰ HR-2020-2472-P para. 50

²⁰¹ Urgenda Foundation v. State of Netherlands (2019); Neubauer, et al. v Germany (2021); Milieudefensie et al. v. Royal Dutch Shell (2021)

²⁰² Equinor (2023)

²⁰³ IPCC Mitigation Pathways Compatible with 1.5°C in the Context of Sustainable Development (2018) p. 95

²⁰⁴ Decision -/CP.26 para. 17

5.2.6 Customary duties

If written norms of conduct do not provide sufficient guidance, the courts may seek support for their assessment in customs.²⁰⁵ In light of the above-mentioned bonus pater familias standard, it is natural to add weight to custom in the culpa assessment when the custom is known and recognized within the relevant area of life as a proper course of action. The Supreme Court has previously stated that 'the starting point must be that the person who has acted in accordance with the usual standard of care is exempt from liability'.²⁰⁶ Thus, the custom is clearly relevant in assessing the unwritten standard of care.

Established practice can be expressed in several ways. It can, for instance, be investigated empirically by examining the actual practice is among the actors in a particular area. Regarding the major emitter's behaviour, their activity is definitely customary. Emitting vast amounts of greenhouse gases is a permitted activity that produces legal products traded in legitimate markets. Major emitters exist worldwide, and their activity has been usual since the industrial revolution. This is undisputed and will, especially when held together with legality, constitute a strong argument against considering the act unlawful and imposing liability.

However, the courts have full access to carry out a qualitative post-censorship of the acquired custom.²⁰⁷ For instance, the custom may have stemmed from old, entrenched ways of doing things, or the standard may never really have measured up against the level of care one could expect. The point in this regard is that one cannot accept that actors adopt careless behavior to save time, effort, or money to set their uncontrolled standards at the expense of the rest of the community.²⁰⁸ The most prominent example of such censorship of custom can be found in RT-1950-1091, where the defendants pleaded that safety measures were no better among others in the industry. To this, the court responded, 'if it is the case as stated by the company here, in my opinion, it only shows that neither these other companies can have thought through sufficiently what security measures must necessarily be required'.²⁰⁹ Because of this,

²⁰⁵ Hagstrøm (2019) p. 99

²⁰⁶ RT-2013-312 para. 31, my translation

²⁰⁷ Hagstrøm (2019) p. 103

²⁰⁸ Ibid. p. 103

²⁰⁹ RT-1950-1091 p. 1093, my translation

the existing custom was not added weight in the assessment. Thus, compliance with existing customs is not necessarily indemnifying; the effect must be assessed in the specific case.

Arguably the custom of major emitters should be disregarded, or at least that other norm sets and aspects are given more weight, in a culpa assessment. Society is in a transition period where science is becoming more evident every day, we must mitigate and make the green shift. Today, we know that emitting vast amounts of greenhouse gases is hugely problematic. Customs in conflict with this, originating from a time when we did not have the same scientific knowledge about climate change, may no longer be seen as relevant or added weight in the assessment. There are several examples of society breaking with old customs based on new understanding.²¹⁰ I believe this should also happen in the case of emissions, as science today gives us a completely different understanding of the harmfulness of the emitting activity than it did before. It may be said that the standard the major emitters set never really measured up. Thus, that the conduct is in line with established practice does not necessarily preclude the conduct from being characterized as unlawful. In any case, a concrete assessment must be made, and the case's particularities will be of great importance.

5.2.7 General Principles of tort law as a balancing factor

Written rules and customs and their possible influence on the unwritten standard of care have been assessed in the preceding. Often, however, these sources of law will not provide an answer as to whether the action is unlawful. When written and customary behavioural norms are insufficient to assess the behaviour, the court must construct a standard of care based on considerations of reasonableness. The legal system opens to the outside world by including considerations of reasonableness.

As mentioned in Chapter 1.4, considerations of reasonableness are an open category where it can be challenging to specify a positive criterion for which arguments can be emphasized. A clear starting point, however, is that a judge must keep political and personal preferences out of consideration. Nevertheless, drawing the line between reasonableness and policy

²¹⁰ E.g., tobacco

considerations can be challenging. This is especially true when the legal question also has political aspects. What constitutes acceptable use of considerations of reasonableness in the legal context will largely depend on the facts of the specific case, and the assessment will, by virtue, involve subjective elements. The judge's own assessment of whether the action is to be considered unlawful will be critical here. Thus, this part of the culpa assessment is imbued with discretionary and concrete assessments.

Given these characteristics, it is difficult to comment upon the current state of the law with certainty and predict how the assessment in a climate case would play out in the courtroom. I will therefore limit myself to commenting on specific considerations highlighted in case law, with the aim of clarifying how these may impact the culpa assessment in relation to major emitters. When interpreting the unwritten standard of care, the damage capacity, the utility value of the harmful action, and the possibility and cost of averting damage have particularly been emphasized as relevant.²¹¹

First, a court would likely assess the act's capacity for harm. There must be a dangerous act for liability to be applied. The risk of causing damage associated with the activity must exceed what is considered acceptable in the given situation or activity.²¹² Courts apply considerable importance to how damaging the action is, which is discussed in almost all judgment premises concerning compensation.²¹³ The point is that the extent of the capacity to harm provides the basis for assessing the requirements that can be placed on responsible behaviour.²¹⁴ The more significant the danger or risk, the greater caution must be exercised.²¹⁵ The probability of damage and the extent of the possible damage will constitute the damage capacity. This assessment was made under point 4.3, and the same will apply here. The damage capacity of the emitting activity of major emitters is vast. Thus, much must be required of them.

Secondly, after establishing the damage capacity, a balancing of interest would likely be carried out. The potential for damage would be assessed against the considerations that argue that the action should be carried out. Prosser's statement on US law is suitable for the

²¹¹ Hagstrøm (2019) p. 104

²¹² Ibid.

²¹³ See e.g., RT-1958-984; RT-1934-204; RT-1950-1091; RT-1967-697; RT-1974-41

²¹⁴ Hagstrøm (2019) p. 81

²¹⁵ RT-1986-292

understanding of Norwegian law as well: 'It is fundamental that the standard of conduct which is the basis of negligence is usually determined upon a risk-benefit form of analysis: by balancing the risk, in the light of the social value of the interest threatened, and the probability and extent of the harm, against the value of the interest which the actor is seeking to protect, and the expedience of the course pursued'.²¹⁶ The point is that a reasonably large degree of danger could be accepted if actions are very beneficial and cannot be prevented through reasonable measures. It is not desirable that the threat of liability should put a damper on beneficial actions for society.

Exactly where to draw the line in the risk-benefit analysis will depend on the case in question. How beneficial is the action, is it possible to avert the damage, and what is the cost of this? Here, the sacrifice that a different course of action would entail for the perpetrator is essential, and it must be seen in the context of the action alternatives' effectiveness as a damage prevention measure.²¹⁷ Suppose a measure only marginally reduces the risk of harm. In that case, there is less reason to demand such an action alternative to be chosen than if the risk is eliminated or significantly reduced. If damage could just as easily have been avoided, the action would be considered unlawful.²¹⁸ This means that if the equivalent utility can easily be achieved in ways that do not have anywhere near the same damaging ability, this must generally be required.

As mentioned earlier, the activity of most major emitters may be considered to have had great utility value and benefit society. They have provided products and goods people rely upon. Energy companies especially still play a significant role in the welfare of society. However, suppose you put the benefits of the emitting activity of the major emitters up against the damage the emissions will cause. In that case, it is no longer easy to see the significant advantages of such behaviour. Arguably, the activities of the major emitters, which lead to exceptionally high emissions, cause more harm than good. The actual cost of the emitting activity of the major emitter is so enormous and harmful that it is challenging to characterize it as advantageous. This is especially true if the major emitters can mitigate and thereby avert damage.

²¹⁶ Prosser (1984) p. 173

²¹⁷ Hagstrøm (2019) p. 112

²¹⁸ Ibid. p. 110

So, what possibility do the major emitters have to avert damage, and at what cost? While a complete energy transition requires time, companies have significant potential to mitigate; much can be done in the short term. Companies can electrify operations and boost energy efficiency in order to reduce emissions. Companies could also receive their energy from low-carbon energy sources or renewables. By decarbonizing power and fuel, companies would take important steps toward more environmentally friendly production. However, such a decarbonizing lead to an increase in demand for electricity. Achieving such an increase in zero-carbon energy supply requires a significant and costly transformation. Thus, one of the most important things companies can do to make a green transition is to invest in new technology and infrastructure. By taking these steps, a wide cross-section of industries could decrease greenhouse gas emissions. Companies can make changes towards more sustainable production; concrete emissions cuts are already highly technically feasible and entirely doable alternatives.

The sustainable action alternatives may be cost-effective as well. When considering the price, one must remember that the transition is happening anyway. Even if renewables are far from dominating the energy market today, things are changing. According to the IEA World Energy Outlook for 2022, demand for fossil fuels is expected to peak within 15 years.²¹⁹ They state that demand is set to peak or plateau under all their future scenarios.²²⁰ The Bloomberg New Energy Outlook 2022 also predicts that fossil fuels will reach their peak shortly, and demand will fall.²²¹ It is impossible to predict precisely how this will play out. Still, there is consensus that the transition is happening. Thus, business as usual in the oil and gas industry will not work long-term, and the action options must be implemented as society is transitioning. Consequently, the cost that comes with the transition arises either way. The question is only how long we wait before implementing this change; imposing liability could speed this up. Therefore, one should look more leniently at the potential cost of transitioning.

Further, transitioning to net zero might also bring economic opportunities. The opportunities could be considerable if companies can tap into growing markets as the world transforms to net zero. Mckinsey point at mainly three categories of opportunity for companies. First, through decarbonizing processes and products, which can make them more cost-effective in

²¹⁹ Cuff (2022)

²²⁰ IEA (2022)

²²¹ BloomBerg (2022)

some cases or make them tap into new markets for relatively lower-emissions products; second, from entirely new low-carbon products and processes that replace established high-carbon options; and third, through new offerings to support productions in the first two categories.²²² On the other hand, not being a part of the transition would come at a cost. Much like companies that do not adapt to the technological revolution, companies that do not adapt their production to be more environmentally friendly will fail in the long run.

No matter how we measure, and despite economic opportunities in the long term, it might be costly for the individual company to mitigate and join the transition. Nevertheless, stricter requirements are imposed the more dangerous the action is.²²³ Since climate-related damage concerns essential values such as public health and life expectancy, very strict requirements must be placed on the industry. This is particularly true when companies are exposing children and youth to risk.²²⁴ Thus, in the context of climate change, one could argue that the cost issue would not outweigh the social value and extent of harm, even more so when the costs involved in coming to terms with the looming threats are more bearable if we do not leave it till too late. The compelling common interest that is served by imposing liability arguably outweighs the negative consequences a company might face and the commercial interest of a company. Thus, considering the magnitude and seriousness of the threats of climate change, the cost of mitigation might not serve as a valid justification for inaction.

Moreover, liability which can facilitate preventive action can be justified because the cost of the consequences of climate change in the case of inaction will far exceed the cost of preventing them. The dangers of climate change have been evident for decades, and the major emitters have had plenty of time to make steps toward the green shift. Reports of adverse effects came early, and companies have had much time to assess the situation in the past years. When an actor has had plenty of time to consider alternative courses of action, the requirements must often be stricter.²²⁵ As it has become clear that the harmful effects were enormous, ever stricter requirements could be placed on the industry.

²²² Mckinsey (2022)

²²³ RT-1959-1244 and RT-1989-674 on the one side and RT-1960-429 and RT-1980-1272 on the other

²²⁴ RT-1988-1272

²²⁵ Hagstøm (2019) p. 114

In this context, a counterargument against imposing liability will likely be that it will not effectively prevent climate-related damage as other actors will take over their place. There are at least two crucial objections to such an argument. First, the validity of such a claim is highly uncertain. No definitive research has considered all factors and concluded that an actor would be replaced one by one by other parties if they mitigate. In this regard, I agree with the European Network of National Human Rights Institutions, which has stated that: 'it would not be appropriate to base this assessment on speculations of market substitution. Just as a State cannot evade its responsibility for contributing to climate harm by pointing to emissions in other States, it cannot evade its responsibility by pointing to the hypothetical emissions of others'.²²⁶ Secondly, the fact that other companies are doing something unlawful and that one company cannot solve the climate crisis alone does not absolve companies of their individual responsibility. If an environmental impact is found to be unacceptable, the environmental impact does not become acceptable because a hypothetical and uncertain alternative development might also cause the same unacceptable environmental impact.

To sum up, the damage capacity of the major emitters is vast, their utility value can no longer be assumed to be as high considering alternative ways of producing energy, and they have the possibility of reducing risk. The latter can often be done effectively and at a reasonable cost. Due to the severe threats and risks large emissions cause, the requirements must be strict, and companies may be required to take drastic measures. Because of this, one may argue that considerations of reasonableness indicate that actions which lead to large emissions are unlawful. However, as this is a discretionary assessment, it may turn either way. How considerations of reasonableness are weighted and how they are understood will depend on both the case and the judge in question. Thus, predicting how such an assessment would play out in court is difficult.

5.2.8 Conclusion unlawfulness

As the duty of care is an open-ended standard informed by surrounding norms, and it is dynamic and imbued in discretionary assessment, there are no clear-cut answers as to whether

²²⁶ Written observations in application no. 39371/20 para. 18

the actions of major emitters are unlawful. The culpa norm will partly depend on how the individual culpa elements are legally weighted, partly on the facts in these cases in general and partly on the facts in the individual case. It is not possible to provide an exhaustive list of potentially relevant sources, conclude on how they will be considered, and decisively comment on the weight they will be given in a general overview of the assessment. There must be made a specific assessment in every case where peculiarities can make huge differences. With that being said, the review above shows that, in general, a lot of material is relevant to inform the duty of care in Norwegian law in relation to major emitters. This material points in different directions and must be weighed against each other.

Written norms applicable to major emitters are the starting point of the culpa assessment and would provide both the main and the strongest argument against liability in most cases. Actors acting in compliance with such norms, held together with the fact that they comply with existing customs, have a strong defence against liability. Still, peculiarities of the case, for instance that the norms are not preventive or that there are regulatory gaps, may make these norms less relevant or that they are given less weight in the overall assessment. Further, I have argued that there is good reason for courts to censor the existing custom. In that case, compliance with applicable written norms and customs is far less deceive.

Human Rights laws, soft law, and the UN regime can impact the standard of care and tilt the case in favour of considering the behaviour of major emitters as unlawful. These instruments indicate that much may be demanded in the climate context. The inclusion of this material, and the possible weight of it, will likely be controversial and heavily debated in a potential court case. Nevertheless, as I have shown, this material is relevant and should therefore be given the same weight as other relevant material in the assessment. As these sources seemingly point in a different direction than written norms and customs, the general principles – considerations of reasonableness – will play a crucial role. I have shown that such consideration may indicate that the behaviour of major emitters is unlawful. Still, this part of the assessment is imbued with discretionary and concrete assessments and will involve subjective elements. Thus, the assessment leaves considerable leeway for courts. As the sources of law appear today, courts would have the possibility of concluding either way. Tort law is flexible enough to consider emitting behaviour as unlawful.

Even though courts have the possibility to consider the behaviour of major emitters as unlawful, my prediction is that Norwegian courts will not do so in the foreseeable future. This is a delicate matter with clear political aspects, just like the previous climate case. As mentioned under the assessment of strict liability, Norwegian courts have previously shown cautiousness and reticence and can be viewed as conservative. The same will presumably be the case if a climate lawsuit based on culpa liability is brought before the courts. If courts enjoy considerable leeway, this may be used as a resort to avoid taking the difficult stand to consider the behaviour as unlawful in this highly controversial question.

5.3 Subjective assessment

If an act is unlawful, there is a presumption of liability.²²⁷ Nevertheless, unlawfulness alone is insufficient to invoke culpa liability. Culpa also requires subjective guilt, which means you can blame the tortfeasor for having acted in a certain way that led to the injury.²²⁸ As ordinary negligence is typically sufficient to incur liability within tort law, it is rarely necessary to distinguish between different fault forms. Liability is not increased by gross negligence or intent.²²⁹ Nevertheless, compensation may be given for actions that usually do not trigger liability if gross negligence or intent is ascertained.²³⁰

The subjective element of the culpa rule is tied to the tortfeasors' knowledge and personal assumptions. The main question is whether the tortfeasor realized, or ought to have realized, that the act had properties that would make it unlawful and if he can be blamed for not having prevented the risk from materializing.²³¹ Here, the risk's objective visibility and the action alternatives are of interest. When assessing the knowledge of the tortfeasor, an objective standard is used as the starting point. It is sufficient for liability that a normally equipped person would have had the knowledge and should have avoided the damage.²³² Despite this, the standard may vary. Personal circumstances can be considered in that the perpetrator should,

²²⁷ Hagstrøm (2019) p. 159

²²⁸ Andenæs (2016) p. 216

²²⁹ RT-2015-216

²³⁰ Hagstrøm (2019) p. 162

²³¹ Ibid. p. 159

²³² Ibid.

due to his abilities, have discovered risk points that the average person would not have seen.²³³

It is an assumption in Norwegian law that anyone who acts unlawfully can be blamed.²³⁴ If the tortfeasor is aware or should have been aware of the potential for damage, he has acted culpably. In other words, only the excusable mistake of fact is exempt from liability. One must therefore ask whether there were circumstances of which the tortfeasor could not reasonably have been aware.

In the case of the major emitters, they have had knowledge of the damaging effects of their emissions for a long time. IPPC produced its first report in 1990, and in 1992 governments established the UNFCCC. At this point, the international community was fully aware of climate change and the need to mitigate to prevent dangerous anthropogenic interference with the climate system. When the UN framework was put in place, the risks tied to emissions were objectively visible. One should have been aware of the risks at this point. It must be required that those who produce, import, or sell goods must think through the dangers of the production, at least when this is so well documented. Given the objectified standard, assessing what each actor knew is not necessary. A normally equipped person knew at the time, which must also be expected from professional actors.

For some companies, it is also established that they were amongst the first to know about the harmful consequences of the emitting activity, yet derailed and undermined science around climate change.²³⁵ These companies manipulated science, public opinion, and politicians to delay actions that might have threatened profit.²³⁶ This behaviour has apparent similarities to the behaviour of the tobacco industry. For decades this industry developed strategies that downplayed the problem; they knew they sold harmful products, yet funded denial of public health science and used deceptive advertising and PR to protect assets rather than customers.²³⁷ When it is possible to establish that such behaviour has taken place, it is a matter of intent.

²³³ Ibid. p. 167

²³⁴ Ibid. p. 159

²³⁵ McGreal (2021); Hall (2015); Wilson (2021)

²³⁶ McGreal (2022)

²³⁷ Eubanks (2022)

Thus, the major emitters have had knowledge of the damaging effects of emissions, and they have had action alternatives and a call to act differently. Instead of implementing sustainable alternatives, companies have simply maintained production and delayed climate action. The emitting activity has been a deliberate one. For decades, major emitters have consciously tolerated and continued to emit vast amounts of greenhouse gases, even though they were aware of the dangers of climate change. The degree of the fault must be assessed in the specific case. Nevertheless, on the assumption that the act is unlawful, the above-mentioned suggests that subjective guilt has been demonstrated.

5.4 Conclusion negligence

Culpa requires that an act is both unlawful and negligent. The assessment of whether the behaviour is in line with the duty of care will be imbued in discretion and normative assessments, where different value positions may lead to varying opinions of what ought to be done. Identifying and clarifying the appropriate value judgment is complex, and the solution will involve some choices. A wide range of sources can be relevant to the assessment and point in different directions. Thus, the assessment leaves considerable leeway for courts. Tort law is flexible enough to consider emitting behaviour as unlawful, but given the character of the assessment, it is hard to predict how it would unfold in a courtroom. If the activity is considered unlawful, it would be reasonable also to conclude that subjective guilt has been demonstrated.

To bring a claim under negligence will by no means be straightforward. Still, it cannot be excluded that courts would be willing to apply well-established concepts to a new set of cases. As pointed out in literature relating to negligence in other jurisdictions, this basis of liability can potentially be invoked.²³⁸ Even more importantly, this ground of liability has now successfully been deployed in a court case, as the Shell judgement represents a global first.²³⁹ The legal construction of negligence have major similarities across jurisdictions, and Norwe-gian Courts could use a fairly similar approach to the one used by the Hauge Court in the Shell case. It is not unthinkable that this could happen in Norway.

²³⁸ Faure (2011) p. 176 and 215

²³⁹ Milieudefensie et al. v. Royal Dutch Shell (2021)

Nevertheless, as the legal situation appears today, it is natural to assume that the courts would exercise restraint in such a question. As there are strong arguments, especially the legality and existing custom, which might speak in favour of characterizing the behaviour as lawful, courts may easily reject liability. Plaintiffs may struggle to convince the courts that the emitting behaviour is unlawful. Norwegian courts appear somewhat conservative, and they will presumably make use of the legal leeway and be more comfortable leaving the issue to political bodies by rejecting this ground of liability. The requirement of unlawfulness under culpa makes it likely more challenging to fulfil the requirements of this ground of liability than for strict liability. However, as the effects of climate change become more visible and science ever more apparent, it will become harder to deny liability on this ground in the future.

6 Causation

6.1 Introduction

The last requirement that must be established in a tort case is causation. This entails that one must establish a link between an actor's behaviour and subsequent harm to another. The damage must be considered to have been caused by the tortious act. It is obvious why this is a fundamental requirement in tort law; no one is to be liable for damage they did not cause.

Whether there is causation is both a factual and legal question. Factual causation concerns the scientific relationship between the defendant's action or behaviour and the alleged injury. An actual assessment of cause and effect must be made, and one asks whether the act was a necessary condition for the injury. Legal causation, however, implies something different. In addition to being a necessary condition for the damage, the act must be significant, have sufficient causal capacity to cause the damage, and the consequences cannot be inadequate.

The proof required for the existence of a causal connection is a preponderance of probability. It must be more likely than not, more than 50 per cent likely, that the wrongful act causes the damage.²⁴⁰ The injured party, the one claiming compensation, has the burden of proof that the tortfeasor is the cause of the damage.²⁴¹ Thus, the injured party bears the risk of doubt.²⁴² In the past, plaintiffs in climate litigation cases have suffered under this.

The requirement of causality has been and is still viewed as one of the most significant barriers against applying tort law to the issue of climate change. Establishing causation in the specific case has been considered nearly impossible. This is no surprise, given the scope and complexity of the climate crisis. The nature of the issue has several implications for the causality assessment. First, it is extremely difficult to satisfy the restrictive but-for test when it comes to climate change, an issue with complex causal relationships. The more complex the case and causes, the more difficult it is to establish causality. A plaintiff faces significant obstacles when trying to single out the defendant's behaviour as a necessary cause for the harm. Despite exciting scientific developments, we have yet to see a court establishing specific causation in a climate litigation case.²⁴³

Secondly, almost every human being on earth is contributing to the issue of climate change or benefits from emissions in one way or another. This is true even for the most climate-friendly among us.²⁴⁴ An actor's contribution might have been an extremely small amount in the big-ger picture, but it still contributes to the issue and the resulting damage. Because of the extraordinary number of emitters, the potential list of defendants could potentially be exhaustible. It would, however, be unreasonable and unsustainable if any causal factor connected with the damage should incur liability, however insignificant or peripheral it may be. Thus, it is necessary to delineate the defendant's class and to limit the potential liability. What sort of emissions are relevant causes in a legal context?

Thirdly, because climate change is a highly complicated phenomenon, science will be very prominent in such a case. Other expertise than the legal one is essential. The causal chain one must establish would run from an actor's emissions to global warming, to regional warming,

²⁴⁰ HR-2018-874-A para. 11

²⁴¹ RT-2001-320

²⁴² Ibid. p. 329

²⁴³ This might change soon, see for instance Luciano Lliuya v. RWE AG (filed 2015). Milieudefensie et al. v. Royal Dutch Shell (2021) was a successful tort law case, but the judgement concerned injunctive relief. Thus, there was no need to establish specific causation. This is different with compensation claims

²⁴⁴ See e.g., Mitt klimaregnskap (2021)
to a climate impact, and lastly to the specific damage. Highly advanced knowledge is required to create such a chain, and the level of existing science will be decisive. To a large extent, a court case would be a battle of the facts. Today plaintiffs are armed with a growing body of evidence linking increases in anthropogenic greenhouse gas concentrations to specific impacts. The existing body of detection and attribution research is now quite large, and the findings are sufficiently robust to support a wide range of applications. Climate science has advanced significantly in its understanding of the global effects of climate change. At the same time, there are also constraints to this research, such as data gaps and uncertainty about model projections, which make it challenging to identify a clear causal chain between a particular emitter of activity and specific impacts or harms associated with climate change.

In the following, I will examine these matters more closely. The procedure used below will be applicable to a court when assessing causality in a case concerning climate-related damages.

6.2 Joint and several liability

In Norwegian tort law, the but-for test constitutes the starting point of the causality assessment. The relevant question thus becomes whether the damage would have occurred if the causal factor had not been present. The Supreme Court has stated that '(T)he causal requirement between an act or omission and an injury is usually fulfilled if the injury would not have occurred if the act or omission were not considered. The act or omission is then a necessary condition for damage to occur'.²⁴⁵ Would the plaintiff not have been injured but for the defendant's action? The but-for test is fundamental in the assessment of causality in Norwegian law and most other countries.²⁴⁶

In a tort case concerning climate-related damage, the question is whether the plaintiffs would have been injured if the emissions from the specific actor had not occurred. Was the defendant's action necessary in bringing about the injury? In order to connect the responsible party to the bad outcome, a chain of causality must be articulated. Such a chain would run from the

²⁴⁵ RT-1992-64 p. 69

²⁴⁶ Hagstrøm (2019) p. 391

actor's greenhouse gas emissions to global warming, to regional warming, to a climate impact, and lastly to the specific damage.²⁴⁷

Regarding general causality, whether emissions from an actor can cause climate-related injury, research is assertive. IPCC has been crystal clear on the relationship between human activity and climate change. The existing body of research leaves little room for doubt that the global climate system is changing, and human activities are at least partially responsible for that change.²⁴⁸ IPPC science enjoys consensus, and today most courts and practitioners recognize general causation in climate change issues. Emissions will have impacts and lead to climate-related damage.

When considering specific causality, however, problems arise. In contrast to general causation, the question of whether the action in question more likely than not caused the alleged injury is harder to establish. Even if science shows that climate change is responsible for a particular phenomenon or event that produced damage, emissions of any actor will be difficult to pin down as a but-for cause of impacts arising from anthropogenic climate change. Multiple causal factors are in play, and there are enormous evidentiary challenges to establishing a causal link between a defendant's emissions allegedly contributing to climate change and the harm suffered by the plaintiff. Climate impact models generally cannot determine the regional effects of global climate change to the degree of specificity necessary to causally link individuals and any claimed injuries. Attribution down to the scale of a specific incident is difficult to achieve, and pinpointing the exact contribution a specific emission had to a specific damage is exceptionally challenging and may still be impossible. Even with today's scientific understanding, it is challenging to state with high certainty that a specific event resulting in damage would not have occurred had it not been for the defendants' emissions. Thus, with the traditional but-for test, it is extremely challenging to establish causality. The but-for test ends up being too restrictive when it comes to complex causal relationships, such as in the case of climate-related damages

The but-for test is indeed the starting point for the assessment of causality. Nevertheless, it does have certain weaknesses and limitations and does not always provide results that the

²⁴⁷ Lloyd (2021)

²⁴⁸ Burger (2020) p. 77

legal order can accept.²⁴⁹ This is particularly the case where one is faced with two or more sufficient conditions for damage, which is often the case for climate-related damage. Since an unconditional reliance on the but-for test would lead to an unreasonable result in some cases, one must think differently in these instances. This has been discussed and explained thoroughly in legal literature.²⁵⁰

For instance, a situation may arise where a damage has several causes, but none in isolation was sufficient to cause the injury alone. Damage was inflicted through several causes in cooperation, where sufficient causation to the damaged only could be achieved in cooperation. One is then faced with interacting causal factors.²⁵¹ Such a situation could easily arise in the context of climate change. For example, a climate-related damage may have been caused by several emitters, where each individual emitter alone has not emitted enough to cause any damage. Collectively, however, they have emitted enough to cause the damage. In that case, the general rule is that all interacting causal factors are treated equally.²⁵² In the case of interacting causal factors, it is sufficient to prove that the alleged responsible causal factor has been a prerequisite for the damage. It is not necessary to prove that it has been an important factor, and it will normally be unnecessary to quantify the causal factors contribution. There is no requirement that the cause was the main cause.

In other cases, there might be excessive causative factors. This means that there are more factors than would have been necessary to cause the damage. In such cases, each causal factor, viewed in isolation, will be neither necessary nor sufficient to cause the damage. Nevertheless, there is broad agreement that, generally, everyone must be held responsible.²⁵³ This is a deviation from the result the but-for test would have provided and justified in terms of reasonableness. It will seem unfair to the victims if no one can be held responsible, and it will seem arbitrary, and therefore unjust, to the perpetrators if only one or two are held responsible.

²⁴⁹ Hagstrøm (2019) p. 393

 $^{^{250}}$ See e.g., Hagstrøm (2020) p. 399 – 412 theorizing on this

²⁵¹ 'Samvirkende årsaksfaktorer' in Norwegian

²⁵² Hagstrøm (2019) p. 400

²⁵³ Ibid. p. 401

A third typical example is competing concurrent causal factors. These are causal factors that are individually sufficient to cause the damage and that can be linked to the same injury.²⁵⁴ When faced with such a situation, a direct application of the but-for test will mean that none of the causal factors is considered a cause because none of them are necessary conditions for the damage. The damage would occur even if one causal factor were thought out because the other causal factor would trigger the damage. However, there is general agreement that such a result would appear unreasonable, and the but-for test cannot be used to solve the causal problems we face here.²⁵⁵ An example of this is found in RT-1931-1096, a case where a river had been polluted. The defendant factory was held liable even though other sources of pollution were sufficient to cause the damage. The fact that others have also polluted the river could not free the factory from responsibility. The Supreme Court emphasized that each perpetrator must bear full responsibility for his actions and that the corrective action inherent in liability cannot be waived if there are several people causing damage.²⁵⁶ The judgment implies that a causal factor that would have been sufficient to cause the damage.

The abovementioned situations show that the but-for test falls short in some situations where several actors contribute to the damage. Thus, it cannot automatically be applied in these situations. Several and joint liability may be used to avoid the adverse effects an unconditional reliance on the but-for test would cause. This doctrine of causation implies that the starting point for joint causes of damage is that the individual tortfeasor is fully responsible.²⁵⁷ It is sufficient to prove that the defendants were one of several or many contributing causes, even if the particular contribution cannot be separately identified and the conduct on its own was not the main cause of damage. It is not necessary to prove that it has been an important factor, and quantifying the causal factors' contribution will normally be unnecessary. Each perpetrator must bear full responsibility for his actions, and the corrective action inherent in liability cannot be waived if there are several people causing damage. The fact that the but-for test must be modified to reach fair decisions on a case-by-case basis is not uniquely Norwegian. On the contrary, this has also been acknowledged by courts at the highest levels in other

²⁵⁴ Ibid.

²⁵⁵ Hagstrøm (2019) p. 401

²⁵⁶ RT-1931-1096 p. 1103

²⁵⁷ RT-1992-64 p. 70

jurisdictions.²⁵⁸ This demonstrates the recognition that if the but-for test applies as a sole criterion of causation, it may yield unacceptable results, and this must be tempered.

Damages that occur due to climate change will, typically, lie close to the situations where joint and several liability have been applied. The climate change issue is characterized by its complexity and the exceptional number of contributors. Emitters have often escaped liability for their contribution because others were also causing or contributing to the damage. As we have seen, this is not how such situations are to be handled. Instead, the decisive factor is whether it is possible to prove that the emissions contributed to the damage incurred; the contributory cause is sufficient to establish legal responsibility. The only relevant question for the court is whether the defendant, through his act or omission, has contributed to the injury.

Contributory causation is indisputable in the case of CO2 emissions in many cases. When CO2 is emitted, it rises to high-altitude layers and mixes. The density of harmful greenhouse gases in the atmosphere, and the increase in concentration, decide the strength of the greenhouse effect. Regardless of the time and place of the emissions, the amount an actor contributes to this effect depends on the quantities emitted. The emissions released are included in a quantifiable total volume of greenhouse gases in the atmosphere, and the proportion of damage each actor has contributed can be measured and calculated. If the quantity of greenhouse gases had been lower, the density of greenhouse gases in the atmosphere would have been lower. The strength of the greenhouse effect would lower accordingly. Consequently, the rise of temperatures would be lower, impacts would have occurred to a lesser degree, and the risk to the plaintiff would be less dramatic. Thus, a causal linkage between emissions and climate change can be affirmed for all greenhouse gas emissions. When a plaintiff can prove that emissions from many actors were present in a blended state when the risk of harm occurred, and the composite product caused a single indivisible injury, then each of the emissions should be deemed to have caused the damage. From a scientific point of view, the law of physics, all emitters are necessarily contributary causes of climate change and its damaging effects. Each contributor has a causal impact, which is based on the size of the contribution.

Using joint and several liability instead of the but-for test would have huge implications in a tort case concerning climate-related damage. It would no longer be necessary to single out the

²⁵⁸ See e.g., Bonninton Castings Ltd v Wardlaw (1956)

impacts of the individual actors' emissions or link the damage to the specific emitter - every emitter is collectively responsible for climate change.²⁵⁹ Thus, courts would not have to consider the very complicated steps that must be taken in the but-for assessment. Untangling the extremely complex connection between a specific emission and a specific damage would no longer be necessary. If an actor is emitting, and we have a solid scientific basis for stating that such emissions contribute to the impact and damage in question, it would be sufficient to establish causality. Consequently, courts can establish causation in any case where research indicates that emissions have caused the specific damage and it is significant and adequate.

6.3 Delineating the defendant class – 'insignificant threshold'

Applying joint and several liability would, in principle, mean that every emitter, regardless of emission size, could be liable for climate-related damages. This, however, would be an untenable situation. An extraordinary number of actors contribute to the climate change issue, and it has been referred to as the 'death by a thousand cuts' problem.²⁶⁰ If everyone were potential defendants, it would be unmanageable for the courts. This, held together with the floodgate's argument, typically constitutes the main reasons not to apply tort law to the issue of climate change. Given the number of potential plaintiffs and defendants in tort actions, and the scope of potential court decisions, courts may be hesitant to adjudicate claims against private actors. To successfully apply tort law to the issue of climate change, it is therefore, necessary to delineate the defendant class. It is neither desirable nor appropriate to say that every emission, regardless of size or character, is a legally relevant cause of climate-related damage.

As mentioned above, legal causation is something different from factual causation. Not all causes which are factually relevant will be considered legally relevant causes in tort law. It would lead to unreasonable and unsustainable results if any causal factor connected with the damage should incur liability, however insignificant it may be. Thus, there are certain requirements for causal connection beyond the purely factual. One of these requirements is that the

²⁵⁹ As I will show below, plaintiffs could also ask for a percentage of the cost, equivalent with the defendants per centage of emissions, as done in Luciano Lliuya v. RWE AG (filed 2015)

²⁶⁰ Peel (2011) p. 5

cause cannot be insignificant. This mechanism of distinguishing causes can be referred to as the insignificant threshold. In RT-1992-64, the Supreme Court held that a causal factor must be so significant in the causal picture that it is natural to attach responsibility to it.²⁶¹ This means that insignificant reasons may be disregarded. By having an insignificant threshold, tort law contains a safety valve that prevents unreasonable results. The point is that trifling matters do not concern tort law, and small action does, therefore, not attract liability. There are classes of actions that the law will recognize as its concerns, and actions it will not. The insignificant threshold is thus a legal norm for limiting the tortfeasor's liability based on reasonableness assessments.²⁶² In practice, the decisions seem to be based on more or less subjective assessments of how prominent the allegedly responsible causal factor has been in the causal picture.²⁶³

The consequence of the insignificant threshold in Norwegian law is that some emissions simply are too small to be considered as casual effects in the legal context. Only the entities whose contribution to climate change can be said to be significant are potential defendants in a tort case concerning climate-related damage. By applying the insignificant threshold to the issue of climate change, it is possible to draw a line, practically and philosophically, between the emissions that may be considered legally relevant causes and those that do not. This way, courts may meaningfully limit and define a class of defendants. Only emissions exceeding the threshold would be a relevant cause for damage. Actors who violate the threshold would be considered proper defendants and cannot justify their emissions by saying their contribution is too small or undetectable to be a legally relevant cause.

We can find inspiration for how the insignificant threshold may play a role in other countries. For instance, we have seen this question being grappled with in Australia. In Dual Gas Pty Ltd. V. Environment Protection Authority,²⁶⁴ the Victorian Civil and Administrative Tribunal in Australia stated that 'despite the global nature of the GHG issue, there must still be a materiality threshold in relation to the type or size of the works or emissions that is relevant to whether a person's interest are genuinely affected, as opposed to being too remote or too general. The emissions of a few tons of GHG from a small factory in Gippsland would not in our

²⁶¹ RT-1992-64 p. 70

²⁶² Hagstrøm (2019) p. 439

²⁶³ Ibid. 438

²⁶⁴ Dual Gas Pty. And Others v. Enviormental Protection Authority (2012)

view give rise to standing (...) even though it represents an incremental GHG increase'. In that specific case, however, the court did not have to determine where the line might be drawn. It was sufficient to note that a power station generating up to 4.2 million tons of greenhouse gases per annum over a 30-year projected life cycle created almost a unique level of interest and standing compared to the more usual sorts of works approval matters.

The application of an insignificant threshold would be very helpful in a climate-related tort case, as the situation would be much more manageable. If one chooses to apply such thinking, the question thus is where the threshold should be set. What quantity of emissions matters? How should courts draw the line in practice? Which emissions exceed the insignificant threshold and thereby constitute a legally sufficient cause? At one end of the spectrum, we have ordinary people who carry out activities in their everyday lives. By travelling, consuming products and energy, et cetera, they unavoidably create some emissions. These emissions are, however, often extremely small. The size and impacts of emissions created by ordinary people are so trivial compared to the most significant emitters that it would be unnatural to consider them legal causes of damage. The biggest emitters, the Carbon Majors, are placed at the other end of the spectrum. Their emissions are enormous and contribute to the issue of climate change to a large extent. They emit considerably greater amounts than any individual would do in their daily lives. Given the scope of these emissions, it is much more reasonable to consider these emissions as legally relevant causes. However, where and how do we draw the line between these extremes?

Several different approaches may be used to draw the exact line in practice. It should be established some objective criteria, indicators or methods that give the court an indication of whether an emission is significant or not. One way to do this could be to look at the character of the emissions. Some have suggested categorising emissions into 'primary' and 'secondary' emissions.²⁶⁵ The primary emissions are those which arise from activities that occur for the purpose of facilitating usual domestic activities. Secondary emissions are, on the other hand, those that arise from extraordinary activities. Fairly similarly, one could distinguish between non-commercial and commercial activities. With this approach, emissions arising from commercial activity would be considered relevant in a causation assessment. The reason applying this approach is twofold. First, it is more acceptable to have those profiting from emission

²⁶⁵ Bullock (2022)

paying than those who do not. Second, emissions arising through commercial activity will usually be far more significant than those created in non-commercial activity. It could, therefore, be reasonable to use such an approach to create a boundary between significant and insignificant emissions.

Another possible approach could be to set a threshold at a specific amount of emissions originating from one actor. Regardless of the circumstances, the threshold would be set at a certain percentage of acceptable emissions, fixed, and applied in every case. All emissions exceeding this threshold would be regarded as significant in the causality assessment. This may be fairer, as the amount of greenhouse gases emitted, and not the nature of the activity in which they originate, determines the contribution to the climate crisis. With this approach, the court would simply have to know the amount of greenhouse gases an actor emits and look at them in relation to the threshold. Any emission exceeding this threshold would be significant and legally relevant in the discussion of causation.

The last approach would require that we have a way of measuring the emissions from different actors. As mentioned earlier, science is getting increasingly better at doing this, and it is now possible to quantify the historical emissions and specific contributions from significant emitters. The historical emissions from a set of carbon majors have already been measured, and peer-reviewed science maps different institutions' contributions to climate change.²⁶⁶ Here, it is suggested that nearly two-thirds of CO2 emitted since the 1750s can be traced to the 90 most significant fossil fuels and cement producers. Thus, the Carbon Major research suggests that a relatively small group of companies are responsible for most emissions. If the insignificant threshold is set according to this, only a relatively small group of actors have ability to cross the threshold. The floodgates argument no longer holds, and the situation would be very manageable for a court.

Regardless of the method chosen, what constitutes an insignificant emission is a normative decision a court must make. Ultimately, it is a matter of judgement. Science, such as the pathways and necessary action outlined by IPPC, can help inform the decision. These pathways show the action needed in order to reach the goals of the Paris Agreement, and the

²⁶⁶ Heede (2014)

insignificant threshold could be decided in light of the available climate science. Whether the emissions comply with the goals in the UN system will often be a good indication of whether the size of the emissions are acceptable. However, science will only take us so far. How to differentiate between emissions in a causality assessment is a legal issue. Exactly where the threshold should be set and the exact amount of emissions necessary to be considered significant is set according to a value position. As the insignificant threshold determines whether a company may be liable or not, it is a crucial decision and gives the decisionmaker enormous power. Courts have been making such decisions throughout history and are well suited for doing it in climate change issues as well. Which criteria the courts wish to use remains unclear. Nevertheless, the emissions of major emitters should be considered significant either way. Thus, their contribution is legally relevant, and they are potential defendants in a tort case concerning climate-related damage.

6.4 The Doctrine of Proximity

Closely connected to the insignificant threshold is another legal norm limiting the tortfeasor's liability, the doctrine of proximity. Even if there is a basis for liability, the tortfeasor does not have to be liable for all the damage consequences which are causally related to the tortious act.²⁶⁷ Again, it is necessary to distinguish between factual and legal causality. Just like insignificant causes, it would lead to unreasonable results if any causal factor connected with the damage should incur liability, however peripheral it may be. The proximity requirement serves to limit the scope of the loss. The question is whether it is reasonable to extend the responsibility so far that it includes the damage in question.²⁶⁸

As a starting point, the principle protects the tortfeasor from liability for compensation that goes beyond what he had reasonable grounds to consider. According to the doctrine, the tort-feasor is only liable for damages that were, to a certain extent, foreseeable and proximate to the tortious act. The Supreme Court has formulated that 'it is a condition for liability that the causal connection is adequate. ... Central to the assessment of adequacy is the question of whether the damage is such an unpredictable, remote and derivative consequence of the

²⁶⁷ Hagstrøm (2019) p. 435

²⁶⁸ Ibid. p. 460

harmful act that it is not reasonable to attach liability to it'.²⁶⁹ The factors must be seen in context so that a low degree of foreseeability will place greater demands on closeness for liability to be imposed and vice versa.²⁷⁰ The starting point is an assessment of predictability, but the degree of predictability is not decisive alone. A complex and discretionary overall assessment is needed to determine whether an obligation to pay compensation is justified. If all factors are considered, it is reasonable, fair, and appropriate for the tortfeasor to be liable for damages.²⁷¹

Regarding foreseeability, the question is whether the defendant could expect such damage would appear. Is the damage a likely consequence of the tortious act? It will not be a likely consequence if the damage develops in a thoroughly unusual or unpredictable way. According to an expert assessment, is it likely that the risk of damage for which the tortfeasor is responsible would lead to the damage in question? The purpose of the doctrine is to protect the tortfeasor against consequences that would hit him particularly hard because he could not reasonably foresee them. Suppose the tortfeasor had reason to expect that damage of a certain extent would occur. In that case, he has little to complain about if the responsibility remains within the outline he had reason to expect.

Since the IPPC gave out its first report in 1990 and the UN regime was put in place, the damaging effect of emissions has been objectively visible. From then on, there was an international consensus on the effects of climate change. It is possible to link emissions to several different impacts and harmful effects. Even if an actor did not have this knowledge, both the consideration of prevention and the consideration of injured parties argue that a tortfeasor should not be able to avoid responsibility by showing ignorance.²⁷² At a certain level of generality, foreseeability in the climate change context has been satisfied for decades. It is foreseeable and predictable that extensive damage could result from emitting vast amounts of greenhouse gases.

Foreseeability and closeness are closely related. However, the Supreme Court has pointed out that causation must have a certain closeness regardless of the concrete foreseeability. Even if

²⁶⁹ RT-2007-172 para. 65-66

²⁷⁰ Hagstrøm (2019) p. 447

²⁷¹ Ibid. p. 445

²⁷² Ibid. p. 449, in general terms noted that one cannot avoid liability by being ignorant

the damage was foreseeable, it could be considered not proximate if it was remote, too derived, or too indirect in relation to the damage event.²⁷³ It is not sufficient that there was a theoretical possibility that damage would occur due to the act. This was clearly evident in RT-1973-1268. The case concerned a situation where a plane negligently broke a power line, leaving several without electricity. Among these was a farming facility, which was put out of operation, causing them extensive damage, for which they sought compensation. The court considered the central requirements for liability, causation, and foreseeability to be fulfilled in the case. However, because of a lack of closeness between the tortious act and the damage, the tortfeasor did not become labile for the damages suffered by the farming facility. The damage was too indirect and derivative, and risk considerations had to mean that the injured party was the closest to bearing the loss.

One could argue that the same is true regarding climate-related damages. Emissions from one actor may contribute to considerable damages far away in time and place, making them seem indirect and derivative. However, RT-1973-1268, mentioned above, concerns third-party loss. Third-party loss is a loss that a third party suffers due to the direct victim being injured. Climate-related damages discussed in this thesis do not involve a third party. These damages are only indirect to the extent that the climate system's natural processes are interconnected. A natural process like this is not a part and will not make this into a case concerning indirect or third-party loss. In a legal sense, these damages are to be considered direct.

Climate change is a complicated phenomenon; the connection between emissions and damages is complex and may appear to diffuse. However, the fact that climate change is complex, and that research is needed to establish causality does not imply that the loss is too derivative or remote to attach liability to it. With today's advanced science, it is possible to clear up the complex causal relationship and clarify a causal link between climate change and many different damages. The fact that we must use intricate science to establish causation does not change the reality, namely that it is closeness in the chain of causation. The emitter and the injured party are placed in relation to each other; careless conduct on the former part may result in damages to the latter.

²⁷³ RT-1973-1268 and RT-2006-690

In this regard, it is natural to draw parallels to liability for psychological damages arising after physical damage has been inflicted. In the past, compensation has not been awarded in these instances as such damages have been considered too indirect and derived in relation to the tortious act.²⁷⁴ Because of this, extending liability to cover such damages has not been considered reasonable. However, there has been considerable development in understanding the connection between physical damage and psychological trauma. Thus, in HR-2018-2080-A, we saw a legal development concerning these issues. Here, the court stated that 'since the last time the Supreme Court ruled on the scope of the legal compensation protection for a parent's psychological damage as a result of a child dying in an accident... we have... gained significantly more and deeper insight into psychological damage mechanisms, causal relationships and complex grief reactions. This knowledge means, among other things, that one will be able to consider psychological damage when someone loses a child as predictable to a greater extent than before'.²⁷⁵ This legal development is an example of how advances in science and understanding a phenomenon can change the court's view of the issue. Similarly, a lack of understanding of the mechanisms behind climate change can make it appear that climate-related damages are too derived from emissions. By applying the best available research, it is clear that this is not the case. There is a close connection; one cannot say climate-related damage is derivative, unusual, or unpredictable.

Lastly, a complex and discretionary overall assessment is needed to determine whether an obligation to pay compensation is justified. The question of reasonableness is decisive. Reasonableness is a vague expression, and it is difficult to set clear terms and guidelines. Previously, however, the Supreme Court has added weight to certain elements. These include insurance coverage, possibly also the possibility of taking out insurance, the tortfeasor's fault, risk distributions consideration and the purpose of the liability rule.²⁷⁶ It is essential to remember that if compensation-relevant damage, grounds for liability and causation exist, it is the exemption from liability that must be justified.²⁷⁷ The question is, if all factors are considered, it is reasonable, fair, and appropriate for the tortfeasor to be liable for damages.²⁷⁸

²⁷⁴ See e.g., RT-1938-626 and RT-1966-163

 $^{^{\}rm 275}$ HR-2018-2080-A para. 42

²⁷⁶ Rt-1985-1011. On insurance, see e.g., Hagstrøm (2019) p. 467. On guilt, see e.g., RT-1960-357

²⁷⁷ Hagstrøm (2019) p. 444

²⁷⁸ Ibid. p. 445

Regarding insurance, it may appear most reasonable that the person who has or has the opportunity to take out insurance also bears the loss. Generally speaking, the actor who knowingly creates a danger to his surroundings should be encouraged to take out insurance. This is especially the case when the activity is part of the business model of a professional actor and an inevitable part of their operation. They should and most likely have performed a risk assessment in these cases. This way, the professional actor may factor the risk of loss into their operating cost. In this respect, however, it is worth mentioning that it is uncertain whether corporate defendants can rely on liability insurance. Insurance companies may not agree to sign contracts for something as far-reaching as the climate-related damage discussed here. Still, if anyone, the professional actors are the closest to insure against climate-related damage. If it is possible to get insurance, it might be more expensive for a randomly injured party, and they are more likely to lack the necessary knowledge about potential risks.

Concerning guilt, it depends on the case in question. Nevertheless, the tortfeasor is far more likely to exhibit some guilt than the injured party. Thus, insurance coverage and the tortfeasor's guilt will often speak in favour of liability. Further, risk distribution consideration indicates that liability should be imposed. Usually, the injured party, not the emitter, needs protection for climate-related damages. Today, the major emitters are powerful and extremely rich. Conversely, plaintiffs are often vulnerable, lacking the capacity to take steps to protect themselves. Climate change poses a significant danger to many, and the magnitude of the consequences is vast.

Tort law is ultimately a question of who should bear the burden of an injury. In this regard, it is essential to stress that emitting, the potentially tortious act, is intentional. In many cases where the doctrine of proximity has been applied to limit responsibility, like when crashing a plane into power cables, the tortious act has been an accident. For companies that are major emitters, the tortious act is purposeful and a central part of their operations, solely to make a profit. They knowingly and willingly carry out these actions despite knowing the potential and significant harmful effects and the likelihood that these will occur. As emitters, companies also exercise the control necessary to avoid harm. This can simply be done by refraining from the emitting conduct. If they still choose to act in such a manner, and the activity ends up causing damage to another, it is reasonable that the major emitter bears the loss. An actor who knowingly and willingly acts in a way that puts another in danger and earns money from

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such behaviour should cover the cost if the risk materializes. As mentioned earlier, it seems unreasonable that the industry should be able to spend large sums of money on marketing measures to increase sales and lobbying to prevent public measures, and at the same time, not pay compensation to those harmed by the products.

The doctrine of proximity is meant to protect the tortfeasor from liability for compensation that goes beyond what he had reasonable grounds to consider. In the case of climate-related damages, however, it does not go beyond what the actor should have considered. Research can determine with a high probability that several climate-related damages will occur if emissions are kept up. When science point to specific forms of impacts and damages, they can hardly be characterized as random, atypical, remote, and unforeseeable consequences of emissions. He who causes the emergence or spread of imponderables must know that these go their way and that damage may occur far from their origin. The fact that the act has a great potential for damage does not make it any less reasonable to attach liability to it. The emitter has reason to expect that damage.

Summarising the above discussion, I conclude that the conditions for causation are met regarding major emitting companies. Courts may apply joint and several liability, the emissions are not insignificant, and the loss is not inadequate. However, it may be problematic if the tortfeasor bears the total cost of the damage. If a defendant is jointly or several liable for damage, the party is independently liable for the full extent of the injuries stemming from the tortious act. When applying joint and several liability, the plaintiff may collect the total value of the judgment from a single actor. Making one single emitter liable for the total value of the judgment might be unreasonable. In many cases, such an approach would force a defendant to bear an undue burden of liability. Imposing joint liability and several liability on all emitters that surpass the insignificant threshold, no matter their contribution, may result in overestimating a party's contribution to the injury. It might not be reasonable to seek damages to cover the total cost when the defendants are only partially responsible for the injuries. Not only does this seem unfair, but courts may also view such liability, and the potential catastrophic economic consequences, as a slippery slope. A rapid rise in climate liability could lead to disastrous consequences for the industry. This could have ripple effects and hurt society as a whole. Given the enormous ramifications, courts may be reluctant or unwilling to impose such liability.

Recognizing this, the Act relating to compensation article 5-2 may be used.²⁷⁹ If the requirements for liability are met, the court may reduce the tortfeasor's liability if the extent of the liability is unreasonably burdensome. Thus, the liability will never cease entirely. However, the court has the right to award a lower compensation than the actual financial loss after an overall assessment, where the assessment theme will be the extent to which the liability is unreasonably burdensome in relation to the tortfeasor's financial capacity.

Another possible solution is that plaintiffs seek to obtain monetary damages from emission sources that are proportional to the emissions contribution from that source. Arguably, imposing several liability based on the party's proportionate contribution to greenhouse gas increases is the approach which best reflects the party's actual contribution to climate change impacts. Thus, it would offer a fairer and more sustainable means of allocating liability between defendants. This approach is used in Lliuya v. RWE AG, with the plaintiffs requesting 0,47 per cent of the total cost, a proportion of damages that correspond with the proportion of global greenhouse gas emissions emitted by the defendant. Plaintiffs may benefit from requesting a sum that reflects the defendant's contribution to the damages, as courts may find this more reasonable.

6.5 What can we establish today?

By using the examined approach, it should be possible to satisfy the requirement of causality. As stated earlier, however, the Court's understanding of the available science will to essentially be decisive. If plaintiffs cannot create a factual chain running from increases in anthropogenic greenhouse gas concentrations to specific impacts, they will fail. The scientific understanding of climate change and its causes and effects must be sufficiently developed for such a lawsuit to be successful. Thus, existing and available science is a prerequisite for establishing causality. At the conclusion of this chapter, it is thus interesting to look at the status of the research today. Which impacts and damages can be linked to anthropogenic influence on climate?

²⁷⁹ Skadeerstatningsloven

It is well established that emissions lead to increases in temperatures. However, the further down the causal chain, the more difficult it is to issue robust findings about the connection between anthropogenic influence on climate and specific impacts. An increasing number of nonclimate and other variables must be accounted for, complicating the attribution analysis. IPCC has recognized that evidence of human influence varies depending on the event and that it is difficult to ascertain in many cases.²⁸⁰ Certain impacts, such as for long-term, broad-scale changes, like mean temperature increases and sea level rise, are foreseeable outcomes of activities contributing to climate change and are relatively straightforward to attribute.²⁸¹ Establishing a causal connection between climate change and impact should be easy for impacts that are closely tied to global-mean warming. These and several other adverse impacts are certain to occur because of the increase of greenhouse gases in the atmosphere. Generally speaking, attribution is easier for long-term, broad-scale changes²⁸² than short-term and more localized events. This is especially true when a single event results from more complex interactions between different variables. The confidence with which scientists have been able to attribute extreme events to climate change has been highest for events directly linked to temperature.283

Despite the difficulty in attributing changes in extremes, the field of single-event attribution is growing fast. Today, there are already various studies on major storms, floods, heat waves, and other events. For instance, the world attribution project is working on this.²⁸⁴ Not only do we have various studies, but they also point to climate change as a cause of extreme events. Notably, of the 146 studies published in the BAMS reports since 2011, approximately 70 per cent have found anthropogenic climate change was a significant driver of the event studied.²⁸⁵ The 2016 and 2017 BAMS reports also contained several studies in which the authors concluded that the event could not have happened in the absence of anthropogenic climate change.²⁸⁶ In this regard, some short-term impacts are worth mentioning.

²⁸⁰ IPCC AR6 WGI The Physical Science Basis (2021)

²⁸¹ Burger (2020) p. 204

²⁸² Ibid. p. 205

²⁸³ Ibid. p. 100

²⁸⁴ World Weather Attribution

²⁸⁵ Burger (2020) p. 101

²⁸⁶ BAMS (2016) and BAMS (2017)

Extreme heat is one of the impacts in which science has progressed far. The fourth National Climate Assessment (NCA4) found with very high confidence that the frequency and intensity of extreme heat events are increasing in most continental regions worldwide, consistent with the expected physical responses to a warming climate.²⁸⁷ IPCC has a similar view, stating that there is 'further strengthening of the evidence for human influence on temperature extremes'.²⁸⁸ Several studies in recent reports conclude that heat-related events would have been 'virtually impossible' in the absence of anthropogenic influence in climate.²⁸⁹ Dozens of other studies have found that climate change very likely influenced the probability and/or magnitude of heat-related events worldwide.²⁹⁰ Thus, extreme heat is a direct and foreseeable consequence of a warming climate, and science can confidently attribute such events to emissions.

Droughts are another extreme event worth mentioning. These are highly complex meteorological events, and it is therefore typically challenging to isolate the effects to anthropogenic climate change. Nevertheless, of the twelve studies on drought and dryness included in the 2015, 2016, and 2017 BAMS reports, 92 per cent found clear evidence of anthropogenic influence on the severity and probability of the observed event.²⁹¹ Like droughts, heavy precipitation is also difficult to attribute. However, both AR5 and NCA4 found clear evidence that extreme rainfall events are increasing worldwide, which is generally consistent with expected physical responses to a warming climate.²⁹² In BAMS 2014 – 2017, 56 per cent of the reports identified an anthropogenic influence on event frequency or magnitude.²⁹³

However, the evidence is not as solid for other impacts or events. It is important to remember that science has not progressed equally for all impacts. Therefore, one needs to be specific and differentiate between impacts. We simply do not have enough science to prove a linkage between climate change and its impact in every case. With time, however, research keeps advancing. The possibility of showing the degree to which a particular event was caused by climate change is getting increasingly more accessible. Take wildfires, for instance. This is an extreme event in which attribution science struggles to create a link. In 2014, IPCC has only

²⁸⁷ Burger (2020) p. 102 and NCA4 (2018)

²⁸⁸ IPCC AR5 WGI The physical Science basis (2013) p. 19

²⁸⁹ Burger (2020) p. 103 and BAMS (2017)

²⁹⁰ Burger (2020) p. 103

²⁹¹ Ibid. p. 105 and BAMS 2015; BAMs 2016; BAMS 2017

²⁹² NCA4 chapter 3, 10, 19, 20, 22, 23, 27; IPCC AR5 WG1 Summary for Policymakers p. 23

²⁹³ Burger (2020) p. 107 and BAMS 2014; BAMS 2015; BAMS 2016; BAMS 2017

with medium and low confidence linked increases in the severity and frequency of wildfires to climate change.²⁹⁴ However, since then, there has been generated more robust evidence of a link between anthropogenic climate change and wildfires in North America and Australia.²⁹⁵

The impacts caused by climate change will, in turn, lead to damages, which in many instances can be attributed to the emissions. Some are clearly visible results of climate impacts, while the connection is more intricate in other cases. Reductions in food security and water supply are examples of severe damages which can be attributed to climate change. IPCC have found with high confidence that 'many terrestrial, freshwater, and marine species have shifted their geographic ranges, seasonal activities, migration patterns, and abundances, and species interactions in response to ongoing climate change'.²⁹⁶ Additionally, they state with high confidence that a large fraction of species faces increased extinction risk due to climate change during and beyond the 21-century.²⁹⁷ The BAMS 2016 report included three studies finding that increases in sea surface and ocean temperatures were harming ocean and ecosystems through impacts such as coral bleaching and reduced fish stock.²⁹⁸ Regarding agriculture, IPCC have with high confidence stated that negative impacts of climate change on crop yields have been more common than positive impacts', 299 and found with very high confidence that climate-related extremes were disrupting the food production.³⁰⁰ Additionally, they state with very high confidence that climate-related extremes were disrupting water supply³⁰¹ and with medium confidence that changes in precipitation, snow melt, and ice are altering hydrological systems and affecting water resources in the form of quality and quantity.³⁰² Attribution science is also able to link climate change to human health in general. IPCC has found with very high confidence that climate-related extremes were affecting morbidity, mortality, mental health, and human well-being.³⁰³

²⁹⁴ IPCC AR5 WGII Impacts, Adaption, and Vulnerability (2014) p. 22, 30, 31

²⁹⁵ Burger (2020) p. 121

²⁹⁶ IPCC AR5 WGII Synthesis report Summary for Policymakers (2014) p. 6

²⁹⁷ Ibid. p. 13

²⁹⁸ BAMS (2016) p. 3, 25, 27

²⁹⁹ IPCC AR65 Synthesis report Summary for Policymakers (2014) p. 6

³⁰⁰ Ibid. p. 53

³⁰¹ Ibid.

³⁰² Ibid. p. 6

³⁰³ Ibid. p. 53

As we have seen, attribution science is able to link anthropogenic influence on the climate to several impacts and damages. Thus, if we apply joint and several liability, it should be relatively straightforward to establish a causal connection between climate change and at least some of the impacts associated with it. Even though there are still some evidentiary gaps, a sufficiently large subset of impacts can be attributed with enough confidence to support litigation. Plaintiffs may prove most successful where they base their claims on impacts which can be attributed to anthropogenic climate change with high confidence. If they do so, there is reason to believe they will overcome the causation hurdle.

6.6 Conclusion on causation

Establishing causality in a tort case concerning climate-related damage has been extremely difficult for plaintiffs in the past. For this reason alone, earlier compensation claims have had little chance of success.³⁰⁴ We have now seen that there is reason to believe that this obstacle, the often-called biggest hurdle in climate litigation, may be overcome.

Instead of trying to satisfy the restrictive but-for-test, plaintiffs may rely on the doctrine of joint and several liability. Thus, instead of asking whether the emissions from the actor were necessary for bringing about the injury, one simply asks whether the emissions contributed to the injury. The latter is far easier to answer affirmatively. Further, by applying the insignificant threshold, it is possible to delineate the defendant class. Consequently, the situation gets far more manageable and fairer; the floodgates argument no longer holds. Suppose the court asks whether the emissions from major emitters contribute to climate change and are significant. In that case, the answer to this question is most definitely yes from a scientific point of view.

In Norwegian law, it is likely that the causality assessment would boil down to whether the damage is proximate. For judges unwilling to impose liability, this may be an easy way out. Given the complexity of climate change, it is not difficult to argue that such loss is not proximate. As the assessment, to a large part, is based on reasonableness, it is quite open to

³⁰⁴ E.g., Kivalina v.ExxonMobil (2009)

different conclusions. The peculiarities of the case in question will obviously matter a great deal. Nevertheless, considering the research's clarifying role, it is possible and often fair to conclude that many climate-related damages are proximate. The fact that the defendant through joint and several liability might be hit hard, as he is liable for the total cost, can and should be solved through mitigation.³⁰⁵

The available science will always be the backdrop in a tort case concerning climate-related damage. This is particularly the case when assessing causality. The advancement has been vast, and with sophisticated knowledge of climate change mechanisms, causes and effects, it is much easier to satisfy the causality requirement. Today, emissions can, with confidence, be linked to temperature rise, sea level rise, extreme heat, droughts, and heavy precipitation. This can lead to damages such as physical destruction, reduction in food security and water supply, and affect morbidity, mortality, human health, and well-being. Attribution science is sufficiently robust to establish causal connections between increases in emissions, global warming, and a broad range of impacts and harms. The list of impacts and damages that can be attributed to emissions keeps getting longer. What we can determine will evolve in line with scientific progress. As science advances, the possibility of satisfying the causality requirement will be increasingly easier to establish. In the future, it is highly likely that science can attribute even more to climate change.

There is no need to view climate-related damages as a diffuse and general problem caused by a myriad of unknown and unidentifiable sources. Instead, we can view the issue as a result of specific actions by certain actors. Tort law is flexible and if practitioners make use of the latest research, it is fully possible to establish causality in many cases. Thus, it is feasible that courts may establish causality in many cases already. As the legal landscape of climate litigation has changed, the prospects of satisfying the causation requirement in the time to come are good.

³⁰⁵ Skadeerstatningsloven Art. 5-2

7 Conclusion

7.1 The applicability of Norwegian tort law to the issue of climate change

In this thesis, I have analysed whether limited liability companies may be held liable under Norwegian tort law for damage caused by their greenhouse gas emissions. I have assessed the requirements for compensation, relevant damage, grounds of liability and causation. The conclusion is that this framework, in many instances, can lead to accountability for large private emission sources in Norway. The case characteristics will be of great importance, and each case must be assessed independently. Still, in principle, Norwegian tort law is flexible enough for liability to be imposed.

Norwegian tort law establishes far-reaching protection against personal injury, property damage, and damage to financial assets. Most of the loss and damage caused by climate change concerns these kinds of injuries and would be protected. This requirement will likely be relatively easy to fulfil.

Regarding grounds of liability, both strict liability and culpa could possibly be imposed. These assessments are heavily based on discretionary assessments and considerations of reasonableness. Therefore, the assessments can appear unpredictable and leave considerable room for interpretation to the judges. It is entirely possible to conclude both ways. The legal practitioner can easily find barriers and conclude against applying the grounds of liability. However, as we have seen in the discussions, there is an opportunity and often reasonable, to argue that the requirements of strict liability and negligence are fulfilled.

The biggest obstacle to concluding that there is a basis for liability appears to be that Norwegian law contains a relatively comprehensive regulatory framework for much of the emitting activity. We have seen, as an example, that the regulatory framework for petroleum companies is comprehensive. This will, in particular, constitute a significant hurdle against imposing culpa liability, as court may find it difficult to conclude that behaviour in line with the existing regulatory framework is unlawful. Compliance will undoubtedly provide a strong argument for defendants. Still, as stated in the analysis, compliance does not automatically prevent a greenhouse gas emitter from liability. Legality and liability are two separate matters and existing regulations related to, for example, oil extraction, do not exhaustively regulate whether liability should be imposed. The regulation may not seek to protect against the harm in question, or there may be gaps in the regulatory framework. At the same time, there are several other relevant sources that indicates that liability should be imposed. Thus, despite certain obstacles, courts can conclude that the requirements have been met regarding grounds of liability.

Considering causality, the considerable advancement in science has made it far more likely that this requirement can be fulfilled. The available science will always be the backdrop in a tort case concerning climate-related damage. For such a case to succeed in court, the claim must have a sufficient research basis. The advancement in science has been vast, and we now have more sophisticated knowledge of climate change mechanisms, causes and effects. These developments make liability possible, and the increase in scientific knowledge makes successful claims far more likely. As we have seen, however, science has yet to progress equally far in all areas. One must differentiate between cases, and when applying new research, judges must be mindful and refrain from using flawed information. In areas lacking research, climate litigation based on tort law will fail. On the other hand, in the areas with the most developed science, it is possible to already satisfy the requirements of tort law. As the understanding of climate change continues to develop, the research basis for potential climate litigation cases will keep improving and increase the probability of successful cases.

Potential plaintiffs should be very thoughtful when designing lawsuits to maximise the likelihood of success in a climate litigation case based on tort law. As things stand, I believe that lawsuits based on strict liability for damage caused by long-term, broad-scale changes are the most likely to succeed in court today. As neither unlawfulness nor negligence are necessary to establish under strict liability, strict liability might be easier to impose than culpa. However, more than a carefully crafted claim backed up by solid science is required for potential plaintiffs to succeed. For a climate-related lawsuit to get a breakthrough, one essential prerequisite must be present: the willingness of the courts.

The possibility of applying tort law to the issue of climate change is, to a large extent, dependent on the willingness of the courts. A recurring theme throughout this thesis has been that the judges enjoy considerable leeway in the assessments under tort law. There are barriers to successful climate claims, but equally, there are possibilities. The characteristics of tort law make it very flexible and give the interpolator considerable freedom and opportunity. Therefore, the gap between an acceptable interpretation and the final outcome in a court case can be significant. What tort law opens for and what courts actually will do, are two separate questions. It is, therefore, difficult to predict how the assessment would unfold in a courtroom.

As Norwegian courts may be labelled rather conservative and often show cautiousness and reticence when entering new territory, it is reasonable to believe that courts generally will not be very bold in making use of this opportunity. Even though tort law is flexible enough to impose liability, it is natural to assume that the courts would exercise restraint in such a question. It is unlikely that Norwegian judges will impose liability at the moment. However, regardless of the actual case result, it is clear that the legal, scientific, and societal changes have improved the odds of success for potential plaintiffs.

7.2 Effectiveness, drawbacks, and the Role of the Courts in climate litigation

Even if tort law may be applied to the issue, it is worth reflecting on whether this is the way to go. The goal of climate litigation lawsuits based on tort law would be to force defendants to take climate action, and it would be corrective in the sense of making the polluter pay. For climate lawsuits in a broader sense, the most important goal is obtaining a behaviour change that will lead to the necessary climate action. Is climate litigation effective, and are there any potential drawbacks to this?

One could question whether lawsuits are effective tools for achieving the abovementioned goals. Science is evident in the fact that immediate action is needed. Lawsuits, especially a climate case as discussed in this thesis, would be time-consuming and take years to finish. Thus, a lawsuit alone will likely not bring the change we need in time. Additionally, individual lawsuits would not structurally regulate the climate issue. Structural regulatory framework and measures are the best approaches to fight a fundamental and wide-reaching issue like climate change. Politicians, and not courts, are the ones with the power to implement this. That said, no one believes climate litigation alone is the best solution to the climate crisis. The optimal approach would be if the legislative power adequately addressed the issue. Litigation and tort law will never be able to deal with societal problems on a scale such as climate change on its own.

Regulatory frameworks should be the primary instrument in the fight against climate change, but litigation could be a complement to the systematic regulatory approaches.

As sufficient action is not being taken, climate litigation may aim to fill the gap in domestic climate governance responses and achieve a change in the behaviour of actors. The direct costs of the parties involved in litigation, such as pay-outs, legal and administrative costs, and reputational costs, may be enough to create the incentive to mitigate. The latter, the reputational cost, will likely incur even if a company successfully deflects a climate change lawsuit. Climate litigation generally draws much attention, and a defendant's practices will likely remain subject to ongoing public and financial scrutiny. Litigation may also indirectly affect companies, impacting their share prices.³⁰⁶ This can draw the attention of these companies to the potential of finding themselves with stranded assets.³⁰⁷ The sheer possibility of being held legally accountable may foster the conceptualization of climate change as a legal and financial corporate risk and the corresponding expectation by shareholders and investors that corporations will manage this risk.³⁰⁸

Further, the work done outside the courtroom may be almost as important as the work done inside it. Climate litigation would, in many cases, not only affirm novel legal principles but also have a broader impact on public policy and debate. We can, for instance, look to the Shell judgement, which has been appealed. Still, as the case represent a global first, and the Hauge Court took the unprecedented step to hold the company legally responsible for its emissions, Shell has announced its intention to increase the speed of its planned transition in line with the judgement.³⁰⁹ Also, the judgement has led to ramifications across the corporate community, with representatives from other high-emitting industries confirming that they, too, will be increasing their mitigation efforts.³¹⁰ Even though the judgement is being appealed and still pending, the judgement has already had clear impacts. Thus, one cannot reduce judgements significance to its dispositive part. This is true even when cases fail. The legal process is an opportunity to highlight the need for legal change and indicate an alternative pathway. Even if litigation fails, judicial signalling may trigger legislative change. Therefore, although structural

³⁰⁶ Kaminski (2023)

³⁰⁷ Setzer (2021)

³⁰⁸ Ganguly (2028)

³⁰⁹ Raval (2021)

³¹⁰ Financial times (2021)

regulatory changes are the most effective and preferred before litigation in the fight against climate change, climate litigation can achieve some of the desired effects.

There are, nevertheless, potential drawbacks of climate litigation as well. These should be evaluated so that it does not undermine climate action. For instance, the argument has been made that if courts impose liability despite actors complying with the regulatory structure, climate litigation may disturb the regulatory system.³¹¹ The point is that regulatory measures will be the main tool for forcing emitters to take measures to mitigate. If solid mechanisms exist in the regulatory framework and actors comply, the system may become disharmonious and unpredictable if liability is still imposed. Litigation is a relevant component of national climate change governance responses. However, the relationship between litigation and other critical elements of that response, for instance, legislation and policy, is under-explored.³¹² That being said, liability can effectively complement an ineffective regulatory situation if the regulatory system remains weak and insufficient to deal with the climate change issue. Regulatory standards on industry often end up weak and substantial damage occurs despite regulations being complied with. Liability could close the governance gap, and the struggle to create new obligations would not enable harmful actions. This would send an important message to the industry, indicating that compliance is insufficient if measures to prevent damage could easily be adopted.

Another potential drawback, discussed under culpa and proximity, is that a rapid rise in climate liability could lead to disastrous consequences for the industry. This could have ripple effects and hurt society as a whole. However, potentially harmful effects on society can be avoided in that the method used and the responsibility imposed are carefully considered. For instance, plaintiffs could be mindful when choosing which actors to target or they could, like in the Lliuya v. RWE, only ask for an amount proportional to the defendant's contribution to the climate crisis. Courts, on their side, could mitigate according to the Norwegian Compensation Act Article 5-1 and/or set the insignificant threshold high. This way, one could reduce the potentially harmful effect of climate litigation. Also worth mentioning in this regard, and pointed to throughout the thesis, is that a fundamental transformation of our energy system is needed and already underway. Thus, responsibility will probably not have disastrous consequences but

³¹¹ Faure (2011)

³¹² Setzer (2020)

speed up the needed transformation and behaviour change. Imposing responsibility will not break fundamentally with development but be a step in the right direction.

The two abovementioned potential drawbacks of climate litigation are not necessarily arguments against litigation, but they indicate that one should carefully examine the relationship between liability on the one hand and the regulatory structure on the other. This way, one could make sure that climate action can be achieved in the most effective way.

Lastly, the role of the courts should be commented. Much depends on the judges' willingness, and climate lawsuits will put them in difficult positions. Legal questions concerning climate change are delicate issues with clear political implications. Judges willing to impose liability will likely be called activists, while the unwilling ones will be labelled conservative. Successful climate claims based on tort law depend upon the willingness of judges to be more courageous than politicians and to take responsibility for dealing adequately with the considerable problem of climate change. The examples of a few unexpected but arguably iconic cases, such as Urgenda, Leghari and Shell, might embolden other courts to follow suit.

Identifying potential barriers to imposing liability is easy, and the courts will presumably be more comfortable leaving the issue to political bodies. We want to avoid highly politicised courts that step outside their boundaries. The democratically elected officials can be held accountable and have been given the task of passing the legislation. Substantive political choices should be left to elected and accountable officials, who are better equipped to make policy decisions. Passing legislation is their expertise, and the legislative process allows for public participation with the opportunity for a broad array of arguments for and against particular policies.³¹³ If courts step outside of the perceived boundaries of their power, it can erode the court's legitimacy.³¹⁴

However, the law is full of politics and that courts do play a role in policing government in failures to protect people's rights, which arguably is the case here. The world is facing a gigantic and highly complex problem politicians seemingly cannot handle, and to continue business as usual will be highly harmful. Judicial intervention at this time could help change our course by

³¹³ Colby (2020)

³¹⁴ Ibid.

sending important messages to governments and private actors about responsibility for climate change and, in some cases, lead to the needed action. This is a critical function law can and arguably should serve. Today, climate litigation is happening in a different legal, societal, and scientific context than before. As legal rules derive their content from value assessment of actual conditions, the changed assumptions should indicate a change in the law's effects. The Norwegian tort law system is particularly adaptive to societal changes by its extended use of discretion and reasonableness. The content will therefore change in line with the development of society. As values and assumptions about factual conditions have changed, they should impact the determination of applicable law.

No matter what the courts do, the climate litigation we have seen worldwide illustrates that courts play a critical role in adapting the law and legal governance to deal with climate change. Courts have emerged as a critical forum where the future of greenhouse gas emission regulation and responsibility are debated.³¹⁵ Government action is undoubtedly necessary, but principles developed in courts may serve as a basis for reforms to address climate change.

7.3 The way forward

Climate litigation has become a worldwide trend that is likely to continue with force.³¹⁶ This trend makes it increasingly more likely that a question concerning liability for climate-related damages will be raised in Norwegian courts. As long as we do not see the necessary and adequate action being taken in the field of climate change, litigation may appear as a helpful approach to create a behaviour change. Private liability in the law of torts is becoming a potential means for addressing wrongs caused by global warming. This is not only a theoretical possibility; tort law appears as a tool that realistically could be used to force emitters of greenhouse gases towards preventative measures.

Despite the several unsuccessful attempts at holding corporations legally accountable for emissions based on tort law in the past, and that this seemed unthinkable before, things are changing.

³¹⁵ Peel (2011) p. 19

³¹⁶ Milieudefensie et al. v. Royal Dutch Shell (2021); Commission on Human Rights of the Philippines (2022); Leghari v. Federation of Pakistan (2018); Luciano Lliuya v. RWE AG (filed 2015)

As climate change impacts become increasingly visible and people feel them, it will be increasingly more difficult to argue against liability. Legal developments and shifts in the legal mindset often happen rapidly and haphazardly. Such shifts or developments may occur because of pressing issues and the need to deal with them. With climate change being a tremendous challenge, we might see such a shift or development in the judicial society. Successful claims against tobacco manufacturers seemed unthinkable until they were not. Thus, even if Norwegian Courts are unlikely to impose liability today, this might not be the case in the near future. Courts may be willing to apply well-established concepts to a new set of cases. As the world has discovered the extremely harmful effects of greenhouse gas emissions, it might provide an opportunity to rethink the interpretation of the tort law system.

Climate litigation based on Norwegian tort law faces barriers and potential drawbacks, and the outcome of a potential case will remain highly uncertain until the courts handle such a case. Still, Norwegian tort law is flexible enough and appears as a tool that realistically could be used to force emitters of greenhouse gases towards preventative measures. With ever-increasing knowledge of the dangers of climate change, a constant lack of adequate climate action, and ever-new cases of climate-related damage, it may be reasonable to apply tort law to the issue of climate change. Given the growing evidence of harm arising from climate change, the major emitters in Norway, and the legal constructions, it is not inconceivable that claimants will be successful in Norwegian courts.

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