# In the Shadow of an Oil Refinery: Narrating Just Transitions in the City of Lysekil

EVA LÖVBRAND AND VERONICA BRODÉN GYBERG

#### 8.1 Introduction

How can the state gain public acceptance and support for the transformative social change required for deep decarbonization? This is a question that has moved to the center of academic and policy debate in recent years. In a time when populist movements are invoking democracy to uphold carbon-intensive systems and ways of life (Marquardt and Lederer, 2022), scholars and policymakers alike are searching for a democratic vocabulary that attends to the disagreements and conflicts engendered by transformative climate action (Blühdorn, 2020; Machin 2020). Just transition is a concept mobilized to that end. Since the term was incorporated into the preamble of the 2015 Paris Agreement, it has guided thinking on the social distribution of benefit and harm resulting from decarbonization policies. Much of this debate has focused on the loss of jobs and livelihoods in regions dependent on extractive and carbon-intensive industries (Bazilian et al., 2021; Kalt, 2021). To make the transition to net-zero emissions inclusive and just, policymakers across the Global North have recognized the need to pay special attention to the regions, cities, and workers that are negatively affected by the shift away from fossil fuels (Fleming and Mauger, 2021; Silesia Declaration, 2018).

In recent years, the just transition vocabulary has also gained traction in the Swedish climate policy debate. Although government actors such as Fossil Free Sweden (FFS) have staged the 2045 net-zero emissions goal as an opportunity that will lead to green jobs, industrial competitiveness, and sustainable welfare (Brodén Gyberg and Lövbrand, 2022), political parties from the left and right have begun to address how the social costs of decarbonization are geographically distributed. In the debates preceding Sweden's parliamentary elections in September 2022, there was widespread recognition that the costs and capacities for emission reductions vary across the country (Fischer et al., 2023). Whereas Sweden's urban centers have positioned themselves as climate frontrunners, many rural areas and smaller cities

are struggling to decarbonize. As illustrated by Widerberg and Fast in Chapter 5 of this book, the carbon footprint is particularly large in cities that host energy-intensive process industries of historical and strategic importance for the Swedish welfare state (e.g., steel, cement, petroleum, paper). Although Sweden's industrial carbon emissions have decreased by 31 percent since 1990, heavy industry still accounts for roughly one-third of the country's territorial emissions, and in some industry sectors emissions are still increasing (SEPA, 2022).

In this chapter, we use narrative analysis to trace how Sweden's efforts to decarbonize are imagined and storied by people who live in the shadow of extractive and carbon-intensive industries. Our analysis draws on an interview study with local politicians, municipal officials, union representatives, and citizen groups in the city of Lysekil. This small town of 14,500 inhabitants is located on the Swedish west coast, where the Gullmardsfjord meets the open waters of the North Sea. Known for its unique marine life and red granite rocks, Lysekil has long been an attractive tourist destination and hub for maritime trade and shipping. Since 1975, Lysekil has also been home to Scandinavia's largest oil refinery, Preemraff, and is therefore one of Sweden's largest municipal emitters of carbon dioxide (for details, see Chapter 5 of this book). The refinery was one of Sweden's largest industrial projects of the 1970s and was built to offer national energy security and employment to a region in industrial decline (Fredh, 2015). Following five decades of fossil-fuel production, Lysekil is today struggling with a carbon lock-in that is both materially and culturally entrenched (Seto et al., 2016; Wodrig, 2018). Preemraff is not only an important local employer and source of tax revenue. Over the years, the refinery has also become deeply embedded in everyday city life and entangled with community identity and sense of place.

In the following, we present findings from fieldwork conducted in March and October 2020. This was a year of political turmoil in Lysekil when Preemraff's plans to expand its conversion of residue oil became a matter of national political concern. The preliminary environmental permit offered to the refinery in November 2018 had stirred a heated debate in the Swedish climate movement and resulted in an appeal by numerous environmental organizations. Since Preemraff's expansion plans entailed a doubling of the refinery's carbon dioxide emissions, many actors warned that the permit meant that Sweden might not reach its goal of net-zero emissions by 2045 (SSNC, 2021). When the Environmental Court of Appeal decided to reopen the case in June 2019, Lysekil became a site of climate controversy and struggle. In the debate following the Preemraff court case, local jobs were pitted against global climate concerns, the socio-economic welfare of fossil-fuel workers against the rights of future generations, municipal tax revenues against national climate goals, and the fossil-fueled economy against visions of a fossil-free society.

During our first visit to the city, we observed the negotiations of the Environmental Court of Appeal and interacted with environmental activists and local citizens who followed the case from the streets of Lysekil. When we returned to the city six months later to further our interview study, the Swedish government had taken over the court case and Preemraff had unexpectedly decided to cancel its expansion plans. Our interview responses reflect the turmoil, sense of confusion, and uncertainty about the future expressed by local actors as a result of Preemraff's decision. This chapter is organized in four parts. First, we place our study in the academic scholarship on just transitions and specify how a narrative analysis can help to further the same. Second, we describe our empirical material and outline how the justice claims in our interview responses were thematized and categorized. Third, we introduce the controversy following Preemraff's expansion plans and how it placed Lysekil in the national limelight. Finally, we present three stories of climate (in)justice derived from our material and discuss why they matter in the governance of deep decarbonization.

### 8.2 Just Transition: A Concept with Multiple Meanings

Just transition is a concept that is placed at the intersection of movement struggle and academic debate. While originating in the North American trade union movements of the 1970s and their struggle for occupational health and safety (Stevis et al., 2020), the concept has been picked up by environmental justice scholars to examine those who live with the side effects of fossil-fuel extraction, production, and generation, and who will bear the social costs of decarbonization policies (Newell and Mulvaney, 2013; Sovacool, 2021). Informed by political economy questions such as "who wins, who loses, how and why" (Newell and Mulvaney, 2013, p. 133), just transition scholarship is sensitive to the politics of low carbon transitions. Instead of assuming that the shift away from fossil fuels will benefit all actors and regions equally, work in this field highlights the conflicts, disruptions, and exclusions that underwrite transformative climate action (Goldthau and Sovacool, 2012; Wodrig, 2018).

While the concept of just transition signals a desire to embed climate policy debate in questions of social equity and justice, the widespread engagement with the term has led to divergent interpretations. In the literature, a distinction is often made between the redistributive justice claims emanating from the labor movement, on the one hand, and the more expansive justice agenda advanced by environmental justice scholars and activists on the other (Wang and Lo, 2021). In the labor-oriented debate, just transition is defined in economic terms and tied to the rights of fossil-fuel workers and their surrounding communities (Cha and Pastor, 2022). Here, the subjects of injustice are defined by their economic

dependence on the jobs and tax revenues provided by hazardous industries. Following a redistributive conception of justice (Fraser, 2001), the remedy for injustice is sought through economic and social protection programs that offer job retraining, unemployment benefits, and pensions to displaced fossil-fuel workers. Just transition demands emanating from the labor movement also regularly include calls for public investments to help fossil-fuel-producing communities relocate to a renewable economy (Wang and Lo, 2021).

The second just transition agenda is broader in scope and seeks to build alliances across labor unions, environmentalists, and civil rights groups (Wang and Lo, 2021). Rooted in an environmental justice tradition, it draws attention to the vulnerable groups in society that are least responsible for the climate crisis and yet disproportionally made to pay for climate mitigation and adaptation efforts (Stevis et al., 2020). This strand of scholarship offers a more expansive understanding of what just transition stands for, who it is for, and what its underlying politics are. By recognizing the many environmental injustices tied to class, gender, and ethnic background, work in this field seeks to counter the social cultures of misrecognition and institutional exclusion that underlie poor distribution in the first place (Schlosberg, 2004). Thus, just transition efforts extend beyond compensation schemes to fossil-fuel workers and their families. The political project is more transformative in nature and involves recognizing and respecting the day-to-day struggles and concerns of "frontline communities" (Stevis et al., 2020) that bear the burdens of an extractive and fossil-fueled economy (Cha and Pastor, 2022; Fraser, 2001).

In the latter account of just transition, claims for social equality and cultural recognition go hand in hand with procedural accounts of justice. In order to open up opportunities for just and sustainable futures, environmental justice scholars and activists alike have called for democratic institutions that involve marginalized groups as equal partners in climate policy discourse and practice (Cha and Pastor, 2022). Inclusive and participatory decision-making procedures are seen here as both an element of, and a condition for, distributive and recognition justice (Schlosberg, 2004). In recent years, this broader just transition agenda has been picked up by environmental NGOs and climate justice networks to unite movement struggle in global climate politics (Rosemberg, 2020). Hence, the actors who mobilize for just transitions today extend beyond labor unions and include environmentalists, indigenous communities, human rights activists, and youth networks. While the concept of just transition has been successful in bringing together these diverse social movements behind a unified banner, it remains a living concept with multiple and sometimes conflicting articulations and meanings (Stevis et al., 2020).

This chapter adopts a narrative lens to trace the multiple stories of climate (in) justice told by non-state and sub-state actors in the city of Lysekil as a result of the Preemraff court case and Sweden's efforts to decarbonize. We contend that narratives – or the stories people tell – are helpful when seeking to understand the subjective nature of political reality and what motivates people to take (or resist) climate action (Lejano et al., 2013). As argued by Patterson and Monroe (1998, p. 330), narratives can provide a rich source of information about how people make sense of their lives, put together information, think of themselves, and interpret their world. When studying narratives, analysts not only gain information about a sequence of events. Narrative analysis also offers insight into how individuals and collectives imbue those events with meaning and establish shared aims and identities (Robertson, 2017, p. 124). While stories are contextually thick and start from the speaker's lived experience, they can also function as the glue that binds heterogenous groups of actors together and motivates collective action (Lejano et al., 2013). As illustrated by Kalt's (2021) study of the German energy transition, for instance, social movements strategically tell stories of climate injustice to mobilize adherents, demoralize opponents, and provide direction for political action.

Narrative scholars often use the terms "narrative" and "story" interchangeably. Loosely defined, both terms refer to the chronological and thematic ordering of events into plots that tie different parts together into a meaningful whole (Robertson, 2017, p. 124). In this chapter, however, we make an analytical distinction between the canonical justice narratives advanced by the labor and environmental justice movements, on the one hand, and the emplaced stories of climate (in)justice told in Lysekil, on the other. Following Feldman et al. (2004), we suggest that narratives are characterized by their general currency and durability, whereas stories embed narrative themes in the lived experience of people in a specific time and place. Although few of our interview respondents are directly linked to the labor and environmental justice movements' just transition efforts, we make use of the two just transition narratives outlined above as helpful interpretative frames that allow us to explore how the stories of climate (in)justice told in Lysekil are narratively linked to broader movement struggle.

## 8.3 Narrating Just Transitions: Method and Material

As a research method, narrative analysis is attentive to how people "story" themselves into social and political relations through an intermingling of rationality, affect, norms, and culture (Lejano et al., 2013, 13). Researchers look for stories in novels, films, autobiographies, policy documents, oral accounts, and interview

transcripts. Some stories have a single narrator; others have multiple voices (Robertson, 2017). The role of the analyst is to interpret what the storyteller means by looking at narrative form, structure, and content (Feldman et al., 2004). By attending to "the what" and "the how" of the narrative, it is possible to discern patterns across a larger corpus of material. This chapter follows Jones' and McBeth's (2010) framework for narrative policy analysis to identify and categorize the stories of climate (in)justice told in Lysekil. We do so by attending to four narrative elements: (1) the context of the story, such as the institutional setting of the Preemraff controversy, (2) the plot that binds the Preemraff court case together, (3) the characters of the story, such as the victims of climate injustice and the agents responsible for doing something about it, and (4) the moral, or principles of right and wrong, that guides policy solutions.

Our analysis rests upon four sources of primary material: (1) media coverage and press releases relating to the Preemraff court case; (2) participant observations during the Environmental Court of Appeal's negotiations in Lysekil from March 10–12, 2020; (3) 18 individual interviews with local politicians, municipal officials, union representatives, and industry management; and (4) four focus group interviews with local citizen groups (a total of 13 people). For a detailed list of interviews, see Table 8.1. The media articles and press releases were retrieved through open searches in Google, using Swedish search terms such as "Preemraff," "Preemraffs utbyggnad," "Stoppa Preemraff." Our media material is limited in scope and was primarily used to contextualize and triangulate the stories told by our interviewees. The participant observations were recorded through field notes and

Table 8.1 List of interviews

Actor category	Interview type and number of interviewees	Location
Preemraff sustainability management	Individual interview (1)	Online 2020
Municipality management, climate and sustainability focus, energy focus	Individual interviews (6)	Lysekil and online 2020
Representatives from the green party, moderates, social democrats, left party, Lysekil party, and communist party	Individual interviews (8)	Lysekil 2020
Representatives from unions	Individual interviews (3)	Lysekil and online 2020
Environmental activists	Focus group (4)	Lysekil 2020
Women	Focus group (3)	Lysekil 2020
Energy utility workers	Focus group (4)	Lysekil 2020
Industrial workers	Focus group (2)	Lysekil 2020

offered additional context to our interviews. The interviews form the main corpus of our narrative analysis. Most interviews were conducted in Lysekil in October 2020, but due to pandemic-related travel restrictions, some were also held online.

The focus group participants were recruited through open invitations posted at the local library and with the help of local gatekeepers (e.g., a municipal official, a community organizer, and a local schoolteacher). When composing the focus groups, we strived to achieve a plurality of local voices and perspectives. Due to the controversial nature of the Preemraff court case, some focus groups turned out to be smaller than we had initially planned. To avoid any discomfort among the interviewees, we decided not to mix the groups and ensured that all would be de-identified. The interviewees received detailed information about the project prior to the interviews and gave their written consent.

All interviews were semi-structured and lasted from 45 minutes to 1.5 hours (Kvale and Brinkmann, 2009; Wibeck, 2010). To encourage narrativization, we invited our interviewees to reflect upon five open-ended questions: (1) their views on Lysekil's past and present; (2) how Sweden's ambition to become the first fossilfree welfare state will impact the city; (3) how they view Preemraff's expansion plans; (4) who has agency and responsibility in the fossil-free transition; and (5) what a just transition to net-zero emissions entails. The interviews were recorded and transcribed for further analysis. The transcripts were inserted into NVivo software and categorized by actor and type (Maher, 2018). Our qualitative analysis followed an iterative and abductive approach (cf. Berner, 2005; Srivastava and Hopwood, 2009) in which we explored and categorized local justice claims in view of the more canonical narratives found in the just transition scholarship. After several rounds of explorative coding (Fairclough, 1993; Ryan and Bernard, 2003), we assembled re-occurring themes and claims into three stories of climate (in) justice that were systematized using the narrative framework proposed by Jones and McBeth (2010).

None of the stories presented in this chapter are told by a single narrator. They are all multi-voiced and the result of our active interpretation of the multiple and sometimes incongruous meanings invoked by the interviewees. While we looked for recurring narrative themes in our material, we were also attentive to stories that break canonicity and offer contending interpretations of what the Preemraff controversy means for Lysekil, its citizens, and ultimately Sweden's ability to justly transition to net-zero emissions. Hence, rather than striving to achieve a unified picture, the three stories presented here reflect our analytical ambition to extend the political imagination by making space for unexpected voices and claims.

#### 8.4 The Preemraff Controversy: Setting the Scene

Swedish industrial emissions of carbon dioxide are linked to a few major plants in the iron and steel, mineral, and petroleum sectors (SEPA, 2022). One of these plants is the Preemraff oil refinery, located in Brofjorden, a couple of kilometers north of Lysekil. The refinery was built during the 1973 oil crisis when oil prices skyrocketed on the global market. At the time, the Swedish economy was highly dependent upon imported petroleum products, and the Social Democratic government worried that rising prices would bring harm to Swedish industry and households (Vedung and Hansén, 2019). When the government launched widespread oil rationing and energy-efficiency schemes in 1974, it set in motion a national energy transition with significant climate implications. Within one decade, the share of oil in Sweden's energy supply dropped from 70 to 40 percent, and the territorial carbon emissions were almost halved in a single stroke (SCPC, 2019, p. 17).

When the oil crisis unfolded in Sweden, the construction of the refinery in Lysekil was already under way. The Swedish Oil Cooperative (OK) had for some time lobbied the national government for permission to build a consumer-owned plant that would reduce the market dominance of international oil companies and secure a steady supply of fossil fuels to Swedish farmers, fishermen, and vehicle owners (Oljeraffinaderiet Scanraff, 2022). In the late 1960s, OK identified Brofjorden as a possible location for its refinery. Given its deep-sea waters and stable granite rocks, Brofjorden was seen as an ideal site for oil processing, shipping, and storage (Fredh, 2015). While support for the investment was almost unanimous among local politicians in Lysekil, environmental groups and nearby house owners expressed concern about the loss of recreational value and property prices in the region. When the protest group "Save Brofjorden" was formed to stop the establishment of the refinery, it exposed tensions between the city's seasonal visitors and industrial workers. Whereas the former group sought to save Lysekil's pristine marine environment from the oil industry, the latter group highlighted the jobs and social welfare benefits promised by OK (Fredh, 2015). The environmental protests resulted in numerous investigations by the national authorities but were also loudly challenged by local politicians who insisted that industrial development and nature protection could go hand in hand. In November 1970, the Social Democratic government granted OK permission to build the refinery, and one year later the construction of the deep-sea port began.

The construction of the refinery in Lysekil was a huge undertaking involving planners, lawyers, architects, engineers, and construction workers from all parts of Sweden, as well as internationally. In parallel to the construction of the port and the onshore processing units, the refinery required multiple underground oil storage areas and two 140-meter-high chimneys. According to architect Joan Sachs, concerted efforts were made to let the refinery merge into the landscape, thereby creating

"an ecological balance between industry and nature" (Fredh, 2015, p. 23, our translation). New roads were built to facilitate the transport of materials, and two new schools were established in Lysekil to serve the families of incoming Italian and North American workers. As argued by local city planner Nils Halla at the time, "We have customized Lysekil's urban plan to accommodate OK" (Fredh, 2015, p. 9, our translation). After four years of intensive construction work, the Scandinavian refinery AB (Scanraff) was officially inaugurated by Swedish King Carl XVI Gustav in May 1975. The event was widely attended by representatives from local and national government and celebrated as an important investment that would offer both national energy security and local job security (Fredh, 2015).

In the mid-1990s, OK Petroleum was bought by Saudi Sheik Mohammed H. Al Amoudi and the refinery in Lysekil changed its name to Preemraff. The plant was hereby incorporated into the larger petroleum company Preem, with headquarters in Stockholm and additional refineries in Gothenburg. Today, Preemraff employs some 600 workers from Lysekil and the surrounding area (Preemraff, 2021). Although the refinery offers less jobs than Lysekil's thriving tourism industry (Regionfakta, 2022), Preemraff remains an important source of livelihood for the city's industrial workers and their families. When Preem applied for a permit in December 2016 to expand its operations in Lysekil through a project called Residue Oil Conversion Complex (ROCC), local reaction was therefore largely positive. The ROCC project was presented as a response to the International Maritime Organization's decision to ban high-sulfur marine fuel and entailed the building of a cracker that would allow the refinery to convert sulfur-rich residue oil into low sulfur diesel and gasoline (Langlet, 2019). The project involved a SEK 15 billion investment that was estimated to provide employment for 2,000 construction workers over a two-year period and result in 200 new long-term jobs at the refinery (Lysekilsposten, 2017).

In the local city council, politicians from the left to the right openly celebrated the new jobs promised by the industry (DN, 2020). However, the expansion plans also gave new impetus to the "Save Brofjorden" campaign and its long-standing critique of the refinery (Rädda Brofjorden, 2023). Local house owners raised concerns about the health effects of the sulfurous winds blowing from the plant, and various environmental organizations questioned whether the ROCC project was compatible with the Swedish climate policy framework and the 2045 net-zero emission goal (Stoppa Preemraff, 2023). In 2018, Preemraff was the third largest Swedish point source of carbon dioxide with annual emissions of 1.7 million tons (SEPA, 2022). With the ROCC project in place, the emissions were estimated to increase to 3.4 million tons per year, turning Preemraff into the largest industrial emitter in Sweden (Langlet, 2019). In June 2019, the Environmental Court of Appeal decided to recall the preliminary environmental permit granted to the refinery (Land and Environmental Court, 2018), and in March 2020 the involved parties were invited to court hearings in Lysekil.

"We say keep it in the ground!" was the slogan chanted by the many environmental activists who had traveled to Lysekil for the court hearings. While Extinction Rebellion, Climate Action, and Fridays for Future marched in the streets to express their outrage against Preemraff's expansion plans, Greenpeace activists protested from the sea in kayaks and smaller vessels. Inside Oscars, a 19th-century clubhouse temporarily converted into a court room, the Swedish Society for Nature Conservation (SSNC) called in climate experts who pointed at Sweden's fair share of a shrinking global carbon budget. If we are to have any chance of limiting global mean warming to 1.5°C, argued the experts, rich countries like Sweden must show leadership and cut domestic carbon dioxide emissions to zero as early as 2030. Hence, rather than expanding the processing of oil, SSNC called for a fossil-fuel phase-out within the coming decade. Representatives from Preem, in contrast, pointed at the climate benefits of the ROCC project. By providing a global shipping industry with low-sulfur fuel, the refinery promised long-term energy-efficiency gains and reduced global emissions (participant observation, March 2020).

In June 2020, the Environmental Court of Appeal handed over its final ruling to the Swedish government (Land and Environmental Court, 2020). The court concluded that the Swedish climate policy framework has no legal standing in the environmental permit process. The carbon dioxide emissions generated by Preemraff are regulated by the EU Emissions Trading System (EU ETS), and the ROCC project was thereby beyond the jurisdiction of Sweden's national climate goals. With the legal permit in place, the final decision was now in the hands of the Social-Democratic and Green coalition government. Given the political energy and prestige invested in the Climate Policy Framework by the Swedish Green Party, the government searched for a compromise that would safeguard the jobs in Lysekil and yet keep the national climate goal within reach. Despite rumors of intense negotiations between the Ministry of Environment and Preem management (Expressen, 2020), many were surprised when the company announced in late September 2020 that the ROCC project was cancelled and that Preemraff would redirect its operations toward renewable fuel production. Although the decision was justified on strictly commercial grounds (Preem, 2020), the climate movement interpreted the result as a victory and a crucial step in Sweden's fossil-free transition (SSNC, 2021).

### 8.5 Contending Stories of Climate (In)justice

In the following, we present three stories of climate (in)justice told by non-state and sub-state actors in Lysekil in view of the Preemraff court case and Sweden's efforts to decarbonize.

### 8.5.1 The Distributive Story: Producers Are Not to Blame

It's really important to understand that we should not share the burden proportionally. Some can pay more for transition, and they should. That is just my view. (union representative)

The first story resonates with the labor movement's just transition agenda and the assumed opposition between industrial jobs and transformative climate action. Efforts to stop Preemraff's expansion plans are pitted here against the livelihoods of Lysekil's industrial workers and their families. At the heart of this story is the sense of an unjust social distribution of benefits and harm in Sweden's transition to net-zero emissions. Several local politicians agreed that Lysekil is unfairly blamed for Sweden's territorial emissions and asked to pay the price for the government's climate policy ambitions. In the Preemraff controversy, it was assumed that several hundred jobs were at stake. Giving up the employment opportunities promised by the ROCC project is a high price to pay for a city that rests heavily on the skilled work provided by one industry. Rather than asking the citizens of Lysekil to sacrifice their jobs and welfare to meet Sweden's climate goals, this story points to the welfare services provided by the refinery and the people who work there. "We are securing a steady supply of high-quality fuel to Swedish society, yet we are getting the blame," noted one industry worker. If we close down production of petroleum products in Lysekil, Sweden will not only lose important industrial jobs. We will also transfer the climate impact abroad, argued the same person.

This first story of climate (in)justice projects a political tension between fossil-fuel producers and users and redirects blame to the social groups with the largest carbon footprints. As argued by one union representative, the activists who traveled to the court negotiations by car should look in the mirror and take responsibility for their own carbon emissions. This distributive story also points to the unjust social relations between Sweden's urban centers and rural periphery. Not all cities have the same economic or geographical preconditions to reduce carbon emissions, noted one municipal official. This interviewee invoked the metaphor of children watching a soccer game to explain why resourceful cities are morally obliged to lead the way into a fossil-free society:

The tallest child sees above the middle child who barely sees, but nearly, and the short child is far from seeing. With a justice perspective you give all three a stool to stand on, which means that the tall one sees really well, the middle one sees and the short one sees nothing. What you want to achieve is a situation in which all three kids see the game, so the tall child does not need a stool at all while the second child manages on the stool first suggested and the smallest child needs the tallest stool. (municipal official)

Similar arguments were mobilized to compare the capacity of individuals and social groups to engage in the political project of decarbonization. "Why do you need a car

in a large city with good public transport?" asked one union representative. Since rich and privileged groups often emit more, this interviewee argued, the transition costs cannot be equally shared. Resourceful urban dwellers, for whom emission cuts are easy, should take the lead and support rural communities who are struggling to get by. Although Lysekil's fossil-fuel workers are at the center of this distributive story, climate injustice is understood here as a relative term tied to income, class, and material capabilities. As explained by one industrial worker:

Well if he's hungrier than I am, it's like when you have a family with three kids and you have to divide something in a fair way. I mean, it depends completely on your circumstances. (Industrial worker)

In this first story of climate (in)justice, Preemraff is depicted as an ally or even a hero in Sweden's fossil-free transition. Some local actors demonstrated strong loyalty to the refinery and described it as one of the most modern and environmentally adapted companies in the world. "We've been doing this since 1975 and we've never been questioned before. We're best in our class, to put it simply," noted one union representative. Echoing Preemraff's own marketing campaign, the ROCC project was seen here as a sign that the refinery is taking global responsibility and leading the transition to sustainability. Even though these actors had a hard time imagining Lysekil without Preemraff, change is still central to this story of injustice. Several interviewees spoke with nostalgia of Lysekil's industrial past when stone cutting, fish canning, and engine production engaged large parts of the local community. In this story, the refinery is a remnant of the city's industrial heritage and is thus central to community identity. However, given the structural transformations endured by the citizens of Lysekil in the past, the provision of jobs was deemed more important than the continued production of fossil fuels. "Green investments and jobs are welcome," argued one union representative.

While this distributive story is centered on who gets what and how in Sweden's fossil-free transition, it also contains restorative claims. In line with the labor movement's just transition agenda, there is a general assumption that fossil-fuel workers and their communities need to be compensated for the changes imposed upon them. Since the 1970s, Preemraff has brought highly skilled jobs, tax revenues, infrastructure investments, and public transport to Lysekil. If national climate policy goals restrict the refinery's operations, several interviewees agreed that there needs to be some sort of payback. As argued by one local politician: "We have to be able to create other types of jobs. We need economic resources from the state to transition." The moral to this first story is therefore one of compensation and restoration of a region in industrial decline and the provision of alternative livelihoods for a community shaped by its industrial past. New climate-smart industries, green jobs for highly-skilled workers, and improved public transport and

communications belong to the solutions invoked here. Without restorative efforts of this kind, Lysekil would become cemented as rural periphery.

#### 8.5.2 The Procedural Story: No Transition without Recognition

It's important to get this view of the future that we want ... so that we're working towards something and not against something, and that you feel included and participate in this work and feel like you can affect it ... that you can participate in co-creating a new future. (focus group women)

In parallel to the distributive story of climate (in)justice told in view of the Preemraff controversy, our material also contains numerous calls for procedural justice and social recognition. Without widespread community engagement and participation, the story goes, there will be no transition. This second story of climate (in)justice extends the Preemraff controversy beyond the concerns of industrial workers and their families. In line with the environmental justice movement's expansive transition agenda, it calls upon political leaders to listen out for a broader range of local voices, experiences, and perspectives. In this procedural story, Swedish climate policymaking has failed to engage social groups beyond those with specialized knowledge and expertise. In order to gain widespread public support for Sweden's fossil-free transition, more dialogue and active participation by all social groups and communities is required:

Democracy has to be widened. Our politicians say that when the elections are over, they're in charge. That is not the case. They have received our trust but they have to listen to people all the time. (environmental activist)

The youth of Lysekil take center stage in this second story of climate (in)justice. This is a group that was remarkably silent in the Preemraff controversy, but who nonetheless will live with the consequences of the refinery's decision. Several interviewees insisted that younger generations are more aware when it comes to climate change and therefore understand the need to transition away from fossil fuels. Nonetheless, youth are rarely consulted when decisions are made about Lysekil's future:

I mean our youth have a totally different point of view. They're usually not included in the constellations that we work in, so then we seldom include those perspectives. This is a challenge we need to work on. (municipal official)

To successfully break free from entrenched carbon lock-ins, this story contends that Lysekil needs to move beyond the divisions and conflicts generated by the Preemraff controversy. The "jobs vs. climate debate" resulted in locked political positions and polarization between social groups and regions, noted one municipal official. Political leaders and citizen groups who felt let down by Preemraff's

decision to cancel the ROCC project searched for scapegoats. "My daughter didn't dare talk about climate change in school," claimed one interviewee. Since many classmates have parents who work at the refinery, the Preemraff court case silenced the young people in the city.

Fridays for Future has struggled to recruit supporters here. My daughter joined one Friday and it was very brave of her to make such a clear statement. (focus group women)

To move forward, argued one municipal official, "we need to build a society that holds together." Social conflicts and unrest slow down transformative climate action and limit inclusive debate about Lysekil's future. However, it takes political courage to open up the climate policy debate to a plurality of voices. In the fossil-free transition, political parties need to move beyond bickering and look for common ground, noted several interviewees. This is a task not only for the city council of Lysekil but also for political leaders in the Swedish parliament and government:

Will all of society really . . . When politicians set these goals, will they themselves live up to them, or is it just talk? If you really want impact and credibility, the government has to show that they are serious very, very quickly. (local politician)

In this second story of climate (in)justice, decarbonization comes across as a necessary and desirable goal for Lysekil and its citizens. However, the fossil-free society was easier to imagine for some people than others. Several interviewees talked about the possibilities of a beautiful place like Lysekil. In a fossil-free future, the blue economy, research, and tourism will expand and flourish. People will be able to live and work both locally and remotely. For others, the fossil-free society was more uncertain, blurry, and out of reach:

We are now entering this area which is gray, this thing over there . . . (*the future*). You can't touch it. It's like way over there, somehow. At the same time, we probably understand that we have to do something about it. It's not an easy equation. (focus group industrial worker)

The uncertain trajectory of Preemraff features in this story, but the refinery itself is not portrayed as an agent of change. The Preemraff court case is rather the backdrop to a more profound societal drama in which political leaders – nationally, regionally, and locally – are asked to find communitarian solutions to multiple, and yet integrated, social problems and inequalities. Although the citizens of Lysekil feature as key victims in this drama, they also constitute an important part of the solution. The moral to the story is one of social recognition and inclusion. If Sweden is to justly transition to net-zero emissions, a much broader range of citizen groups needs to be consulted and actively involved in the co-creation of the fossil-free society. This will require responsive political leaders who take seriously the voices, concerns, and experiences of all those groups who live in the shadow of extractive industries, and democratic institutions that grant full participatory rights for affected communities.

## 8.5.3 The Ecological Story: Protecting the Rights of Nature

Although distributive and procedural justice claims predominate in our material, the debates following the Preemraff court case also include seeds of an ecological justice narrative that highlights the intrinsic value and rights of nature. This third story of climate (in)justice points to the damaging ecological effects of Lysekil's industrial past and the city's contemporary dependence on oil. The primary victim of injustice here is the unique marine and coastal environment of Brofjorden. During the late 19th and early 20th centuries, the red granite rocks were subject to extensive mining, and the ecological balance of the sea was disturbed by herring fishing and canning, recalled one interviewee. Since the establishment of Preemraff in 1975, the exploitation of the marine environment has accelerated. The extensive refining and shipping of petroleum products in Brofjorden have left big scars on the landscape and spread pollution and toxins by water and air.

In this ecological story, a more respectful and caring relationship to the North Sea and all its many non-human inhabitants is a necessary component of Sweden's fossil-free transition. People's deep interdependence with the natural environment is very evident in a coastal zone like Lysekil, some argued. The sea, the wind, and the red granite cliffs are ever-present features of everyday life. Thus, rising sea levels and depleted fish stocks are hard to ignore. Preemraff's expansion plans represent a continuation of an extractive mindset that has justified centuries of environmental exploitation and domination. This destructive trajectory must be stopped if we are to have any chance of managing the unfolding climate crisis, suggested several environmental activists. In this third story of climate (in)justice, the refinery is the villain but also the symbol of a much larger structural problem tied to a fossil-fueled economy that drives environmental destruction and global inequalities. Thus, a rapid shift away from fossil fuels is not only a survival strategy for Lysekil but for humanity and the planet at large.

Several interviewees noted that an interdependent global economy limits local transformative agency. No city is isolated from the rest of the world:

We just move the trouble one step away. Like solar cell batteries. We make them in China, the emissions are there. We don't see them, but they exist globally. (energy utility worker)

However, the lack of climate ambition in other parts of the world should not stop Lysekil's decarbonization efforts. To break entrenched carbon lock-ins, the story goes, people need to come together and search for better ways of life that prioritize ecological and social sustainability over economic growth. Some interviewees spoke about the prospects of local energy democracy and food security. Rather than waiting for regional and national authorities to govern society toward deep

decarbonization, they insisted that the citizens of Lysekil can show the way to a fossil-free society:

This is not our first environmental crisis. During the herring season, the cooking of fish oil affected the whole Gullmardsfjord. But when the degradation reached a threshold, people came together and decided to change things. (environmental activist)

In a decarbonized future, the citizens of Lysekil will let go of their carbon-intensive industrial past and experiment with self-sufficiency, off-grid alternatives, local food production, as well as reduced travel and consumption. "You may need to live simpler somehow, more locally produced," suggested one industrial worker. Another interviewee imagined turning Brofjorden into a marine national park. This would transform Lysekil into an eco-tourist hub and allow the city to reassume its rightful role as an entry point to the North Sea. The moral to this third story of climate (in)justice is thus one of recognition and respect for the unique marine environment of Brofjorden, as well as global solidarity with all vulnerable communities who are suffering the effects of an extractive economy.

#### 8.6 Conclusion

The deep decarbonization required to meet the goals of the Paris Agreement is a massive undertaking that requires widespread engagement of actors across jurisdictional levels and societal sectors (Chapter 1, this book). In order to rapidly move society toward net-zero emissions, the Swedish government has invited industry, businesses, regions, and municipalities to identify transformative pathways that can break carbon lock-ins and accelerate the shift away from fossil-fueled infrastructures and practices (Chapter 7, this book). However, since such pathways entail profound changes in social, technical, economic, and political systems, they are also disruptive and subject to democratic contestation (Bernstein and Hoffman, 2018; Blühdorn, 2020).

This chapter has approached the city of Lysekil as an empirical site where transformative disruptions and contestation come to the fore. We employed a narrative analysis to trace stories of climate (in)justice told by local actors in view of Sweden's efforts to decarbonize and to examine how people living in the shadow of Scandinavia's largest oil refinery imagine a just transition to net-zero emissions. We found that many actors in Lysekil are struggling to overcome the fundamental conflict between ambitious climate action and fossil-fueled forms of local development. Despite municipal efforts to bring emissions down in the housing, transport, and energy sectors, the city operates in the shadow of the refinery, and many citizens remain locked into carbon-intensive jobs and infrastructures. The extensive investments channeled into the planning, building, and upgrading of the petrochemical infrastructure in Brofjorden illustrate how decisions in the

past shape the imagining of transformative opportunities in the present and future. In Lysekil, the path dependencies that prevent decarbonization have both material and cultural dimensions.

A recurring story of climate (in)justice told in view of the Preemraff controversy revolves around the "jobs vs. climate binary" (Stevis et al., 2020) and the unjust social distribution of social benefits and costs between Sweden's fossil-fuel producers and consumers, urban centers and rural periphery, the rich and the poor. This story draws upon several narrative themes found in the labor movement's just transition agenda and asserts that the remedy for climate injustice is to be found in economic compensation and diversification schemes. In the years following the Preemraff court case, this distributive story took hold in the Swedish climate policy debate (Fischer et al., 2023) and was picked up by the Social Democratic and Green coalition government to channel funds from the EU's Just Transition Mechanism (Moodie et al., 2021). Whether the city of Lysekil will receive any economic compensation for potential job loss remains to be seen. In November 2021, the government identified the petrochemical industry on the Swedish west coast as one of the actors in need of EU just transition support (Swedish Agency for Economic and Regional Growth, 2021). However, the same month, the Swedish Environmental Protection Agency (SEPA) was notified that Preemraff had underreported its annual carbon dioxide emissions during the past five-year period (SEPA, 2022), and the Swedish climate movement initiated a new appeal process against the refinery's biofuel production plans (Stoppa Preemraff, 2023). The controversy continues.

While debates about who gets what, when, and how are likely to intensify as Sweden's 2045 emissions goal comes closer, just transitions need not be interpreted in distributive terms alone. In fact, recent studies have suggested that distributive claims can "hollow out" progressive justice agendas and be used to justify climate inaction (Abram et al., 2022; Fischer et al., 2023). This chapter identified two alternative stories of climate (in)justice that push the just transition debate in other, and possibly more productive, directions. The procedural story taps into narrative themes advanced by the environmental justice movement and insists that the state must give voice to all those social groups who live in the shadow of Sweden's extractive industries. Listening out for multiple experiences of Sweden's industrial past and carbon-intensive present is key here to the co-construction of a sustainable society. Without social recognition and widespread participation, there will be no transition. The ecological story extends this just transition debate beyond the citizens of Lysekil and invites solidarity with all living environments that sustain a fossilfueled and extractive global economy. To justly transition to net-zero emissions, this story pays attention to ecological interconnectedness and inequality. Sweden is not isolated from the rest of the world, and the shift away from fossil fuels can therefore not come at the expense of vulnerable people and environments elsewhere.

The stories of climate (in)justice told in this chapter confirm that a just transition remains a living concept with multiple and sometime conflicting interpretations. Grounded in a mix of personal experiences, scientific facts, ethical considerations, emotions, and values, they illustrate how people give meaning to political events and "story" themselves into social and environmental relations. Attending to these stories is an important analytical task for scholars and policymakers concerned with breaking carbon lock-ins and accelerating the shift away from fossil fuels. Personal narratives give us access to different ways of experiencing and relating to a rapidly warming world and offer a close-up view of the interests, norms, and desires that make people support or reject transformative agendas. Although the multiple stories of climate (in)justice told in view of Sweden's efforts to decarbonize may complicate the transition to a fossil-free society, we conclude that legitimate and progressive pathways to that society are unlikely to emerge without them.

#### References

- Abram, S., Atkins, E., Dietzel, A. et al. (2022). Just transition: A whole-systems approach to decarbonization. *Climate Policy*, 22(8), 1033–1049.
- Bazilian, M. D., Carley, S., Konisky, D. et al. (2021). Expanding the scope of just transitions: Towards localized solutions and community-level dynamics. *Energy Research & Social Science*, 80(102245). https://doi.org/10.1080/14693062.2022.2108365.
- Blühdorn, I. (2020). The legitimation crisis of democracy: Emancipatory politics, the environmental state and the glass ceiling to socio-ecological transformation. *Environmental Politics*, 29(1), 38–57.
- Berner, B. (2005). Att skapa och analysera material: erfarenheter från fältet. In Bergman, P. and Olofsson, G., eds., *Samhällsvetenskapens hantverk*. Lund: Arkiv förlag.
- Bernstein, S. and Hoffman, M. (2018). The politics of decarbonization and the catalytic impact of subnational climate experiments. *Policy Sciences*, 51, 189–211.
- Brodén Gyberg, V., and Lövbrand, E. (2022). Catalyzing industrial decarbonization: The promissory legitimacy of fossil-free Sweden. *Oxford Open Climate Change*, 2(1), kpac004
- Cha, M., and Pastor, M. (2022). Just transition: Framing, organizing, and power-building for decarbonization. *Energy Research and Social Science*, 90(102588). doi.org/10.1016/j.erss.2022.102588).
- Dagens Nyheter. (2020). *I Lysekil välkomnar många Preems planerade utbyggnad*. www .dn.se/nyheter/sverige/i-lysekil-valkomnar-manga-preems-planerade-utbyggnad.
- Della Bosca, H., and Gillespie, J. (2018). The coal story: Generational coal mining communities and strategies of energy transition in Australia. *Energy Policy*, 120, 734–740.
- Expressen. (2020). Efter mailgranskningen Lövin kallas till utskottet, September 29, 2020. www.expressen.se/nyheter/efter-mejlgranskningen-lovin-kallas-till-utskottet.
- Fairclough, N. (1993). Discourse and Social Change, Cambridge, MA: Polity Press.
- Feldman, M. S., Sköldberg, K., Brown, R. N., and Horner D. (2004). Making Sense of Stories: A Rhetorical Approach to Narrative Analysis. *Journal of Public Administration Research and Theory*, 14(2),147–170.

- Fischer, A., Sofie, J., Strandell, J. et al. (2023). How justice shapes transition governance: A discourse analysis of Swedish policy debates. *Journal of Environmental Planning and Management*, doi.org/10.1080/09640568.2023.2177842.
- Fleming, R. C., and Mauger, R. (2021). Green and just? An update on the "European Green Deal." *Journal for European Environmental & Planning Law*, 18, 164–180.
- Fraser, N. (2001). Recognition without justice? *Theory, Culture & Society*, 18(2–3), 283–345.
- Fredh, T. (2015). Historien om etableringen av ett raffinaderi. Spelet kring tillkomsten av Scanraff, Stångenäs Hembygdsförening, Brastad.
- Goldthau, A., and Sovacool, B. K. (2012). The uniqueness of the energy security, justice, and governance problem. *Energy Policy*, 41(1–2), 232–240.
- Jones, M. D., and McBeth, M. K. (2010). A narrative policy framework: Clear enough to be wrong? *Policy Studies Journal*, 38(2), 329–353.
- Kalt, T. (2021). Jobs vs. climate justice? Contentious narratives of labor and climate movements in the coal transition in Germany. *Environmental Politics*, 30(7), 1135–1154.
- Kvale, S., and Brinkmann, S. (2009). *The Qualitative Research Interview*, Lund: Studentlitteratur.
- Langlet, D. (2019). Preemraffmålet. Kan Sveriges största koldioxidkällor reglers utifrån sin klimatpåverkan? *JP Miljönet*, August 16, 2019.
- Land and Environmental Court. (2018). Case Number M 4708–16. www.domstol.se/globa lassets/filer/domstol/vanersborgs tingsratt/kungorelser/kungorelse-m-4708-16.pdf.
- Land and Environmental Court. (2020). Case Number M 11730-18.
- Lejano, R., Ingram, M., and Ingram, H. (2013). *The Power of Narrative in Environmental Networks*. Cambridge, MA and London: The MIT Press.
- Lysekilsposten. (2017). Preem planerar satsning på 15 miljarder kronor. https://etidning .lysekilsposten.se/p/naringslivet-lysekil/2017-11-15/a/preem-planerar-satsning-pa-15-miljarder-kronor/197/14827/1182783.
- Machin, A. (2020). Democracy, disagreement, disruption: Agonism and the environmental state. *Environmental Politics*, 29(1), 155–172.
- Maher, C., et al. (2018). Ensuring rigor in qualitative data analysis: A design research approach to coding combining NVivo with traditional material methods. *International Journal of Qualitative Methods*, 17, 1–13.
- Marquardt, J., and Lederer, M. (2022). Politicizing climate change in times of populism: An introduction. *Environmental Politics*, 32(5), 735–754.
- Mayer, A. (2018). A just transition for coal miners? Community identity and support from local policy actors. *Environmental Innovation and Societal Transitions*, 28, 1–13.
- Moodie, J., Tapia, C., Löfving, L., Sánchez Gassen, N., and Cedergren, E (2021). Towards a territorially just climate transition: Assessing the Swedish EU territorial just transition plan development process. *Sustainability*, 13, 7505.
- Newell, P., and Mulvaney, D. (2013). The political economy of the "just transition." *The Geographical Journal*, 179(2), 132–140.
- Oljeraffinaderiet Scanraff. (2022). www.ok.se/historia/agerande-i-kristider/oljeraffinader iet-scanraff
- Patterson, M., and Monroe, K. R. (1998). Narrative in political science. *Annual Review of Political Science*, 1, 315–331.
- Preem. (2020). Preem withdraws 2016 environmental permit application. https://preem-en .newsroom.cision.com/releasedetail.html?preem-withdraws-2016-environmental-per mit-application&releaseIdentifier=96BF741CC27BCA28.
- Preemraff Lysekil. (2021). www.preem.se/om-preem/om-oss/vad-vi-gor/raff/preemraff-lysekil/.

- Rädda Brofjorden. (2023). Vad innebär egentligen Preemraffs eventuella (och högst troliga) utbyggnad? https://sites.google.com/view/raddabrofjorden/startsida.
- Regionfakta Västra Götaland (2022). www.regionfakta.com/vastra-gotalands-lan/naring sliv/sysselsatta/sysselsatta-inom-turismberoende-branscher/.
- Robertson, A. (2017). Narrative analysis. In Boréus, K., and Bergström, G., eds., *Analyzing Text and Discourse: Eight Approaches for the Social Sciences*, London: Sage Publications.
- Rosemberg, A. (2020). "No jobs on a dead planet": The international trade union movement and just transition. In Morena, E., Krause, D. and Stevis, D., eds., *Just Transitions: Social Justice in the Shift towards a Low-Carbon Future*, London: Pluto Press, 32–55.
- Ryan, G. W., and Bernard, R. H. (2003). Techniques to identify themes. *Field Methods*, 15(1), 85–109.
- SCPC. (2019). Annual Report of Swedish Climate Policy Council 2019.
- Schlosberg, D. (2004). Reconceiving environmental justice: Global movements and political theories. *Environmental Politics*, 13(3), 517–540.
- SEPA. (2022). *Industrins klimatomställning*. *Underlagsrapport till regeringsuppdraget näringslivets klimatomställning*. Rapport 7045, April 2022. www.naturvardsverket .se/om-oss/publikationer/7000/978-91-620-7045-8.
- SEPA. (2022). Naturvårdsverket korrigerar Preemraff Lysekils utsläpp. www.naturvards verket.se/om-oss/aktuellt/nyheter-och-pressmeddelanden/naturvardsverket-korri gerar-preemraff-lysekils-utslapp.
- Seto, K. C., Davis, S. J., Mitchell, R. B., et al. (2016). Carbon lock-in: Types, causes, and policy implications. *Annual Review of Environment and Resources*, 41, 425–452.
- Silisea Declaration. (2018). Solidarity and Just Transition Silesia Declaration, signed at the 24th Conference of the Parties to the United Nations Framework Convention on Climate Change in Katowice, December 2018. www.ioe-emp.org/index.php? eID=dumpFile&t=f&f=134978&token=91237abd5b4e38c1e7c2e4364b2b8e70 95d8e0fd.
- Sovalcool, B. K. (2021). Who are the victims of low-carbon transitions? Towards a political ecology of climate change mitigation. *Energy Research & Social Science*, 73, 101916. https://doi.org/10.1016/j.erss.2021.101916.
- Srivastava, P., and Hopwood, N. (2009). A practical iterative framework for qualitative data analysis. *International Journal of Qualitative Methods*, 8 (1) 76-84.
- Stevis, D., Morena, E., and Krause, D. (2020). Introduction: The genealogy and contemporary politics of just transitions, In Morena, E., Krause, D., and Stevis, D. eds., *Just Transitions: Social Justice in the Shift towards a Low-Carbon Future*, London: Pluto Press
- Stoppa Preemraff. (2023). Historik. https://stoppapreemraff.se/historik-faktabank.
- Stoppa Preemraff. (2023). Om oss. https://stoppapreemraff.se.
- Swedish Agency for Economic and Regional Growth. (2021). *Nationellt program för fonden för en rättvis omställning 2021–2027*. Bilaga till protokoll I 4 vid regeringssammanträde den 3 november 2021. https://tillvaxtverket.se/eu-program/vara-eu-program/fonden-for-en-rattvis-omstallning.html.
- Swedish Society for Nature Conservation (SSNC). (2021). *Striden om Preemraff det här har hänt*. www.naturskyddsforeningen.se/artiklar/striden-om-preemraff-det-har-har-hant.
- UN. (2015). Paris Agreement. FCCCC/CP/2015/L.9/Rev.1.
- Vedung, E., and Hansén, D. (2019). Oljekrisen 1973 och Sveriges tvehövdade krispolitik. *Statsvetenskaplig tidskrift*, 121(4), 647–680.

- Wang, X., and Lo, K. (2021). Just transition: A conceptual review. *Energy Research and Social Science*, 82, 102291.
- Welton, S., and Eisen, J. (2019). Clean energy justice: Charting an emerging agenda. Harvard Environmental Law Review, 2842, 307–330.
- Wibeck, V. (2010). Fokusgrupper: Om Fokuserade Gruppintervjuer Som Undersökningsmetod. Lund: Studentlitteratur.
- Wodrig, S. (2018). New subjects in the politics of energy transition? Reactivating the northern German oil and gas infrastructure. *Environmental Politics*, 27(1), 69–88.