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Environmental Policies and The Reproduction of Business as Usual: How Does It Work?

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Abstract

This paper aims to advance knowledge about corporate environmentalism by using new concepts and methods. We broaden the concept of the firm as “differentiated composite actor” by including not only managers but workers and unionists as actors. We descend into the “hidden abode of production” using Lefebvre’s concept of “everyday life” to explore the barriers environmental policies experience in this sphere. We base our explorations on life-history interviews to understand how the imaginaries of production are embedded in people’s self-conceptions. We identify seven barriers to the implementation of environmental practices: deficient regulations, collusion between controller and controlled, de-prioritisation, hierarchism, compartmentalisation, specialisation, and social unsustainability. A “necessity discourse,” legitimating the priority of efficiency and product quality over environmental sustainability, subjugates alternative sustainable practices. The paper concludes with a discussion of the results in the light of previous investigations, suggesting that the concept of the everyday could enrich future research.

Keywords: corporate environmentalism; environmental practices; the everyday of production; necessity discourse

Introduction

Scholars and activists have argued that if carbon emissions are to be reduced significantly, oil and vehicle production are among the industries that need to be discontinued or, in the case of the latter, radically transformed and converted into producing environmentally sound, socially useful products (Cooley 1987; Henriksson 2011). Since there are few signs of such transformative practices in those industries, it is prudent to investigate whether reformist company measures are reducing emissions. Our paper, based on our EU-funded project “Low Carbon at Work,”¹ draws on an

¹ European Commission, Seventh Framework Programme (FP7-ENV-2010)

investigation into a transnational oil corporation and a transnational producer of heavy vehicles.

Corporate Environmentalism, Corporate Social Responsibility and the Everyday of Production Processes

In 1962 Humble, an oil company which later became ExxonMobil, published an advertisement in *Life Magazine* featuring a melting glacier and the proud headline: "Each day Humble provides enough energy to melt 7 million tons of glacier!" (Life Magazine, February 2, 1962,86). In 2015 ExxonMobil published a Corporate Citizenship Report in which they claimed they are now *preventing* glaciers melting: "We understand the need ... to expand the benefits of modern energy while protecting the environment and addressing the impacts of rising greenhouse gas emissions and climate change." This despite funding climate-change denialists for many years (Brulle 2014). In turn, the Director of Environment and Innovation at Volvo Trucks writes: "Protecting the environment is the biggest challenge we face. With new technologies, increased social momentum and industry collaboration, we can turn this challenge into our greatest achievement" (Martensson 2015).

Discussing "corporate environmentalism" and "corporate social responsibility" (CSR), Prakash argues: "The debate about corporate social responsibility boils down to two questions: under what conditions will firms adopt CSR policies, and under what conditions will CSR policies enhance firms' social/environmental and financial performance?" (Prakash 2007). There are many definitions of CSR, but most authors agree that practices deserving this label are "beyond-compliance actions, irrespective of their motivations ..." (Griffin and Prakash 2014, 467). CSR policies are seen to have financial, social and reputational benefits, and enhance competitiveness (Prakash, 2000; Nilsson et.al. 2004; von Borgstede and Lundqvist 2006; Griffin and Prakash 2014; Babiak and Trendafilova 2011; Porter and Kramer 2006).

Investigating "beyond-compliance" actions and corporate environmentalism, researchers typically examine the written policies of firms, interview managers about their aims and intentions, or distribute questionnaires to managers and experts of the field (Galvez-Martos et al. 2013; Rohdin et al. 2007; Lozano 2015; Babiak and Trendafilova 2011; Sarasini and Jacob 2014). Five barriers to "energy efficiency" are identified: institutional, market, organisational, technological and behavioural (Chai and Yeo 2012; Garavan et al. 2010; Weber 1997; Young et al. 2015). They all operate at the level of company programmes and intentions, while not pertaining to the production process.

Prakash (2002, 2) maintains that "environmental policy scientists have implicitly treated firms as unitary actors with similar responses to external incentives ... As a result, there is an inadequate understanding of the internal processes that lead firms to adopt or not adopt various kinds of environmental policies, especially the beyond-compliance ones." Our study looked at such internal processes, following Prakash's

suggestion to conceptualise firms as “differentiated composite actors.” However, we expanded his notion by including not only managers but also unionists and workers as actors, and by exploring not only the decision-making processes but also whether and how environmental policies are realised in the production process. To our knowledge, this process remains a black box in the literature. Young et al. (2015) reviewed studies investigating behaviour change strategies for employees, but they explored accompanying behaviours (e.g. waste management, turning off lights), not the production process itself. Irrespective of the motivations for adopting environmental policies, there is a difference between adopting a policy and the way it works in the sphere of production. To capture this process we employ the concept of “everyday life” as developed by Lefebvre (1984, 1992, 2002).

The Everyday Approach to Environmental Practices

The common view is that everyday practices are repetitive, ossifying social relations into systemic structures which determine people’s actions to a degree that they are reproduced almost unconsciously and thus may be a barrier to change (Hoffman and Henn 2008; Lülfs and Hahn 2014; Neal et al. 2012). Pentland et al. (2012) provide a model in which routine actions can lead to change, but it does not capture the complexity of everyday practices, since it does not include actors as thinking and feeling agents. Lefebvre’s concept of “everyday life” stands in contrast to the idea that the everyday is solely a place of more or less unconscious repetition. He developed his notion in four books written between 1947 and 1981. We cannot attempt to do justice to his theory in the space available and so will restrict ourselves to stressing those elements which allowed us to look at corporate environmentalism in a different way. When discussing what “knowledge of everyday life means,” Lefebvre remarks that “*in one sense* lavish institutions and grandiose ideas were façades ... And yet, where is the genuine reality to be found? Where do the genuine changes take place? In the unmysterious depths of everyday life!” (Lefebvre 1992, 137).

Operationalising this for our study, we argue that what has been studied so far have been the “façades,” the “grandiose ideas,” namely environmental intentions, motivations, companies’ CSR and sustainability programmes, and the results they reported. The everyday of such programmes, the “genuine reality” where change happens or not, is the hidden abode of the production process. It is there that we find workers and the middle management involved in producing what their company defines as a profitable product. Change happens when the feelings, ideas and actions of individuals in this production process are transformed and lead to different kinds of practices. We focus on work, which is one dimension of Lefebvre’s concept of the everyday. The concept includes work, leisure, family and private life “in terms of their many-sided activities” (1992, 42). We move beyond research on value-based individual behaviour (Lülfs and Hahn 2014) to an exploration of the *relationship* between social relations, organisational structures, and the imaginaries that together constitute the

production process. Imaginaries are shared socio-semiotic systems which “provide a sense of meaning, coherence and orientation around highly complex issues” and are “closely linked to the ways in which institutions and economic activity are organized and structured, and the ways people think they ought to be organized and structured” (Levy and Spicer 2013, 659-660). We analyse climate change imaginaries and their relationship to production imaginaries.

Production processes rely on “horizontal” cooperation between workers and “vertical” cooperation between workers and managers within hierarchical structures. Notwithstanding ever-present conflicts, for a production process to result in usable products, production-centred social relations and imaginaries need to be coordinated. New practices, which not only aim to change the way in which things are done, but also the rationale of why they are done, are likely to be met with resistance. Changes in production practices are contingent upon the way in which their implementation is negotiated across horizontal and vertical social relations, upon their technical viability, and upon the ease with which they can be accommodated within production imaginaries. This is what differentiates the “reality of the everyday” from the façades of grandiose ideas. We have aimed to investigate these relationships in order to understand whether changes induced at the level of company management and programmes have made their way into the everyday of production processes.

The paper is organised as follows: first, we describe our methods and data collection. Second, we introduce briefly the two companies we investigated. Third, we describe and analyse how environmental policies fare in the everyday production process. We analyse practices imposed through external regulations and voluntary policies. We begin discussing the external relationships between the company and the State agencies controlling their production to protect the public and the environment. From the external we move to internal relationships: *vertical relationships* between senior management at headquarters and devolved local management, local management and the workforce; *horizontal relationships* between different local managers (with an emphasis on the relationship between the environmental and other managers) and between workers in different sectors of one company.

Methods

We have chosen two of the most powerful transnational corporations (named GlobalOil and GlobalTruck²) in two of the most polluting industries because of the impact their environmental practices have on global carbon emissions.

The best method to understand everyday production processes would be participant observation. Due to company regulations, this was not possible. Our alternative approach was to interview people involved with the companies through different experiences and perspectives. We wanted to understand whether and how environmental concerns were embedded in the production processes, and how they

² Contractual agreements determined anonymity.

related to workers' and managers' production imaginaries, as well as how they had developed over time. We decided that life-history interviews would be the best method to achieve this goal (Denzin and Lincoln 2003; Holstein and Gubrium 2003; Saukko 2003). It worked in our favour that environmental practices and their meanings became part of the interviewees' broader accounts about their working and family lives, and as their stories unfolded they became less concerned to project an image of themselves and their company as environmentally aware.

Triangulating different accounts about the same workplace over time allowed us to build a more comprehensive picture of the production processes. When workers from different oil platforms told similar stories about oil spills, we could conclude from the pattern a common process and set of procedures. When managers in different companies described comparable difficulties of complying with regulations, we could conclude that the problems under discussion were not coincidental.

Not all interviewees were prepared to tell us their life story, which is why some interviews were semi-structured informative interviews, discussing the problems and possibilities of implementing environmental practices. Triangulating managers' accounts with those of blue-collar workers granted an insight into the everyday of the production processes.

All four project members conducted interviews with blue- and white-collar workers, trade union officials, and managers in the UK (GlobalOil) and Sweden (GlobalTruck) at their respective workplaces. Interviewees in Sweden (except for managers) were recruited by a member of the Executive Committee of the trade union according to our selection criteria: gender, age, time worked for the company, environmental tasks, and position. At GlobalOil we had to agree to workers being selected by the HR Manager. Notwithstanding, all interviewees were often remarkably candid and critical. They were provided with an information sheet explaining the project and a consent form to confirm their willingness to participate. In Sweden interviews were conducted between March 2011 and May 2012 (20 interviews in Swedish), in the UK between February 2012 and June 2012 (25 interviews in English). They took between 1 and 2,5 hours, adding up to about 70 hours. In the UK thirteen onshore staff managers were interviewed, two of whom were women. Ten technicians and engineers working offshore were interviewed, one of them a woman. In Sweden four members of local management (one woman) and sixteen blue- and white-collar workers (six women) were interviewed. All interviews were recorded and professionally transcribed. We consulted official publications of regulatory government bodies, and GlobalTruck and GlobalOil³ documenting their environmental record.

In this paper we present only part of the material,⁴ a synchronic analysis addressing the question of barriers at the level of the production process. We do not include drivers for environmental policies because they are well covered in existing research and were only scarcely mentioned by our interviewees. We employed an

³ We cannot specify the references since that would amount to disclosing the identity of the companies.

⁴ A gender specific analysis will be conducted in a separate paper.

inductive method, transferring our interviews into the MAXQDA qualitative data analysis program. The results we present are based on our top-level codes: “production goals,” “barriers,” “conflicts between environmental and production goals.” The seven barriers we identified and classify below emerged from the interviews.

Investigated Companies

GlobalOil

With the exception of financial services, the oil and gas industry is the most global economy. Seven of the top eleven revenue-generating companies in the world are oil companies (CNN Money 2013). IMF figures suggest that if GlobalOil were a country, it would be among the largest industrialised countries in the world in terms of GDP, and larger than countries such as South Africa, Argentina, Austria, and Denmark (International Monetary Fund 2013). For 30 years the North Sea has been an important but not the only location for the Upstream element of GlobalOil’s operations. The main thrust of its reported attempts to reduce GHG emissions is through supplying more natural gas to replace coal for power generation, investing in low carbon energy, and progressing CCS technologies.

GlobalTruck

GlobalTruck is one of the largest producers of heavy trucks and buses globally. The company reports its aspiration to convert GlobalTruck plants into carbon neutral factories. GlobalTruck reports that it is developing motors that can run on bio-gas and exploring ways to substitute diesel with energy derived from wood waste. It presents care for the environment as a central brand identity on the same level as business ethics, human rights, and social issues.⁵

Barriers to the Implementation of Environmental Practices in the Production Process

Government Regulations and their Fate in the Production Process

While some scholars researching corporate environmentalism stress the importance of “external factors” (Babiak and Trendafilova 2011; Griffin and Prakash 2014; Lozano 2015), others argue that external and internal factors are related (Prakash 2002). We found that in the daily work process external environmental regulations clash with the

⁵ Due to the need for anonymity we cannot cite GlobalTruck’s and GlobalOil’s environmental policies in detail, nor describe the companies more accurately. Scope 1, 2 and 3 emission data can be found in Moorhead and Nixon 2015 for the world’s major carbon emitters. See also the Carbon Disclosure Project www.cdp.net.

perceived necessities of the production process.

Collusion between Controllers and the Controlled

At GlobalOil we were told that when the production process and existing regulations conflict, there are mechanisms which guarantee the continuity of the production. The company may receive a “prohibition notice” and then be given time to conform to the notice. However, as one offshore oil worker explained, there are common interests between controllers and controlled:

We talk about DECC (Department of Energy and Climate Change, UK) and the HSE (Health and Safety Executive) as being independent. While they are independent, they work for the government. The government has an interest in you producing oil because they get revenue from it! So, if DECC went to every platform and said “shut down,” the *country* would shut down—there’d be no gas, there’d be no oil, petrol stations would dry up, the government are not getting all the tax. So, while we talk about conforming and doing the right thing, there has to be a little bit of give and take to give you time to get to that place. (Andy Harper⁶)

Harper’s account creates a chain of dependencies between GlobalOil’s production process, its regulators, the government, and the country. All seem to have the same interest in a smooth production process to achieve an assured product delivery. The “give and take” idea rests on the imaginary of a direct relationship between everyday practices in the company, state agencies, the government, through to society. It is an image that emerges from the everyday practices in which Harper is engaged, where the necessities of the immediate production process outdo all other considerations. The regulators’ control practices are based on the same idea:

I: And how strict are these regulations?

... for chemical usage offshore, we have to talk to HSE and to DECC again and say “We apply for a permit to use this many chemicals.” And if we go over that, we get in big trouble. So, they’re very strict ... Even to the point now where my engineers know that if they’re doing valve operations and things are going wrong, and they look like they’re close, even at eight o’clock at night there’s a line they can phone at DECC and say: [sighs] “We have this permit. We think we’re going to go over it,” and they will usually get back to us in an hour or two and say, “Yeah, okay, yes,” or “You guys used a lot. Maybe you should stop and rethink your operations.” To date they’ve never stopped us doing anything, but they do appreciate that we give them a call and let them know what’s going on. (Buck Jones, engineer)

Jones’ story shifts from confirming that regulations are strict to the almost comic conclusion that all regulators want is a phone call. We do not know how often problems

⁶ All names are pseudonyms.

occur that lead GlobalOil to overstep regulatory limitations. What we can conclude is that workers and monitoring bodies alike act according to what we call a “necessity discourse.” Decisions made in the production process and by controlling bodies are based on the view that an undisturbed production process is the priority. This explains partly why the UK government often shies away from implementing their own regulations. As Kollman and Prakash (2001, 420) state, they “seldom take violators to court and have facilitated a cordial relationship between themselves and the regulated.” From the point of view of the everyday production process, bending regulations is required. It is this requirement which workers use to legitimate their actions to themselves and others.

Deficient Regulations: Boundaries of Permissiveness, not Drivers for Change

Existing regulations are defined so as not to hamper the production process:

Like for the past week we’ve had a shutdown, our compressor isn’t working. So, every time we tried to restart the compressor, we’ve been flaring almost 300,000 [cubic meters] ... So, what you do as you go along is you’re building “banks.” In a week we’ve flared almost twenty days’ worth of flaring ... (Kia Alani, off-shore supervisor)

Natural gas is found mixed with crude oil and must be separated during extraction. While it may be captured and used, it is also “flared.” These are the flames from the high stacks one sees from iconic photographs of oil rigs. GlobalOil suggested that flaring excessively when there is a technical problem should be compensated for by flaring less during times in which the system is working properly. Oil companies have a “budget” for flaring, which has been decreasing through regulations over the years. The regulations, however, are set up in a way that includes non-compliance in the process at certain times:

Nine out of ten times DECC always give you a higher flaring consent. But they always tell you that it’s not an excuse for you to ... So they’ll give you something they feel you can work with ... because if not, then people can just flare to produce—which is one thing in GlobalOil we don’t believe in. (Alani)

While regulations are drivers for environmental change and can create environmental awareness, as several interviewees told us, there is a degree of latitude with which companies can interpret the rules according to what they perceive as their production needs. Regulations are approached as possible limits to be reached rather than as a motivation to raise standards, thus acting as *boundaries of permissiveness* rather than *drivers for change*. An example of this comes from GlobalOil’s environmental report, which legitimates the increase of flaring by an increase in production. However, our respondents working on the rig explained that there is no direct relationship between increase in production and flaring.

The same necessity discourse, the priority of production over environmental concerns, governed accounts at GlobalTruck. Regulations are meant to have priority over the production process but, as one manager explained, this is more a theoretical demand than a practical reality:

[T]here are, for instance, some materials that we should not use. They are on what we call the “black list.” But in order to achieve a certain product quality, we are more or less forced to use material that is on the black list ... You have to produce at a certain level in order to satisfy the demands of the customer ... So, there is also a “grey list,” and that is constantly updated. We have to find solutions that do not require us to use something that is not allowed. That would be fantastic. (Peder Jonson, manager)

Jonson gives the impression that using blacklisted materials is a rule rather than an exception, since the quality of the product depends on them. Major accidents make it into the news and the risks of chemicals used in production are known, but we know little about the daily risks to which workers are exposed through the routines of production processes in which the quality of the product is prioritised over people’s and the environment’s safety.

Our interviewees were convinced that environmental practices were important but also that risks needed to be taken to guarantee the quality and quantity of the product. They were also convinced that they were constantly reducing environmental and health risks by improving technologies. However, if regulations were stricter and tightly controlled, the concept of what is a high-quality product could change. The expectations of customers are not least the result of what producers offer. The declared link between customer needs and product quality can be conceptualised as a self-referential circle where either element refers to the other as its cause. Irrespective of our interviewees’ conviction that environmental practices were imperative, it was the imaginary of the necessities of production which dominated their practices.

Internal Company Structures

Imaginarities of the Production Process: De-prioritisation of Environmental Goals

What we call the de-prioritisation of environmental concerns was confirmed by several managers at GlobalOil. As Luc Mason (leading engineer) said,

I mean, let’s be real: we’re here to make money; we’re not here to make the world such a better place. Well, we try to—it’s nice if you’re warm and you can drive your car! But in the meantime, we try to keep ourselves alive as well with make some profit.

At GlobalTruck a manager criticised the suggestions of the environmental manager

arguing that “we are employed to produce cabins of the right quality, at the right costs, at the right time” (Sven Larsson). It is noteworthy that in outward-facing communications these companies will extol their environmental credentials, but in everyday talk environmental standards are de-prioritised. A GlobalOil manager clarified how removed environmental concerns are from the company’s daily processes in a hypothetical example:

The reality is ... if you go in with your primary business case structured around “We would like to move all these people from one side of a CBD [Central Business District] to another” (and to piss a lot of people off in the process!) “and to take out allocated workstations, *and* to remove people’s offices, *and* to do all this, and, “Why are you doing that?” “Oh well, it’s to reduce the carbon footprint”—you don’t get anywhere. (Philip Woods)

We can read this story as an ironic performative act indicating the low priority given to environmental concerns among company members. As Woods further explains, this does not mean that such changes do not take place but that they need to be seen as aiming at efficiency and cost effectiveness. A similar argumentation is used by a GlobalTruck manager when asked whether GlobalTruck would sacrifice short-term profits for environmental goals:

Yes, I am so naïve that I really believe that. Because if you look at it long-term, strategically, you have a competitive advantage. The environmental demand will increase. It will come with environmental destruction ... then you have to ... in order to survive, it is about the environment, about ethics, about morality. Are we a company from which people want to buy products? Then we have to be the world’s best. We have to have the cleanest, best, most fuel-efficient trucks, highest quality, with highest security. (Sven Larsson)

Environmental destruction, morality and ethics are channelled into an argument for competitive advantage: short term profits might be sacrificed, but only to ensure long-term competitiveness. This discursive shift is not surprising but it should guard researchers against analysing environmental imaginaries and intentions of managers without setting them into the context of profit-oriented production (Levy and Spicer 2013; Griffin and Prakash 2014; Seo and Creed 2002; Lülfs and Hahn 2014; Sarasini and Jacob 2014). Environmental practices introduced to ensure competitiveness create contradictions. Fuel-efficient products lead to a “rebound effect” (Hertwich 2005) such as increased use of cars due to the perception of fuel as “green” (Tenenbaum 2008).

Vertical Relations: Hierarchism

Tsoukas and Chia (2002, 567) state that two of the most common but contrasting

understandings of change are: a) change as an exceptional phenomenon; and b) change as an ongoing interactive process. Our question as to whether an initiated change is a top-down process or an ongoing interactive process begins with the relationships between headquarters and local management. When we asked managers and workers at GlobalTruck what they thought about the strategy to make plants carbon neutral, a decision publicised by the company, a factory manager answered:

Those of us sitting in the unit have asked ourselves this question for many years. What is that? Do you include the [production] process? Or shall we include transport as well? And what about the fact that we burn the solvents, since we need to minimise our emission of solvents? Well, what do we use to burn them? Yes, it is diesel, and if we burn the solvents, then the product is CO₂ ... (Peder Jonson)

Half of the workers we surveyed (126 of 250) answered they had received none or very little information about the “carbon neutral” policy of GlobalTruck. A blue-collar worker questioned the possibility of making the plant carbon neutral:

We still have trucks out there that run on diesel. They are not CO₂-free, at least I don't think they are [laughs]. And if we are supposed to be CO₂-neutral, then we also have to demand that from our suppliers. We can't live just by the train tracks. There are trucks, which come with 99% of the 6000 pieces we assemble. They [the pieces] might come on some old, huge trucks with no filter.⁷ (Per Svenson)

The same point is made by a manager, although he does not use it to question the possibility of a carbon-neutral factory:

Working with the environment is somehow a part of the everyday. But if there is some material that we assemble in the cabins that is brought by trucks that blow black smoke across the whole of Europe, that is something I don't control. There are other organisations that are working with that. (Joakim Danielson)

Workers and (to a certain degree) local managers know how emissions are created and have a comprehensive view of production. It appears that headquarters does not use this knowledge when defining the environmental goals for its plants. Thus, investigating environmental programmes of companies does not tell us much about how the production process and its value chain is affected by those programmes.

Horizontal Relations: Compartmentalisation

Environmental measures are less effective if they are the responsibility of a single

⁷ Our interviewee is talking about a diesel particulate filter, designed to remove the diesel particulate matter or soot from the exhaust gas of a diesel engine.

department. At GlobalTruck several managers described how their responsibility is circumscribed by the definition of their tasks:

We have an environmental system, then we have a quality system, and then we have a system for ... environment. And it's said that all this is integrated into a production system. But I think we have too segregated a system for it to be integrated. (Peder Jonson)

GlobalOil has tried to address this but it's seen as an uphill climb despite bringing into play management tools to overcome barriers. Ultimately, we were told, it will only be achieved

through the sheer hard graft of engaging with people ... through setting a clear case for change—not being defensive of it, but being confident around why you are doing something. In a number of locations ... we have staff councils where you go through the motions of consultation but you tell them [the councils] what you're doing. In Germany or the Netherlands, for example, it is a genuine process of consultation. Unless you can get support for it, it doesn't happen! (John Mayor, manager)

There is an awareness of the limitations for environmental practices among some segments of middle management, but what seems to be missing is a structure that can translate awareness into action and an overall programme that secures similar practices across different countries and includes workers into the process.

Specialisation

As manager Joe Sanberg said,

We talk about the optimisation of the metal sheets, but we do not talk about the environment in the everyday, thinking about every action, every step we take, how that impacts the environment. Quality is much more emphasised. Everybody talks about that on a daily basis ... We have 30–40 men responsible for quality and one girl for the environment. What kind of message does that send?

To criticise the low priority the environment has in the company, Sandberg emphasises not only the disproportion in numbers but also, ironically, links the lack of respect for the environment with a lack of respect for the person in charge, who is called “a girl.” This is reflected in the account of the environmental manager herself, who thinks she is seen as a “difficult person” and is not taken seriously because she is “too young.” When headquarters demand that the plant saves 25% of energy costs, she has to develop a plan, get it approved by the local management and then apply to headquarters for funding to realise it:

Sometimes I feel that before I even ask a question or say we should be doing this or that, they are going to think that, well, that I am quite naïve, or this is not possible ... the cost is too high. But then I think it is my job to put these issues forward. It is my job to ask those questions. The stressful thing is that you feel you do not have any time or resources. Nobody is able to work with these issues. If it is a problem in production, it's "Sorry, but we can't cope. We have to have the right quality, we have to produce cabins, we cannot work with those issues."
(Dora Bernard)

These accounts suggest an overdetermination of structural, social relationships and production imaginaries impeding environmental change—assigning environmental responsibility to a few individuals (there are six people overall with environmental responsibilities in a plant of over 1000 employees) individualises the issue. The individual becomes socially marginalised and seen as threatening the production imaginary. Environmental practices become the marginalised concern of marginalised individuals.

Vertical Relations: Social Unsustainability

At GlobalTruck the deterioration of working conditions, e.g., the dissolution of production teams through the re-implementation of the assembly line, had destroyed workers' trust in management. As a blue-collar worker reported,

We used to have good managers. They did a great job, treated people as people. Today, they see people as commodities, as robots, use them up and then throw them away. If you cannot cope, leave. (Lea Nilsson)

These developments had the knock-on effect of reducing workers' interest in environmental practices. Social unsustainability generates environmental unsustainability. When workers felt their alienation by losing what little control they had over their work process, and were not respected and threatened with job losses, they lost interest in the work process and thus in considering ways to improve it. At GlobalTruck trade unionists had discussed environmental concerns with management: they asked for transport so workers would not need to use their cars to get to work, made suggestions such as recycling the heat from the paint and the welding shop. Their ideas were rejected.

Unionists told us that it was mainly environmentally concerned members who initiated discussions about the environmental consequences of the production process:

We talked about [the fact that] that it's absurd to produce so much—the transportation system with "just in time" is built on lorries and trucks driving all the material, and the logistics are absurd if you have this system. (Hans Anderson)

This is a good example of how workers' interests can connect with environmental concerns. The "Just in Time" system not only places a heavy load on the environment; it is equally detrimental to workers' health and job satisfaction (Huws 2006). However, the local union thinks it cannot attempt to change the production system in such a fundamental way, since "Just in Time" is now the system used by almost all corporations, transnational or not.

But we haven't discussed too much what of we can do. It's not so easy for a plant to change this across the global structure. You have to discuss it and make decisions at a much higher level ... We also discussed whether it's possible for us to talk about changing the automotive industry to something else ... And we also talked about the environment and the demands we have on the automotive industry. It's so big and dominating the industry in the Western and in the entire world today. So, it's really important, as a trade union, to try and change it. But it needs to be done by the national and international trade union, not only the locals. (Hans Anderson)

While Anderson's arguments are convincing, we found the opposite view while interviewing trade union officials at national and international levels. They argued they could not engage more strongly in environmental policies because their members on the shop floor level would not approve (Räthzel and Uzzell 2013). There is, then, not only a problem of communication and cooperation within companies but also within the trade union movement. The dilemma of choosing between protecting jobs and protecting the environment runs through all trade union efforts to develop environmental policies. The critical question is "Under what conditions can this dilemma be resolved?" Henriksson (2013) and Rossman (2013) argue that combining a strategy of protecting jobs and improving working conditions by giving workers more autonomy with a strategy of converting production to processes that are environmentally sound could be a way out of this dilemma.

However, such perspectives of long-term change are difficult to pursue under conditions where immediate needs to defend jobs and fend off precarisation determine union agendas. Neither unions nor management have yet been able to overcome the dualism of nature and work and to see them as inextricably linked to each other.

Conclusions

Research on corporate environmentalism has predominantly investigated companies' intentions and programmes for environmental change, and not how they fare in the everyday of the production process. Broadening Prakash's (2002) definition of companies as differentiated composite actors, and following Lefebvre's concept of everyday life as the "genuine reality" where change takes place, we have included workers and managers as actors, as well as the production process, into the analysis. With this perspective, we aimed to understand how production practices are

embedded in their external and internal vertical and horizontal social relations, as well as guided through imaginaries of the necessities of the process.

Our findings suggest that neither ethical considerations (van den Hove et al. 2002) nor issues of costs, competitiveness, incentives or external regulations (Ihlen 2009; Prakash 2000; Nilsson et al. 2004; Babiak and Trendafilova 2011) can successfully compete with the power of the “necessity discourse” that governs everyday practices in the sphere of the production process. While all our interlocutors agreed that environmental transformations were imperative, it was the imaginary of the perceived necessities of the daily production process that impeded most attempts to realise environmental practices, even when they were demanded by headquarters. Seo and Creed (2002) argue that change is a result of organisational contradictions. While contradictions occurred in both companies, they did not lead to environmentally significant changes because environmental concerns could not compete with production necessities. What researchers investigating the effects of individual values and norms on behaviour change (e.g. Lülfs and Hahn 2014) have overlooked is that such values do not play a role in the everyday of production processes. Neither environmentally concerned workers nor managers have the power or resources to challenge the necessity discourse guiding their actions.

Some authors see habits and routines (Pentland et al. 2012; Neal et al. 2012; Duhigg 2012) as barriers to change, defining them as almost unconscious actions. Lefebvre’s concept of the everyday has allowed us to see “feelings, ideas, satisfaction and privation” and their interactions (Lefebvre 2002, 45) as the source of habits and routines. They are not predominantly unconscious activities but practices with meaning and purpose. The practices of managers, workers and unions are locked into traditional structures and meanings which use nature as an externality, prioritising cost efficiency and a notion of product quality that disregards environmental impacts. For real changes to happen, it is not sufficient to simply break routines, but rather to re-define the purpose of production processes. We have used Lefebvre’s concept of the everyday because it includes change and creativity, not just stasis. Ironically, what we found was predominantly stasis—no changes that would have improved the environmental sustainability of the production process. However, just like change, stasis is the result of conscious decisions, imaginaries, practices, and organisational structures, and not a simple effect of structures and habits. Lefebvre’s concept helped us to see this.

Through the accounts of workers and managers we have caught a glimpse of the knowledge that is produced in the everyday. The workers’ suggestions showed how knowledge develops through everyday “routines”. Taken seriously, this knowledge could become the basis for the creation of alternatives. (Lefebvre 2002, 44). The everyday is simultaneously the source of change and the sphere of stasis, of business as usual.

To internalise the hitherto externalised environmental costs would require integrating environmental sustainability as a priority goal into the everyday of production, thus transforming the “imaginaries” of what smooth production and a high-quality product mean. On the basis of changed production priorities, the

hierarchism which prevents workers' knowledge from informing management decisions, and *social unsustainability*, which leads to workers and unions being unwilling and unable to contribute to the transformation and /or conversion of production processes, would have to be replaced by a system of workers participation. This is not an issue of better communication or incentives (Young et al. 2015; Lülfs and Hahn 2014), but a principle of democratising the everyday of production. Structures and cultures need to be introduced in which managers and engineers can also learn from workers, the specialists of the daily production process. While workers and their unions are dependent on jobs (which is why they often side with managers in protecting environmentally damaging production), they are also vulnerable to environmental destruction. If they used their knowledge as a source of power, they could become the social force pressuring governments and companies to realise environmental transformations.

Based on new production imaginaries, barriers like *specialisation* and *compartmentalisation*, the lack of a comprehensive production system allowing environmental issues to be translated into tasks for each sector of the production process, could be addressed. Governments would need to transform the subordinate position of the environment in industry, applying a *stronger regulatory system* to address the *collusion between controllers and the controlled*. But even if the present regulations were enforced rigorously, they might be more likely to become *drivers for change, as opposed to boundaries of permissiveness*.

Limitations of the Study and Further Research

We have chosen two case studies where barriers to environmental transformation are particularly strong. Research into everyday production processes in other sectors could produce new insights not only into barriers to but also into drivers for environmental practices.

We have made only partial use of Lefebvre's (2002, 45) concept of everyday life, using his insights into the totality of ideas, feelings, knowledge and social relations developing in the everyday. We have hinted at elements of alienation (1992, 59ff), describing how the deterioration of working conditions hampers workers' motivation for environmental practices. Future research could go further in investigating how the contradictions between "fulfilment" and "alienation" (2002, 42) in the everyday create barriers to, or drivers for, environmental change among all actors in a company, and specifically among workers, without whom no production process can be realised.

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References

- Babiak, Kathy, and Sylvia Trendafilova. 2011. "CSR and Environmental Responsibility: Motives and Pressures to Adopt Green Management Practices." *Corporate Social Responsibility and Environmental Management* 18 (1): 11–24.
- Brulle, Robert J. 2014. "Institutionalizing Delay: Foundation Funding and the Creation of U.S. Climate Change Counter-Movement Organizations." *Climatic Change* 122 (4): 681–694.
- Chai, Kah-Hin, and Catrina Yeo. 2012. "Overcoming Energy Efficiency Barriers through Systems Approach—A Conceptual Framework." *Energy Policy* 46: 460–472.
- Cooley, Mike. 1987. *Architect or Bee? The Human Price of Technology*. London: Hogarth.
- Daiute, Colette, and Cynthia Lightfoot, eds. 2004. *Narrative Analysis: Studying the Development of Individuals in Society*. Thousand Oaks, CA: Sage.
- Denzin, Norman K., and Yvonna S. Lincoln, eds. 2013. *The Landscape of Qualitative Research: Theories and Issues*. 2nd ed. Thousand Oaks, CA: Sage.
- Duhigg, Charles. 2012. *The Power of Habit: Why We Do What We Do in Life and Business*. New York: Random House.
- CNN Money. 2013. "Fortune Global 500." http://money.cnn.com/magazines/fortune/global500/2013/full_list/index.html?ii d=G500_lp_toprr.
- Galvez-Martos, Jose-Luis, David Styles, and Harald Schoenberger. 2013. "Identified Best Environmental Management Practices to Improve the Energy Performance of the Retail Trade Sector in Europe." *Energy Policy* 63 (December): 982–994.
- Garavan, Thomas N., Noreen Heraty, Andrew Rock, and Eugene Dalton. 2010. "Conceptualizing the Behavioral Barriers to CSR and CS in Organizations: A Typology of HRD Interventions." *Advances in Developing Human Resources* 12 (5): 587–613.
- Griffin, J. J., and A. Prakash. 2014. "Corporate Responsibility: Initiatives and Mechanisms." *Business & Society* 53 (4): 465–482.
- Henriksson, Lars. 2013. "Cars, Crisis, Climate Change and Class Struggle." In *Trade Unions in the Green Economy. Working for the Environment*, edited by Nora Räthzel and David Uzzell, 78–86. Oxford: Routledge.
- Henriksson, Lars. *Slutkört [Finished⁸]*. 2011. Stockholm: Ordfront.
- Henseling, K.O. 2008. "Die Große Transformation. Strategischer Umbau Der Stoff- und

⁸ The double meaning is lost in translation: „slut“ means the end and „kör“ means to drive. So, literally: The end of driving.

- Energiewirtschaft" [The Big Transformation. Strategic Reconstruction of the Primary Resource and Energy Industry]. *Das Argument* 279 (6): 827–838.
- Hertwich, Edgar G. 2005. "Consumption and the Rebound Effect: An Industrial Ecology Perspective." *Journal of Industrial Ecology* 9 (1-2): 85–98.
- Hoffman, A. J., and R. Henn. 2008. "Overcoming the Social and Psychological Barriers to Green Building." *Organization & Environment* 21 (4): 390–419.
- Holstein, James A., and Jaber F. Gubrium, eds. 2003. *Inside Interviewing: New Lenses, New Concerns*. Thousand Oaks, CA: Sage Publications.
- Hove, Sybille van den, Marc Le Menestrel, and Henri-Claude de Bettignies. 2002. "The Oil Industry and Climate Change: Strategies and Ethical Dilemmas." *Climate Policy* 2 (1): 3–18.
- Huws, Ursula. 2006. "The Restructuring of Global Value Chains and the Creation of a Cybertariat." In *Global Corporate Power*, edited by Christopher T. May, 65–82. International Political Economy Yearbook. Boulder, CO: Lynne Rienner.
- Ihlen, Øyvind. 2009. "Business and Climate Change: The Climate Response of the World's 30 Largest Corporations." *Environmental Communication* 3 (2): 244–262.
- International Monetary Fund. 2013. *World Economic Outlook Database: Report for Selected Countries and Subjects*.
<http://www.imf.org/external/pubs/ft/weo/2012/02/weodata/index.aspx>.
- Kollman, Kelly, and Aseem Prakash. 2001. "Green by Choice? Cross-National Variations in Firms' Responses to EMS-Based Environmental Regimes." *World Politics* 53 (3): 399–430. doi:10.1353/wp.2001.0010.
- Lefebvre, Henri. 1992. *Critique of Everyday Life*. Vol. 1. Translated by John Moore. London: Verso.
- Lefebvre, Henri. 2002. *Critique of Everyday Life*. Vol. 2. Translated by John Moore. London: Verso.
- Lefebvre, Henri. 1984. *Everyday Life in the Modern World*. Translated by Sacha Rabinovitch. New Brunswick: Transaction Books.
- Levy, David L, and André Spicer. 2013. "Contested Imaginaries and the Cultural Political Economy of Climate Change." *Organization* 20 (5): 659–678.
- Lozano, Rodrigo. 2015. "A Holistic Perspective on Corporate Sustainability Drivers." *Corporate Social Responsibility and Environmental Management* 22 (1): 32–44.
- Lülf, Regina, Rüdiger Hahn. 2014. "Sustainable Behavior in the Business Sphere: A Comprehensive Overview of the Explanatory Power of Psychological Models." *Organization & Environment* 27 (1): 43–64.
- Martensson, Lars. 2015. "Environmental Pioneers." *Volvo Trucks Global*.
<http://www.volvotrucks.com/en-en/our-values/environment.html>.

- Moorhead, John, and Tim Nixon. 2015. "Global 500 Greenhouse Gas Report: The Fossil Fuel Energy Sector." *Thomson Reuters*, May.
<https://www.thomsonreuters.com/content/dam/openweb/documents/pdf/corporate/Reports/global-500-greenhouse-gas-report-fossil-fuel-energy-sector.pdf>.
- Neal, David T., Wendy Wood, Jennifer S. Labrecque, and Phillippa Lally. 2012. "How Do Habits Guide Behavior? Perceived and Actual Triggers of Habits in Daily Life." *Journal of Experimental Social Psychology* 48 (2): 492–498.
- Nilsson, Andreas, Chris von Borgstede, and Anders Biel. 2004. "Willingness to Accept Climate Change Strategies: The Effect of Values and Norms." *Journal of Environmental Psychology* 24 (3): 267–277.
- Pentland, Brian T., Martha S. Feldman, Markus C. Becker, and Peng Liu. 2012. "Dynamics of Organizational Routines: A Generative Model. Dynamics of Organizational Routines." *Journal of Management Studies* 49 (8): 1484–1508.
- Porter, Michael E., and M. Kramer. 2006. "Strategy and Society: The Link between Competitive Advantage and Corporate Social Responsibility." *Harvard Business Review* 84 (12): 78–92.
- Prakash, Aseem. 2000. *Greening the Firm: The Politics of Corporate Environmentalism*. New York: Cambridge University Press.
- Prakash, Aseem. 2007. "Corporate Environmentalism: Problems and Prospects." *Global Environmental Politics* 7 (3): 130–135.
doi:10.1162/glep.2007.7.3.130.
- Räthzel, Nora, and David Uzzell, eds. 2013. *Trade Unions in the Green Economy. Working for the Environment*. Milton Park, NY: Earthscan/Routledge.
- Rohdin, Patrik, Patrik Thollander, and Petter Solding. 2007. "Barriers to and Drivers for Energy Efficiency in the Swedish Foundry Industry." *Energy Policy* 35 (1): 672–677.
- Rossmann, Peter. 2013. "Food Workers' Rights as a Path to a Low Carbon Agriculture." In *Trade Unions in the Green Economy. Working for the Environment*, edited by Nora Räthzel and David Uzzell, 58–63. Milton Park, NY: Earthscan/ Routledge.
- Sarasini, Steven, and Merle Jacob. 2014. "Past, Present, or Future? Managers' Temporal Orientations and Corporate Climate Action in the Swedish Electricity Sector." *Organization & Environment* 27 (3): 242–262.
- Saukko, Paula. 2003. *Doing Research in Cultural Studies: An Introduction to Classical and New Methodological Approaches. Introducing Qualitative Methods*. Thousand Oaks, CA: Sage.
- Seale, Clive, ed. 2004. *Qualitative Research Practice*. Thousand Oaks, CA: Sage.
- Seo, Myeong-Gu, and W.E. Douglas Creed. 2002. "Institutional Contradictions, Praxis, and Institutional Change: A Dialectical Perspective." *Academy of Management Review* 27 (2): 222–247.
- Tenenbaum, D.J. 2008. "Food vs. Fuel: Diversion of Crops Could Cause More Hunger."

Environmental Health Perspectives 116 (6): 254–257.

Thomas, William L., and Florian Znaniecki. 1927. *The Polish Peasant in Europe and America*. Vol. 1–5. New York: Alfred A. Knopf.

Tsoukas, Haridimos, and Robert Chia. 2002. “On Organizational Becoming: Rethinking Organizational Change.” *Organization Science* 13 (5): 567–582.

Von Borgstede, Chris, and Lennart J. Lundqvist. 2006. “Organizational Culture, Professional Role Conceptions and Local Swedish Decision-Makers’ Views on Climate Policy Instruments.” *Journal of Environmental Policy & Planning* 8 (4): 279–292.

Weber, Lukas. 1997. “Some Reflections on Barriers to the Efficient Use of Energy.” *Energy Policy* 25 (10): 833–835.

Young, William, Matthew Davis, Ilona M. McNeill, Bindu Malhotra, Sally Russell, Kerrie Unsworth, and Chris W. Clegg. 2015. “Changing Behaviour: Successful Environmental Programmes in the Workplace” *Business Strategy and the Environment* 24 (8): 689–703.