



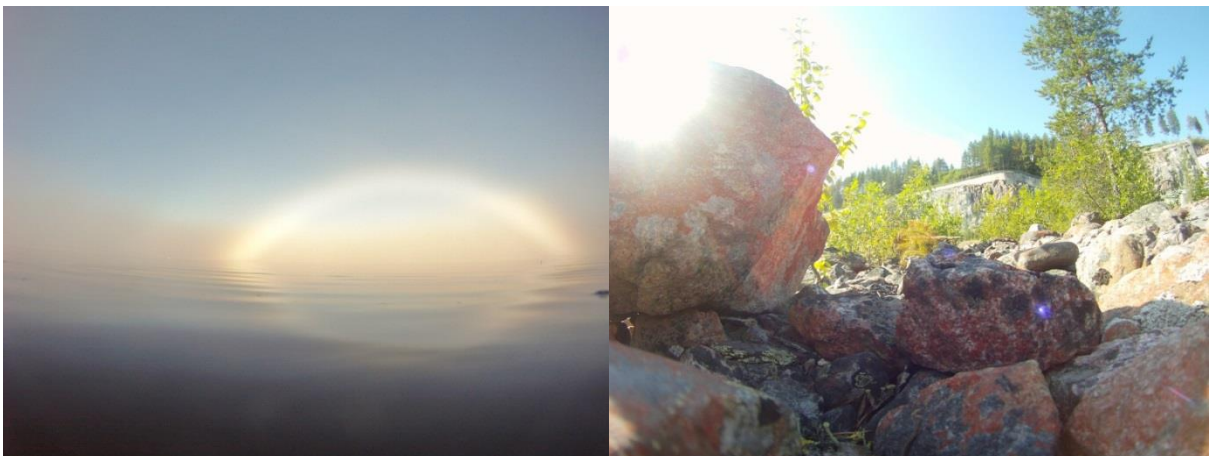
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**UNDERGRADUATE DISSERTATION
2033925**

**Experiencing River Landscapes; the Affective Capacity of Landscapes and its
Potential in Environmental Management**

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School of Geographical and Earth Sciences

University of Glasgow

School of Geographical and Earth Sciences

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Name: Henni Mirjami Lantto

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Abstract

The Earth is facing an ever growing amount of environmental challenges due to anthropogenic processes. It has been argued that the tendency to assume nature and culture as separate realms may be partly responsible. Rivers are a major demonstrator of this nature/culture divide – yet they are also one of its great challengers. Rivers have been degraded by human endeavors throughout history, yet they have the capacity to profoundly affect our lives. In this study I aim to imagine better ways of being with our environments with reference to two river landscapes in Finnish and Swedish Lapland. I will investigate how landscapes have a capacity to affect us and how that capacity could be made use of in dissolving the nature/culture binary and subsequently managing our environments better. With reference to a ‘wild’ and a ‘tamed’ river I will also assess how we seem to be more affected by landscapes that we frame ‘wild’ than those that are heavily managed. The concept of agency seems to be a key idea in deconstructing the nature/culture divide and explaining the affective capacity of landscapes.

Contents

Chapter 1: Introduction: Engaging With River Landscapes	7
Chapter 2: The Great Divide of Nature and Culture and the Tools for Ontological Healing	12
2.1: Challenging the nature/culture binary in river landscapes.....	12
2.2: Nature as culture or culture as nature?.....	13
2.3: The affective capacity of landscapes	14
2.4: Post-human agency as an avenue for new dialogues	15
2.5: Moving forward.....	16
Chapter 3: Methodology: Approaching Riverscapes	18
3.1: Approaching the subjective experience of landscapes	18
3.2: Generating context through document analysis.....	21
3.3: Intimate methods: partial ethnography and performative research.....	23
3.4: Interviews as a complementary method	25
3.5: Towards more-than-human research.....	26
Chapter 4: The living river and the lost river.....	27
4.1: Tornionjoki – a landscape of sensuous encounters	27
4.2: The living river: the affective realm of Tornionjoki	29
4.3: The lost river: the affective realm of Kemijoki.....	31
4.4: Kemijoki - the awakened river.....	35
4.5: Moving away from the great divide	36
Chapter 5: Experiencing and (de)constructing wilderness.....	37
5.1: Being with a ‘wild’ river	37
5.2: Being with a ‘tamed’ river	40
5.3: Wilderness contested	43
Chapter 6: Non-human agencies - new geographies.....	45
Chapter 7: For landscapes after nature/culture	50
Bibliography.....	53

Chapter 1: Introduction: Engaging With River Landscapes

You come here with confused thoughts of most human kind. Would you not dive in and forget anything you wanted to ask from us? Then maybe you will realize that we speak in your mind and body as we always have.¹

Two rivers flow through arctic land nurturing people dwelling on their shores. Thoughts, feelings and actions arise from the interaction of landscape and self. Yet as much as rivers have the capacity to profoundly affect us, humans have throughout history aimed to control and utilize them (Coates, 2013). As rivers and the lives of people are continuously made and remade through negotiations of human-nature relationship one wonders: what is the place of humans in the planet that is facing an ever growing amount of environmental challenges due to the growing requirements of our species? Our current ways of being with our environments is at times far from

Box 1.1: Research aims

- To assess how landscapes have a capacity to affect us and how that capacity can be made use of in a better management of our environments.
 - To consider how post-humanism and the affective realm could find a place in geomorphology and bring ‘wonder’ back to geography.
- To consider how humans tend to be more affected by ‘wilderness’ than modified landscapes.
 - Address how we frame the environments of ‘the Anthropocene’ that cannot be said to be purely ‘natural’ nor exclusively a result of human action either.

¹ Chapter 6 will expand on post-humanist creative writing

harmonious and rivers demonstrate this relationship most vividly. It now seems increasingly important to reflect our anthropocentric assumptions and ideas about nature as they may have negative consequences on how we act upon our environment (Jones, 2009b). In this study I wish to contribute to the academic debate aiming to envision better ways of being with nature through allowing agency to the post-human and considering the affective capacity of landscapes (research aims in box 1.1) (Dillon et al, 2012; Dixon et al, 2012a; Dixon et al, 2012b; Jones, 2009a; Jones, 2009b; Whatmore, 2008).

One might argue that focusing on ways of sense-making in discussing environmental management is a waste of time and we should rather be thinking about concrete strategies for environmental conservation. Yet, discourses form the fundamental base for how humans make sense of the world and thus act upon it (Jones, 2009b). Sustainable management of the environment might have more success if our cultural discourses emphasised that we are a fundamental part of nature and our social worlds do not exist separately from it. For this reason I wish to consider the affective capacity of landscapes and the non-human through the notion of agency, which may help deconstruct the modern way of seeing nature and culture as wholly separate realms. I shall also assess how post-humanist methods could communicate this type of environmental knowledge effectively (Dillon et al., 2012; Dixon et al., 2012a; Dixon et al., 2012b).

To address my research questions, I studied two rivers in Finnish and Swedish Lapland, Kemijoki and Tornionjoki (box 1.2 and box 1.3). These rivers act as a tangible way of discussing the concepts of affect and more-than-human agency. Whether people indeed seem to be more affected by what is framed 'wild' than what is modified and 'tamed' (Cronon, 1993) will be discussed with reference to Kemijoki, the 'tamed' river, and Tornionjoki, the 'wild' river. I decided to compare and contrast how these rivers are framed and engaged with as they are located in a coherent cultural and geographical area, thus allowing comparisons to be made without significant cultural or geographical differences affecting the analysis. To engage with the affective realms of the rivers I explored the popular discourses about them through analysing document sources and interviews. Yet I also wanted to approach the rivers 'as they are' without pre-

determined assumptions and thus undertook ethnographic and performative research in the landscapes as well.

Box 1.2: Overview of the research sites

The research was carried out by two rivers in Finnish and Swedish Lapland seen on the map (figure 1.1). Kemijoki (joki = river) is harnessed with 21 hydropower plants and framed as the ‘tamed’ river. Tornionjoki is the longest free flowing river in Europe and framed as the ‘wild’ river. Both rivers flow through remote areas with only some small towns and villages on their shores. The surrounding land is mostly forest and due to the extreme seasonal changes, the rivers spend around half of the year under a cover of ice. The research was carried out over a three month period in the summer, which unfortunately leaves out the aspect of seasonality out of the analysis. My home is located on the bank of Tornionjoki, which provides me a depth of knowledge about inhabiting a river landscape.

Ecologically, the rivers offer a range of habitats from cool depths of the bottom sediments to light surface waters. The initially poor nutrient content increases downstream, increasing the productivity of the rivers (Hallanaro and Pylvänäinen, 2002). Environmental damage has been suffered by both rivers to some degree. The obvious harm done to the fish populations and sediment system in Kemijoki by damming the

river is indeed dramatic, but also Tornionjoki has faced environmental challenges, for instance the decline of the salmon, trout and whitefish population due to overfishing in the sea (Puro-Tahvanainen et al., 2001). Just this year (summer 2015) thousands of salmon have died of UND, an epidemic that is thought to be worsened by toxins in the environment and the effects of climate change (Mainio, 2015). Both rivers are extremely sensitive to environmental change and although the quality of the water is generally excellent or good, forestry and agriculture have increased the load of unwanted nutrients in the rivers (Puro-Tahvanainen et al., 2001).



Figure 1.1: Tornionjoki to the west, Kemijoki to the east. (Google maps, 2015. Available from: [www.google.com /maps/](http://www.google.com/maps/). Accessed on 12/08/15.)

In Chapter 2 I will place my research aims in the wider concept of literature on new ways of framing human-nature relationship. I will criticize our tendency to understand nature and culture as separate realms and discuss potential ways of dissolving the binary with emphasis on the concepts of affect and more-than-human agency.

In Chapter 3 I will go through my methodology and methods for assessing the research objectives. The best way to address such abstract questions was decided to be via document analysis, ethnographic/performative research and interviews as a complementary method. I also performed a photography project as a means to experiment with a potential post-humanist method.

In Chapter 4 I will discuss the general discourses and meanings about the rivers circulating between people with reference to my document analysis and interview data. In this way a general framework is introduced for the benefit of the reader and the major themes that surround these two rivers begin to take shape.

In Chapter 5 I aim to break away from the discursive realm of the rivers through discussing my ethnographic/performative experiences in the landscapes. The aim of the transition from discourse to practice is to leave pre-determined codes and academic arguments to lesser consideration and experience landscapes 'as they are'.

In Chapter 6, I will discuss the main ideas that arose from the research in a form of a photo-essay. This experimental chapter will also tie my findings back to relevant literature.

Finally, in Chapter 7, I will summarize my findings and offer some final conclusions on post-humanist research.

Box 1.3: A glimpse into the history of the two rivers

At the beginning of the 20th century, Tornionjoki and Kemijoki can be characterized as being very similar - ecologically, morphologically and culturally. The rivers provide fish for the rural population living around them and fertile lands for agricultural use (Linkola, 1967; Puro-Tahvanainen et al., 2001). In the absence of proper roads, the rivers also function as an important highway for both humans and wood (Hallanaro and Pylvänäinen, 2002; Linkola, 1967). Finland loses a third of its hydropower in the Second World War, but the country desperately needs energy for the rebuilding work. The gaze is aimed to the North with unharnessed rivers and unemployed workforce. Both Tornionjoki and Kemijoki come under scrutiny. It is Kemijoki, the longest river in the country, where action begins to take place (Seppälä, 1976). Harnessing Tornionjoki proves to be a legal difficulty due to its border position.

In summer 1948 the mouth of Kemijoki is shut. The first step in harnessing the rapids of Kemijoki 'for the greater good' is taken, but the journey of the salmon has reached its end. Villages and fertile lands are drowned behind dams (Risku, 1975; Seppälä, 1976). Meanwhile, Tornionjoki keeps flowing free without any dramatic changes to its morphological or hydrological features. The many roaring rapids stay unharnessed, fishing continuing to be a major source of livelihood (Vilkuna, 1966).

Today Kemijoki has 21 hydropower plants in it. As the construction works reach their end, the villages go silent. The change for the Kemijoki region after the Second World War is dramatic due to the rapid modernization enhanced by the harnessing of the river (Seppälä, 1976, Autti, 2013b). Meanwhile in Tornionjoki, the hurried modernization of Finland has a reverse effect. While it sees Kemijoki becoming economically important, Tornionjoki is no longer 'utilized' as a highway for wood or source of food, but becomes a place for recreation. Log-floating is replaced by white water kayaking and river rafting, fishing becomes recreational rather than a necessity.

Chapter 2: The Great Divide of Nature and Culture and the Tools for Ontological Healing

In this study I wanted to assess how landscapes have a capacity to affect us and how that capacity can be considered in a better management of our environments. I also wished to assess how humans seem to be more affected by 'wilderness' than modified landscapes. The place of humans in nature and the capacity of the environment to affect is an issue that has fascinated academics in human geography as well as other disciplines. Scholars have challenged and re-shaped assumptions on 'naturalness' and introduced ideas on the agency and affective capacity of non-humans. In this chapter I will discuss such ideas, first criticizing the Cartesian way of seeing nature and culture as separate, then proceeding into some possible ways of dissolving this dualism emphasising ideas on affect and agency. I will also reflect how post-humanism might find a place in geomorphology as a method of highlighting the non-human agencies and affective capacity of landscapes. These debates form the basis for my research objectives and methodology.

2.1: Challenging the nature/culture binary in river landscapes

There are certain strong beliefs and discourses through which our society makes sense of the world. Sometimes they are so embedded in our culture that they seem to be the only unquestioned truth. The Western ways of knowing seem to be built on a set of binaries, Cartesian dualisms that sets apart body and mind, subject and object and so on (Jones 2009b; Wylie, 2007). This could be argued to be a particularly masculine way of making sense of the world and has indeed been strongly criticised by feminist geographers, Rose (1993) among others. Remarkably strong is the binary of nature and culture, a widely accepted worldview that sets nature and culture at a distance from each other². Our Western knowledge tends to assume nature as something separate from us, something 'out there' - an inert, thoughtless matter that can be studied, controlled and manipulated objectively. Culture, then, is somehow superimposed on it as the active and thinking agent (Jones, 2009b; Whatmore, 2002; Wylie, 2007). As Cronon

² This division of nature and culture has often been at the heart of landscapes studies in cultural geography; landscape is traditionally seen as the meeting point of culture and nature where nature acts as the base for objective facts and culture as the layer of subjective meaning (Wylie, 2007).

(1993: 459) puts it, people seem to carry out 'the peculiarly human task of living in nature while thinking themselves outside it'.

The division of nature and culture may have severe moral and material implications. If humans and our cultures are not natural, when did we cross over from nature to culture (Wylie, 2007)? The tendency to see culture as something that has departed nature leads to the exclusion of the non-human from for instance ethical considerations. Ethics is often understood as a purely human concern, and the thoughtless nature is not seen as something worthy or in need of ethical consideration (Jones, 2009a; Jones and Cloke, 2008). Powerful discourses such as the nature/culture divide not only impact how we understand and make sense of the world, but also how we act upon it. Indeed, Jones (2009b) notes the possibility that it is precisely because we perceive nature as a separate, inert realm that we have been capable of causing the range of environmental problems we face today.

Throughout history, rivers have been a major demonstrator of this divide of nature and culture; they have been used to fulfil human needs often without much thought on the consequences. This has resulted in some rivers (for instance Los Angeles River) essentially becoming non-rivers or dead rivers in our discourses. However, Coates (2013) argues against labelling rivers as lost; in his account, nature/culture binary is challenged by the autonomy of rivers. He demonstrates how rivers nurture us and other creatures, provide us with opportunities, confront us with dangers and shape our cultural life. His account of six rivers highlights how rivers are a prime demonstrator of the limits of human authority over nature - and how their capacity to inspire us is as strong as their capacity to destroy us.

2.2: Nature as culture or culture as nature?

Often, not least by cultural geographers, the division of nature and culture has been written off by arguing that nature is, in effect, a cultural construct (Daniels and Cosgrove, 1988; Cronon, 1993). Cronon (1993) argues that perhaps nature was never 'natural', but rather a collection of powerful ideas about 'natural', 'pure' and 'pristine'. He maintains

that the idea of wilderness is a construct of modern society troubled by its urbanisation and industrialisation. Consequently, when we label something as 'natural' we attach a set of values to it so that any modification will degrade or corrupt it. Thus wilderness becomes the measure against which we judge our life-worlds. He further argues that due to this construct of 'nature' and 'wilderness' our methods of environmental conservation focus wrongly on excluding human influence from delimited areas rather than trying to co-exist in a sustainable manner.

This approach of seeing nature as a cultural construct is indeed useful, but where does it leave nature in terms of agency if we see it simply as our ideas and perceptions of it (Jones, 2009b; Wylie, 2007)? A contrary approach suggests that everything, including our culture and our ideas and perceptions of the world are all part of nature and 'natural'. Indeed, our thoughts are emergent from the matter of the world and everything we build is evolving from the material realm of the planet. In realizing that everything in this planet is emergent from the same fabric of the world, the line between the human and the non-human starts to dissolve (Jones, 2009b).

2.3: The affective capacity of landscapes

While seeing everything as nature or everything as culture offers useful insight for my dissertation, approaches that allow more multidimensional dialogue between the two are equally important. For the purposes of my dissertation more-than-human enquiries appear as particularly useful (Lorimer, 2005; Whatmore, 2002; Whatmore, 2006; Thrift, 2000).³ A crucial moment for the more-than-representational movement was the emergence of affectual geographies (Thrift, 2000). Affect as a term has been under considerable debate within cultural geography in the last 15 years, and partly due to its non-representational nature it has proven to be a difficult concept to pin down. As Thrift (2004: 59) notes 'there is no stable definition of affect'. In short it could be described as the felt quality of an experience, the (partly) non-conscious, un-thought background of life that influences what bodies (not reducible to human bodies) do (Anderson, 2014;

³ A variety of theories, such as Actor Network Theory (Latour, 2005) or ideas on dwelling (Heidegger, 1971; Ingold, 2000) could be discussed, but I will focus on the concepts of affect and non-human agency as the most appropriate for this study.

Dixon and Sraughan, 2012; Pile, 2010; Thrift, 2000). Thus, bodies are in a continuous process of *becoming* through the dynamic process of affecting, and being affected by, the bodies around them. Importantly, theories on affect have emphasised the fact that emotions and feelings (which emerge from the process of being affected) matter in the complex processes of making and re-making bodies.

Affect as a context allows flows between all sorts of bodies, which is why it is particularly useful in the consideration of landscapes that are an assemblage of both human and non-human bodies. As Whatmore (2006: 604) suggests, affect 'reopens the interval between sense and sense-making' and 'refers to the force of intensive relationality - intensities that are felt but not personal; visceral but not confined to an individuated body'. The concept of affect is central for this study as I wish to consider how landscapes affect us and how that might differ between Kemijoki (tamed) and Tornionjoki (wild); particularly why it seems popular to think that only wild⁴ landscapes have a capacity to inspire experiences of wonder (Cronon, 1993; Tilley, 1994).

2.4: Post-human agency as an avenue for new dialogues

In order to discuss the ability of the non-human to affect, it is central to discuss the 'livingness' of materiality and ideas of the capacity of the non-human to act creatively (Whatmore, 2006). When we recognize the 'livingness' and agency of materiality, we also allow the non-human a capacity to affect us. However, agency is generally seen as an exclusively human quality (Knappett and Malafouris, 2008). Indeed, it could be argued that a key element holding apart nature and culture is the tendency to only allow agency to the human. According to Jones (2009b) even higher-order animals are seen as acting purely on instinct, let alone lower-order animals, plants and materiality that are not seen as much more than following a set of natural laws. Cronon (1993) argues that we reward the human with too much agency, while regarding nature as a passive recipient of our actions. For instance, many environmental discourses enforce the idea that humans could actually 'end' nature; drive the planet in such state that there is no nature left.

⁴ Or landscapes that we perceive as wild. Many landscapes we frame wild today have been profoundly altered by humans (e. g. Scottish highlands altered through deer stalking).

To contradict such anthropocentric ideas, some academics have argued that materiality and the non-human have agency in their own right, the ability to act creatively and the capacity to affect others. (e. g. Jones, 2009a; Jones 2009b; Knappett and Malafouris, 2008; Whatmore 2002; Whatmore, 2006). Life is a creative force and humans would not exist on this planet without millions of years of non-human processes. This is not to deny the agency of humans, but rather to re-define the definition of agency and extend its meaning to non-human things and beings as well as humans (Jones, 2009b; Whatmore, 2006). It is to 'consider agency non-anthropocentrically, as a situated process in which material culture is entangled' (Knappett and Malafouris, 2008: 12). In literature, agency of materiality and the non-human has been investigated with regard to for instance trees (Jones and Cloke, 2008), wetlands (Dillon et al., 2012), and rivers (Bear and Eden, 2011; Bracken and Oughton, 2014; Coates, 2013; Slater, 2012). When materiality is considered as having agency and the capacity to affect, the binary of nature and culture starts to dissolve.

2.5: Moving forward

Re-thinking our ideas and assumptions of nature is fundamental if we wish to create more sustainable ways of being with it. However, there is also a need for concrete methods in order to address the agency and the affective capacity of landscapes. Recently, it has been suggested that in order to communicate geographical knowledge more effectively there is a need to bring 'wonder' back to geography, possibly through interdisciplinary collaborations of art and science (Dixon et al, 2012a; Dixon et al, 2012b; Jones et al., 2012; Selman et al., 2010; Tooth, 2006). A suggested approach by Dixon et al. (2012a, 2012b) is to consider the aesthetics of the non-human world through the use of post-humanist methods in geomorphology. Science, philosophy and art could, according to them, find a common ground in the notion of sense-making. A post-human geomorphology using artistic methods might succeed in communicating knowledge in compelling ways, highlighting the agency of materiality and its capacity to affect us. Awe and excitement could once again be accepted as part of research, rather than something to be avoided in the name of objectivity. Dillon et al. (2012)

experimented with the dialogue of poetry, visual art and science in order to engage with the materiality of wetlands, and considered this to be a useful method in order to see wetlands as more than just resources to be managed, but as 'sites of dwelling which have agency in their own right' (p.1). Also communities exploring the dialogue of art and science with specific interest on waterscapes have recently emerged, such as 'Hydrocitizens' online community and 'Thinking like a river' initiative (Hydrocitizens, 2015; Wofford College, 2015).

I have studied literature questioning the habit of understanding culture and nature separately, and it seems that dissolving this binary is the next crucial step in environmental management. More-than-human, affectual geographies and ideas on post-human agency could act as a way of re-thinking human-nature relationship and post-humanist methods aiming to highlight the agency of materiality may be a potential way of inspiring alternative imaginations of landscapes. With such set of ideas I set to investigate the complex affectual realms of river landscapes in Kemijoki and Tornionjoki. How I undertook the research to assess these ideas will be discussed in the next chapter.

Chapter 3: Methodology: Approaching Riverscapes

3.1: Approaching the subjective experience of landscapes

In my research I set to investigate how landscapes have a capacity to affect us and how that capacity could be considered in a better management of our environments. More specifically I wished to assess how humans are more affected by 'wilderness' than heavily modified landscapes. Approaching such questions of landscape and affect poses some methodological challenges. As these concepts are abstract and often caught up in words and definitions, entering the physical world from the world of academic articles and debates may leave one feeling strangely hollow; how does this manifest itself in the 'real world'? Since researching and representing these topics via the use of quantitative methods would have been difficult, I decided to use a wholly qualitative approach. As DeLyser et al. (2010: 6) note, qualitative researchers 'recognize and validate the complexity of everyday life, the nuances of meaning-making in an ever-changing world, and the multitude of influences that shape human lived experience'. To address the complexity of my topic, archival work and ethnographic/performative research were chosen to be the most suitable methods, and interviews were carried out as a complementary method. A mixture of primary and secondary data collection allowed me to gain first-hand experience of the affective capacity of landscapes as well as analyse discourses on a wider cultural scale.

Having grown up by Tornionjoki, there is certain positionality in my research. Through acknowledging this positionality I have attempted to move beyond the simplistic subject/object binary of research (DeLyser et al., 2010). Although approaching research subjectively might be a matter of concern for some, knowing cannot be separated from the social context of the knower, and research is always carried out by a subjective being (Dixon and Jones, 2006; Haraway, 1988). Indeed I argue that positionality and uncertainty are not only unavoidable in my research, but also necessary to gain a depth of understanding of the affective processes taking place in river landscapes. Especially through discussing the 'more-than-representational' elements of the world (Lorimer, 2005) many researchers have acknowledged that 'rejection of stability proffers instead a world of multiplicities and uncertainties where clarity may not be achievable, or

desirable' (DeLyser et al., 2010: 13). Especially ethnography and performative research allowed me to negotiate the relationship of the researcher and the researched, as I became the object as well as the subject of the study (Watson and Till, 2010).



Figure 3.1: Research was frequently performed in company, which was not necessarily human. (Own picture, 2015)

Below a generalised research schedule (table 3.1). The research spread out over three months, the most intensive period being July.

Table 3.1 Research schedule

June – second half	Going to local libraries to find documentary sources (library in Tornio and library in Kemi). Searching other kinds of sources available (internet, museums). Familiarisation with the sources and identification of surfacing themes -> determining the codes for the document analysis.
July – first half	Continuing the reading of archival material from the libraries. Going to museums to look for photographs. Beginning extensive ethnographic and performative research. Through identification of themes from document analysis, thinking how these discourses manifest themselves in the real world. Included day trips to several locations by both Kemijoki and Tornionjoki. Included walking, paddling, rowing etc.
July – second half	Continuing the reading of archival material and ethnography/performance at the same time allowing the processes to feed on and influence each other. A four day trip to Kemijoki in which I travelled all the way to the northern reservoir visiting several locations on the way. I also conducted two interviews on this trip. Transcribed the first two interviews. A whitefish festival in Tornionjoki which I attended as part of my ethnography (Kukkolaforsen). A three day trip to Tornionjoki, where I travelled north to Sweden to see the biggest rapid in Tornionjoki – Kengis. Also conducted an interview on this trip. Transcribed the third interview.
August	Interviewed a young person living by Kemijoki and transcribed the interview. Made several extensive trips to Kemijoki and Tornionjoki – walked by the rivers, paddled etc. Finalising archival research and coding the documentary sources. Attended a National Rivers Day festival on the Swedish side of Tornionjoki. Attended an open day at Taivalkoksi hydropower plant in Kemijoki.

3.2: Generating context through document analysis

Archival sources represent the broader discourses of the rivers, and through document analysis I was able to get a thorough understanding of these. Using both older and newer sources I was also able to determine how these discourses have been changing over decades - especially with Kemijoki that went through dramatic changes within the last hundred years. As Lorimer (2010) notes, archives are now also increasingly utilised in creating narratives of past geographies, which I have done by constructing a short history of Kemijoki and Tornionjoki for a necessary framework to the reader (box 1.3). In addition to inspecting the history and discourses of the rivers, document analysis also allowed me to gain the greater context in which I was to conduct the rest of my research, ethnography/performance and interviews. The ability for me to do this successfully was partly dependent on me having an understanding of the discursive context and the history of the rivers. The themes I identified circulating in document analysis directed my research towards issues that seemed crucial in the context of these two rivers.

My key documentary sources were books/book chapters that I sourced from local libraries (full list of the types of sources used provided in table 3.2). I attempted to go through most relevant material written about the rivers in order to get a broad and thorough understanding of the popular discourses about the harnessed and the unharnessed river. All documents were analysed using the same coding system to ensure a coherent investigation of the surfacing themes, a list of which is provided in table 3.3. The themes were decided based on the identification of relevant issues through academic reading. For example, affective capacity of landscapes was investigated through identification of sentimental and sublime accounts following Dixon et al. (2012b: 237) who define affective capacity of landscapes as 'a capacity that takes us back to the sublime as a viscerally felt invitation to thought'. Agency was investigated through analysing whether the writer affords agency to human or non-human elements of the environment following Jones' (2009b) discussion of non-human agency and the tendency of our culture to regard humans as the only beings capable of acting creatively. A theme that arose through familiarisation to the sources was the tendency to see landscape as a place of sensuous encounter rather than inert scenery to look at (Husserl, 1970; Wylie, 2007).

Table 3.2: Document sources

Type of document	Number of sources	Examples
Factual books (Reports and memorials)	19 (Kemijoki 10, Tornionjoki 9)	<p>‘Power from vortex – a history of Kemijoki’ (Säynäjäkangas et al., 2013): a book about the harnessing of Kemijoki and the social effects that came with it</p> <p>‘Kukkola Rapid’ (Heikkilä, 2005): a photo and story collection of the life around one of the greatest rapids in Tornionjoki</p>
Fictional books	5 (Kemijoki 2, Tornionjoki 3)	<p>‘A story of a great river’ (Kariniemi, 1979): A story of lives and land that were swept away by the harnessing of Kemijoki</p> <p>‘The lost scales’ (Heikkilä, 2014): A fictional account of what Tornionjoki would feel like if the whitefish disappeared</p>
Photographs	Went through hundreds, bought / saved 10	
TV documentaries	4: 2 on Kemijoki and 2 on Tornionjoki	<p>‘The River Woman’ : A documentary of a big art project floating down Tornionjoki</p> <p>‘The Salmon Rising’ : A documentary on the lost journey of the salmon in Kemijoki</p>
Newspaper articles	17 on Tornionjoki, 30 on Kemijoki, 4 on both	A range of articles regarding for instance fishing and flooding in the case of Tornionjoki, while most of the articles about Kemijoki were about the Kemijoki corporation
Websites	Dozens	www.kemijoki.fi: The official website of Kemijoki OY, company owning most hydropower plants in Kemijoki

Table 3.3: Coding themes

Theme	Major category	Explanation
'emotion'	nostalgia / loss	Experience of loss, and that what was before was better
	sentimentality	Elements of the landscape given sentimental value
	sublime	Element of the landscape perceived as awe-inspiring
'reason'	necessity	Some action taken seen as an undeniable necessity
	utility	Element of the landscape seen as being useful to humans
senses	sensuous encounters	Landscape encountered through a variety of senses, not just vision
agency	human agency	The ability to act is afforded to humans
	non-human agency	The ability to act afforded to a non-human element of the landscape

3.3: Intimate methods: partial ethnography and performative research

The focus of this research is how landscapes affect people; problematic that is not entirely assessable through written sources. Researching something that is more-than-representational is surely a challenge (Pile, 2010), but a mixture of partial ethnography and performance in the landscape seemed to have the potential and were chosen to be the appropriate method of primary data collection. Indeed, in order to get a full understanding of the themes surfacing from document analysis, I needed to explore the material world. Through research in the field I was able to identify how the themes circulating in archival material manifested themselves in the 'real world', but also gain insight into elements that are not readily assessable through written accounts – the subjective sensuous and affective encounters of self and landscape.

Ethnography/performance acted as a way of breaking from discourse to practice and experiencing landscapes without pre-determined ways of seeing. Herbert (2000: 551) argues that 'ethnography uniquely explores lived experience in all its richness and complexity', leaving out pre-determined coding categories and allowing experiences to

arise as they are. As Watson and Till (2010: 121) note, ethnography allowed me to get a thorough understanding of how people 'create and experience their worlds'. Also performative research in the landscape was valuable as a form of 'knowing-by-doing', as it felt important that my research was not solely based on the observation of others (Merriman et al, 2008).

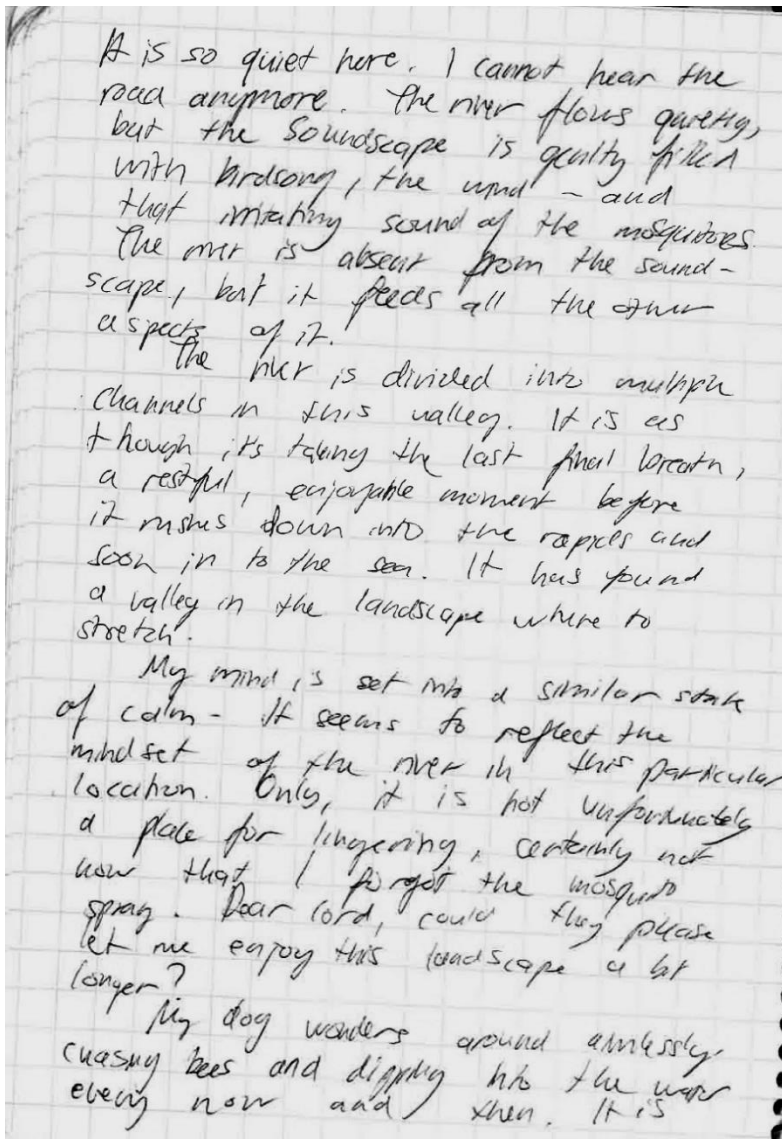


Figure 3.2: An extract from my notebook. Visiting a valley in Tornionjoki between Karunki and Ylitornio

I had two main objectives I wanted to achieve through my intimate methods; firstly to observe the landscapes and the human engagement in them, and secondly perform activities in the landscapes recording my own feelings and thoughts about them. The latter has been done by for instance Wylie (2005) on a single day of walking, and Lorimer and Wylie (2010) similarly exploring walking as a method of inhabiting landscape. Inspired by such accounts, I performed activities typical for the landscapes of Kemijoki and Tornionjoki. In order to continuously record my

findings, I kept a field notebook at all times, an extract of which is shown in figure 3.2. In the end of my research period I had one and a half notebooks of writing to be analysed and reflected on, which has been used to find patterns to get a clear picture of my thoughts and observations.

My research also included a photography project presented further in Chapter 6. This was chosen as a way to explore the post-human elements of the rivers and thus act as a possible method of evoking alternative imaginations of the rivers (Dixon et al, 2012a; Dixon et al., 2012b; Dillon et al, 2012). The pictures were taken from the water using a waterproof GoPro camera with a fish eye lens in order to imagine an alternative perspective from the one we usually take gazing at the river from its banks. Instead of gazing *at* the river, the fish lens is gazing *from* the river which allowed me to envision the perspective of the non-human in order to create potentially affective stories about the rivers. The camera lens not only provided an imagined gaze from within, but also a gaze that is inherently non-human; while the lens closely resembles our own vision, it is an inorganic technology captivating views a human eye could not see.

3.4: Interviews as a complementary method

As my third method I conducted interviews with key individuals in order to gather in depth information about people's encounters with the rivers and to gain local understanding of Kemijoki that is a relatively foreign river to me. Due to time and resource restriction I chose to do interviews only as a complementary method. Had this project been larger scale, it would have indeed been useful to conduct more interviews with locals in order to get a broader picture of the popular discourses and experiences of living by the riverside. Nonetheless, just interviewing key individuals gave me valuable insight into the ways in which people understand and engage with the rivers. Through document analysis and ethnography/performance I was able to identify the issues to bring up in these semi-structured interviews. I was also more sensitive to the matters the interviewees wished to bring up. Due to the small number of interviews, the data cannot be used to find themes or draw conclusions from on its own, but will be used as complementary data for my archival findings. Interviews were coded using the same system as the archival material. In the process of coding these same themes continuously kept surfacing which confirmed the relevance of my chosen codes and provided me with an opportunity to generate coherence between my methods.

Table 3.4: Interviewees

Who?	When & Where & How long?	Surfacing themes
Helena, an environmental activist who has campaigned against a new reservoir in Kemijoki for decades	July, Helena's office in Kemijärvi, 2 h	Loss of the old landscape and will to protect what is still left. The hydropower company seen as the enemy.
Anja, an elderly lady who has lived by Kemijoki all her life	July, Anja's home in Suvanto, 40 min	Loss of the old landscape, but also acceptance of the situation.
Katariina and Katri, two artists involved in performance art projects in Tornionjoki	July, a camping area near Kolari, 1 h 15 min	Embodied encounters with the river emphasised, importance of art in highlighting certain issues and landscapes
Laura, a young woman who grew up by Kemijoki	August, a camping area in Tornio, 30 min	Disengagement with Kemijoki, but also seen as a landscape of opportunity

3.5: Towards more-than-human research

There is surely room for more discussion and development into the best methodological approach for affectual, more-than-representational and post-humanist research. Especially critical is the paradox of how to represent something that is more-than-representational (Pile, 2010). The researcher here takes perhaps a large role as not just the researcher, but also the object of research and self-reflection. I argue that in order to address abstract questions, fresh ideas are needed regarding the methods. In this project I have combined well established methods with more experimental ones in hope of not only addressing my research questions, but to also investigating whether geography would benefit from a more creative and interdisciplinary approach in research.

Chapter 4: The living river and the lost river

‘We respect human needs for navigation and power, but we also respect nature’s autonomy by limiting our capacity to dam every tributary that feeds the river and to build homes on every floodplain. We leave some rivers wild and free and leave some floodplains as wetlands, while using others to fulfil human needs’ (Merchant in Cronon, 1993: 453).

In conducting my research I found it crucial to first provide the necessary context for myself through archival study and document analysis. I will do the same here for the benefit of the reader as it was through document analysis that the understanding of the affective realms of the rivers started to take shape. By first discussing the discursive environment of the rivers, it is easier to further understand my experiences in the landscape. Interview data will also be discussed here as means of expanding the meanings and discourses circulating between people, document sources and the sites. As discussed in Chapter 2, the great divide of nature and culture is crucial in how we make sense of the world (Jones, 2009b), and it is also strongly present in the discourses of the ‘wild’ and the ‘tamed’ river. Also the affective capacity of landscapes was identifiable from document sources and interviews through thematic analysis. Such themes will be discussed in this chapter.

4.1: Tornionjoki – a landscape of sensuous encounters

Understanding landscapes through multi-sensory engagement is increasingly popular with landscape geographers, especially in post-phenomenological and more-than-representational accounts (Hetherington, 2003; Lorimer, 2005; Wylie, 2007). Indeed, one of the basic aspects of how people make sense of Tornionjoki is regarding the river landscape as a life-world, a place of engagement and encounter beyond experiencing it merely with our eyes (box 4.1) (Husserl, 1970). The river is known through multi-sensory everyday engagements that negotiate the relationship between self and landscape (Alatalo, 2006; Heikkilä, 2014; Tikkanen, 1997; Tikkanen, 2000). Within this framework it could be argued that there has been a transition from a ‘useful’ river into a ‘leisure’ river within the last hundred years. Where fishing and log-floating used to be major sources of livelihood for people, the engagement with the river today is mostly

recreational (Heikkilä, 2005; Sundquist, 1963; Vilkuna, 1966). Yet this transition does not seem to have affected the closeness of interaction with the river; although it is no longer necessary to know the river through tactile engagement to provide one's livelihood, the interaction with the river is described to be sensuous (box 4.1).

Box 4.1: Sensuous interaction with Tornionjoki

Extract from a book exemplifies how the river is experienced sensuously:

The mighty roar of the rapid took over the mind, moulded every corner of the soul, the deepest parts of it. Hands moved the scoop net steadily at the bottom of the rapid. The body was working, moulding with the scoop net, the mind was resting peacefully. This was a co-operation of human and the scoop net -- the moment the boy felt he transformed into part of the waves of the rapid, the net jerked' (Own translation, Heikkilä, 2014: 146).

Part of the interaction with the river has throughout centuries been river rafting. In 1971 a man is balancing on a log (figure 4.1), in 2014 my brother faces the waves with a kayak (figure 4.2). In order to perform such activities, one needs to know the river through multi-sensory engagement. Like my brother says: 'I have to find a common melody with the river and dance in its pace'.



Figure 4.1: Log surfing in Kukkola (Kainulainen, R., 1971. The museum of Tornio valley photo collection.)



Figure 4.2: Freestyle paddler Mikael Lantto (Karttunen, J., 2014)

4.2: The living river: the affective realm of Tornionjoki

The relationship between people and Tornionjoki is inherently intimate. The discourses about the river are loaded with sentimental values that are frequently identifiable from the document sources (Heikkilä, 2005; Kannala, 2013; Leppihalme, 2014; Myllylahti, 2012; Pietilä-Juntura, 2011; Vanhatalo, 1988). As demonstrated in box 4.2 the lives of the riverside people are seen as being tied to the river, and through this engagement it is expected that everyone living by the river has a sentimental attachment to it. The river is

Box 4.2: Sentimental attachments to and sublime imaginations of Tornionjoki

Extracts from books exemplify the sentimental and sublime encounters of self and landscape:

‘We hang to the river like a happy man hangs to his dreams’ (Heikkilä, 2005: 21).

‘The river is the collector of aesthetic experiences, spiritual values and regional identity in Tornio valley. -- The river has left its mark on people, one who has lived in the annual rhythm of the river carries the memory of the water with them’ (Own translation, Pietilä-Juntura, 2011: 265).

‘The rapids are a great thing, it’s like a paradise on Earth’ (Heikkilä, 2005: 3).

‘As if part of the appeal of scooping up fish was based on fear. Every step needed to be precise, the rapid needed to be respected. A careless fisherman would be swept away in a matter of seconds by the merciless stream, and the body battered by the waves would be found downstream’ (Own translation, Heikkilä, 2014: 148).

Everyday activities that are performed in close proximity to the rapid become moments of sublime encounters like exemplified in this image of a man scooping up fish on a fragile platform in the rapid (figure 4.3).



Figure 4.3: Scooping whitefish in Matkakoski. (Kainulainen, R, 1970s. The museum of Tornio valley photo collection.)

regularly approached with awe; sublime, even religious values are afforded to it (Heikkilä, 2005; Kannala, 2013; Kataja, 1914; Jormanainen, 2002; Myllylahti, 2012). Tornionjoki seems to be viewed not only as a reflector of self and life, but also a sublime being capable of profoundly affecting the lives of people who dwell on its shores – to ‘leave its mark’ or ‘sweep people away’ (box 4.2).

Box 4.3: The living river as an agent

Extracts from books see the river as an active agent:

‘The river takes its victims in many ways -- Tornionjoki hides many stories within its waves’ (Own translation, Kannala, 2013: 17).

‘The mighty force of the rapid evoked her courage again. -- So did the rapid rejoice the arrival of summer, so fiercely the waves splashed as they were freed from the ice’ (Own translation, Kataja, 1914: 72).

Perhaps due to the affective nature of the river, it has also inspired a range of art projects, such as the ‘River woman’; a dance project floating down the river aimed to highlight the identity of the riverside people (figure 4.4). An artist involved in the project describes it as follows:

‘It was unbelievable, it felt like the river had somehow become the River woman, and the locals really took ownership of it.’



Figure 4.4: River woman (Ylimaunula, P., 2010. Available from: www.yle.fi/uutiset/jokinainen_-_kuvablogi/5597596. Accessed 10/10/15.)

The affective capacity of the river is also illustrated in that the non-human elements of Tornionjoki are seen as having agency over themselves and other elements of the landscape; the river is approached as a living being that has the capacity to act and affect minds and lives of the people living on its banks (box 4.3) (Kataja, 1914; Leppihalme, 2014; Myllylahti, 2012; Pietilä-Juntura, 2011; Sundquist, 1963; Vanhatalo, 1988). A river is an assemblage of elements that are traditionally seen as inert – water, sediment, vegetation, ‘low-rank’ animals - but Tornionjoki it is nevertheless framed as being very alive. All in all, the discourses about Tornionjoki emphasise the ‘livingness’ of the river (Whatmore, 2008) and illustrate the affective capacity of the landscape through sensuous, sublime and sentimental accounts.

4.3: The lost river: the affective realm of Kemijoki

The harnessed river is rarely afforded similar capacity to inspire wonder as the unharnessed one; as Cronon (1993) argues, the modified nature is seen as fundamentally corrupted or somehow reduced. The strongest narrative associated with Kemijoki is without fail the notion of a lost or a dead river. A great deal of the writing on Kemijoki dwells in the past; in what the river used to be and what it would never be again. Similarly to Tornionjoki, the river of the past is described with sublime and sentimental accounts, and everything seems to be magnified by the bitterness of loss (box 4.4) (Alamaunu, 1987; Alaruikka, 1977; Autti, 2013a; Kariniemi, 1979; Laurinolli, 1983; Säynäjäkangas et al., 2013).

Box 4.4: Sublime and sentimental imaginations of the lost river

Extracts from books remember the sublime and sentimental encounters with the old river:

'The old Kemijoki was famous for its ferocious rapids. For centuries they had thundered in their rocky channel, raised splutters in the air and cycled masses of their waters in the sinks within the rocks. The rapids roared in freedom without the touch of a human hand' (Own translation, Linkola, 1967: 162).

'This stream has ingrained in my soul and the souls of the people who have loved the stream' (Own translation, Alaruikka, 1977: 31).

The writing in the picture of Vanttauskoski (figure 4.5) before it was harnessed says: 'a free Vanttauskoski'. Figure 4.6 shows men floating logs down a rapid – everyday encounters with the river had sublime elements.



Figure 4.5: Free Vanttauskoski. (Unknown, beginning of the 20th century. Available from: www.ylakemijoenhistoria.wordpress.com/valokuva-ylakemijoelta/. Accessed 05/07/15.)



Figure 4.6: Log floating a raft of logs down a rapid. (Kiviniemi, T., 1920s. Available from: www.alakemijoki.omatsivut.info/index.php?p=1_26_Alakemijoen-kalastusalue-Kuva-Galleria. Accessed 05/07/15.)

Correspondingly to the discourses about Tornionjoki, the non-human elements of the old Kemijoki are often afforded the capacity to act; the river is seen as an active, even thinking agent morphing its environment and the people around it (box 4.5) (Alaruikka, 1977; Autti, 2013a; Kariniemi, 1979; Laurinolli, 1983; Pokka, 1994; Puuronen, 2013; Tiuraniemi, 1996).

Box 4.5: The old Kemijoki as an agent

Extracts from books see the old Kemijoki as an active agent:

‘Did the spirit of the rapid demand a victim for its services or were the drownings due to too courageous battle against the power of the rapid, that I will leave to the consideration of the reader’ (Own translation, Alaruikka, 1977: 32).

‘Salmon was seen as human like, and it was considered to be a wise and sly fish who knew how to avoid traps. If the salmon escaped, it was seen to be elated and glee which obviously vexed the fisherman’ (Own translation, Autti, 2013: 199).

Crucial for this discourse of the lost river is that it only lives in memories. Losing the old Kemijoki inspired a range of memorials to be written about it, and it is in these texts where such nostalgic accounts surface. The harnessing is viewed as an act of violence towards the river that significantly reduced its agency and ability to inspire awe, if not altogether killed the river (box 4.6) (Alamaunu, 1987; Alaruikka, 1977; Autti, 2013a; Kariniemi, 1979; Laurinolli, 1983; Säynäjäkangas et al., 2013; Puuronen, 2013; Risku, 1975; Tiuraniemi, 1996). The river used to be a place for sublime, sentimental and sensuous encounter, a living being affecting the lives of the riverside people. These old characteristics of a living river were suffocated, and what is left is a tamed, dead stream, a non-river that is no longer engaged with in any significant level. Here the river landscape as a life-world rather than a scenery is yet again emphasised; often the things missed were not the views, but the scents, sounds and activities (box 4.6).

Box 4.6: Losing the old Kemijoki

Extracts from books mourn the loss of the old river:

‘In 70 years the short-sightedness of humans, the pursuit for short-term profits and belief for technology has managed to nearly destroy the previous life vein of Lapland’ (Own translation, Puuronen, 2013: 225).

‘The life stream of Lapland has become a dead stream to those who live by its banks’ (Own translation, Alaruikka, 1977: 46).

Although one of my interviewees Anja, an elderly woman living by Kemijoki, did not see the harnessing works as purely negative, she reflects on the loosing of soundscape:

‘Well the rapids are gone. Muokkakoski was just there, oh boy it was lovely when you could hear the sound of the rapid in the evening. That I have missed the most’ (Own translation).

Similarly, another interviewee, Helena, remembers the multi-sensory interaction:

‘All of these were sandy beaches. And we had mussels and the scent. I will always remember the scent during the summer. I have not smelled that since’ (Own translation).

The initial trauma is long in the past and the new generations have never known the free flowing river. But harnessing has a legacy that is still very much present – when older generations turned their backs on the river, their children never got the chance to build a proper relationship with it. The lives of the people and the river had started to flow separate ways. Like Outi Autti who studied the effects of damming Kemijoki describes in a web article of WWF:

‘The river was a source of confusion as a child. Nobody talked about it, nobody went there, nobody was interested in it. It was lost’ (Own translation, Fritze, 2014).

4.4: Kemijoki - the awakened river

The lost river is the theme that without few exceptions (Pokka, 1994) dominates the popular discourses and meanings circulating about Kemijoki. But another narrative exists in formal documents maintained by the companies that harnessed and now manage the river. This is a commercial narrative, purposefully maintained and enforced, that relies upon the necessity and utility of harnessing the river. The harnessing of Kemijoki is framed as something that benefitted of the entire nation. In the narratives of the companies, the sublime power of the rapids is effortlessly channelled to the

Box 4.7: The commercial narrative

A quote from a promotional leaflet of Kemijoki OY, a company owning the majority of hydropower plants in Kemijoki:

‘Water is a vital resource, the basic precondition for life. The cycle of water has renewable power. We harness the latent energy into a power stream and part of our everyday lives’ (Own translation, Kemijoki OY, 2009: 1).

A quote from Kemijoki OY’s official website:

‘Hydropower is born as the warmth of the sun transforms the water from the surface of the Earth into water vapour. Water vapour accumulates into clouds and returns to the surface of the earth as rain. Most of the rainwater drains into lakes and rivers and through rivers into the sea. In hydropower plants the force of the water falling is transformed into electricity (Own translation, Kemijoki OY, 2014).

The first hydropower plant in completion (figure 4.7). The first step of harnessing the river to fulfil its ‘true purpose’ is taken.



Figure 4.7: Isohaara powerplant nearly ready. (Unknown, 1948. Available from: www.pvotarina.fi/hk/#1. Accessed 08/07/15.)

hydropower plants that now conscientiously produce electricity for the homes of the nation (box 4.7) (Kemijoki OY, 1984; Kemijoki OY, 2009; Kemijoki OY, 2014; Kokko, 2003; Linkola, 1967; Seppälä, 1976). The quotes from the promotional literature of Kemijoki OY in box 4.7 demonstrate this apparently effortless transition of a natural cycle of water into the production of electricity. This narrative aims to enforce the idea that the true purpose of the river is only gained through the heroic human act of harnessing the river - only through that is the 'latent' power of the river 'released'. Interestingly, when the popular discourse sees the river as lost and dead, the promotional literature seems to suggest that only now is the river truly alive.

4.5: Moving away from the great divide

Through analysing document sources and interviews I was able to draw the conclusion that river landscapes are framed as deeply affecting, but only if they have not gone through significant transformations. The trauma of losing not only a familiar landscape but also one's livelihood is a genuine experience for many and must be taken seriously (Autti, 2013b). However, this preference for the 'wild' is deeply engrained in our culture and partly determines what landscapes we find affecting. Kant (1764) exemplified this already centuries ago in his reflections on the experiences of beautiful and sublime, which were solely limited to the 'natural'. Consequently, when there is a preference for the 'natural', the altered nature is seen as corrupted and reduced (Cronon, 1993). Had I only focused on archival research in this project, this might be what I would be left with: a confirmation of the popular way of seeing human and nature on separate sides and idealising landscapes untouched by technological advancements with no clear understanding on why this might be. In the end, it was being with these rivers that slowly begun to dissolve this binary and enlighten the affective capacity of landscapes.

Chapter 5: Experiencing and (de)constructing wilderness

Ideas of ‘wildness’ as an affecting force in landscapes appeared so strongly throughout the document analysis that it was truly interesting to see how such accounts manifest themselves in the actual river landscapes. Although my observations and experiences were often coherent with the popular discourses, they also contested the readily assumed nature of these rivers. While the interaction of landscape and self is partly dependent on our ways of knowing, it is also open to encounters that do not rely on pre-determined ways of sense-making. In a post-phenomenological fashion I maintain that meaning emerges from the interaction of self and landscape, rather than through exclusively cultural knowledge structures (Wylie, 2007). Although the encounter of self and landscape does not happen in isolation of the discursive environment, it offers a possibility to interrupt popular ways of knowing, such as the commonly accepted ideas about the wild and the natural (Cronon, 1993; Jones, 2009b). In this chapter I will describe my personal experiences in these landscapes, and as a means of breaking from discourse to practice I will mostly retain from referring back to literature (Whatmore, 2008).

5.1: Being with a ‘wild’ river

Box 5.1: 30/06, Karunki

‘The river is extraordinary today. I wish I could capture this moment, this feeling of peace and acceptance. I wish I had more words for this. I find it difficult to get up and leave.’



Figure 5.1: Karunki (Own picture, 2015).

Having grown up by Tornionjoki, I find myself agreeing with the sentimental tone of much of the writing discussed earlier. Identification with the river is a result of being ‘with’ it for years, from one season to the next, living by its rhythm and interacting with it on an almost daily basis. Mostly this interaction has been an unthought aspect of everyday life. This summer was to be different. This time I was to go down to my home river with a notebook and a pen in my hand with the intention of recording it,

analysing it and understanding something ‘more’ about it.

For me, such as so many others living by Tornionjoki, the river has become something more than just a channel of water – it is a nurturer of thoughts and a place for relaxation. The reason for this does not seem to be readily available for interpretation. The unthought nature of my engagement with the river creates a relationship with the landscape which is filled with personal meanings. Tornionjoki inspires a strong identity in me, like it does in most people living in the river valley – one that is specifically tied to the river. One of the first entries (box 5.1) in my notebook demonstrated the intimacy of my relationship with Tornionjoki, and the engaging quality of the river. As exemplified in Chapter 4, a crucial part of the affective realm of the river is the tendency to experience it through tactile encounters. For myself, Tornionjoki has always been more of a life-world than a picturesque landscape to look at, which became a crucial aspect of

Box 5.2: Sensuous encounters

07/07, Karunki

‘Pressing one’s body against the pier, the river feels different. Sonic and tactile gain importance from visual. The waves feel harder as I am pressed against the wood in between. Eyes half closed the island looks like a monster rising from the water with its round back and its long neck. How much of this experience is me and how much is the river, I wonder. The boundary between self and landscape is hazy; where does the wave end and my senses begin? How much of the landscape painted by my mind and how much of it is purely material?’

18/07, Kukkola

‘I wonder if this amount of noise would be pleasing if it was not coming from a rapid. Say it was a road or something. The mist from the rapid sticks to my face and the paper of the notebook gets wet. I need to stop writing and just sit down.’

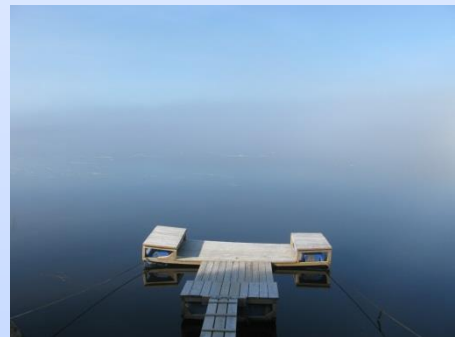


Figure 5.2: Karunki (Own picture, 2015).



Figure 5.3: Kukkola (Own picture, 2015).

my research. Although I do not have to make my livelihood from the river such as the generations before me, I know the landscape through a continuous interaction of ever changing sceneries, sounds, smells and tastes (box 5.3).

From mundane encounters, such as fishing, paddling and swimming, to open celebrations by the river, such as the whitefish festival and the national river day celebrating the free flowing river, the appreciation of the river is present in the lives of the riverside people. As I noticed during this summer, many of these activities tend to take place by the rapids, which seem to be the focal points of the river - places where the bodies of people are drawn, perhaps because of the sublime imaginations they inspire (box 5.3). These are also the locations I was continually drawn to during my research period – partly because they were the hotspots of activity, partly because one never seems to get sick of sitting by a rapid.

Box 5.3: Sublime encounters

30/07, Kengis

On my visit to the largest rapid of Tornionjoki:

‘Long before we can see the rapid, we can hear it. It fills my chest with fearful excitement. Approaching, hearing the roar of the beast, it is almost difficult to breathe.’

15/07, Kukkolaforsen

The national river day in the Swedish side of Kukkola:

‘A man is giving a speech. It is lost in the roar of the rapid. With all the torches still burning bright the rafts start floating down one by one. It is getting dark and the rapid pushes the rafts downstream with an incredible speed. Truly a sight not to be missed.’



Figure 5.4: Kengis (Own picture, 2015).



Figure 5.5: Kukkola (Own picture, 2015).

In sum, my personal experiences and observations by Tornionjoki were rather comparable to the popular discourses I identified; moments of sublime encounter, sentimental attachment, sensuous interactions and an experience of being in the presence of something that is alive rather than inert. At times it was nearly frustrating to feel like I was blindly following a route readily guided for me; to feel awe at the presence of a rapid, rest in calm awareness on a beautiful day by the river. Yet my observations and feelings were genuinely emergent from the interaction of self and landscape. One wonders: how much of my experience was determined by me and how much by the river (box 5.4)?



Figure 5.6: Karunki (Own picture, 2009).

Box 5.4: 01/09, Karunki

'I ask the river, do you have one final thing to say before I go? But now I realize how silly that sounds. It is me holding the pen after all. A moment of epiphany and I feel like the river is amused, questioning whether it really is me determining these words.'

5.2: Being with a 'tamed' river

Box 5.5: 17/07, Vanttauskoski

'What makes a river, I wonder as I sit by this vast pool of water. The water is restless as it waits to be channelled through the power station. Standing in a pool and then rushing through another machine. This river is a sequence of lakes and powerstations. Has the very nature of it been taken away?'

My research at Kemijoki prompted questions on what 'counts' as a river (box 5.5). Coates (2013) argues against a notion of regarding some rivers as non-rivers, lost rivers, silent rivers or dead rivers and hopes for emphasis on change rather than destruction. Similarly, I wanted to approach Kemijoki with curiosity, which was quite difficult after

reading dozens of accounts of the river being 'lost'. The first time I went to the river it was flooding – in the sense that water needed to be let through the floodgates without channelling it through the turbines, a great vexation for the company that desperately wants to build another reservoir in hope of channelling every drop of water through the turbines. Interestingly, the time when the floodgates were open ended up being one of the very few moments I saw people being drawn to the river, genuinely interested, perhaps affected (box 5.6).



Figure 5.7: Isohaara (Own picture, 2015).

Box 5.6: 15/06, Isohaara

'The speed and mass of water is intoxicating. It is rather ironic. The only time the river flows solely for its own purpose, not into electricitywires, is the only time people bother to come down to the river here. The river seems to rejoice, but I wonder if it really cares. It is all in my head again.'

The interesting beginning of my interaction with Kemijoki soon became a rather frustrating chase after feelings – or at least something to write. I found myself standing on the riverbank with a blank paper, desperately trying to document something. Perhaps this was because I was a stranger to this river. Or because the modified sections of the rivers were essentially factory areas that hardly inspire a mind of a romantic, if not on rare occasions some experience of industrial sublime. Perhaps I approached the river with deeply embedded attitude about a modified landscape being corrupted (Cronon, 1993). Indeed, the contrast between Tornionjoki and Kemijoki was evident not just in the document sources, but also in the field. The landscape, especially by the heavily modified sections of Kemijoki, is empty of engagement (box 5.7)

Box 5.7: A desolate landscape

06/07, Isohaara

'The riverside people seem to have turned their back on the river. There is a wall between the housing and the river. To imagine to be living by a great river, but never seeing anything else from one's window than an enormous bank with warning signs stacked on the top makes me sad.'



Figure 5.8: Isohaara (Own picture, 2015).

17/07, Seitakorva

'Walking on the dam, past the power plant, it is incredibly silent here. The soundscape feels unreal. The airy hum of the power plant and a speaker outside the station, playing radio for some reason. Yet I cannot see anyone, no humans, no birds. Electricity wires shoot across the landscapes channelling the power of the water to the national electricity grid. Somehow, this structure standing in the river, humming to itself, feels lonely.'



Figure 5.9: Seitakorva (Own picture, 2015).

There are still sections of the river where people do engage with it, but especially the landscapes that were once rapids and now hydropower plants desolate of human presence - other than the obvious reminder of human interference standing in the river. As I concluded from my research by Tornionjoki, rapids seem to be the focal points of the rivers; thus it seems that when they are modified, so is much of the engagement with the river. The roar of the river rushing down its rocky bed is replaced by an airy, silent hum of the power plant. These rapids are no more, and neither are the people and activities that went with them. Most power plants stand alone in the wilderness. An illustrating example is a dying village by Pirttikoski, once a rapid, now a dry scar in the landscape (box 5.8). But despite its apparent ugliness, I found the landscape deeply affecting. It had a haunting quality to it and I found myself being genuinely touched by it. Although this dry, five kilometres long stretch of a riverbed is a three hour drive from my home, I found myself going there twice - and further dreaming about it several times.

Kemijoki, a river that at times felt like anything but a river, was a true invitation to thought. Although this did not happen through sublime encounters and moments of epiphany, Kemijoki whispered stories of a different kind, and all I needed to do was listen.

Box 5.8: 17/07, Pirttikoski

'It is difficult to describe this sight, this feeling. The river bed seems to be telling a story, a history. The waterless channel is indeed affective, but in a silent, melancholy way.'



Figure 5.10: Pirttikoski (Own picture, 2015).

There was a note in the door of one of the apartments by the river which says 'to be sold cheaply':



Figure 5.11: 'To be sold cheaply' (Own picture, 2015).

5.3: Wilderness contested

During my time in the field I often felt like I was merely confirming the stereotypes of the rivers through my 'western ways of sense-making'. In some ways, my research strengthened my initial supposition that humans tend to be more affected by what we frame to be wild. However, the concept of wildness was also contested through my ethnographic and performative research. Cronon's (1993) questioning of the construction of wilderness became a material reality for me. Popularly, wilderness is thought as an area that has not been significantly altered by human activity. Seemingly, the two rivers fit the binary of the wild and corrupted; Tornionjoki is nearly at its

'natural' state while Kemijoki is a heavily modified river. However, I would argue that from these landscapes it is the valleys and shores of Tornionjoki that are more 'human'. Paradoxically, especially the areas most affected by human activity in Kemijoki are the ones with practically non-existent human engagement. As a power plant only needs one or two people to run it, these landscapes are practically overtaken by the non-human elements of nature. Due to the lack of human engagement in the landscapes it could be argued that the modified Kemijoki is 'wilder' than the rapids of Tornionjoki that are exceptionally 'human' in terms of the amount of engagement in the landscape.

Indeed, it becomes apparent that conceptualizing things into binaries is not useful - places do not 'fit'. Each of these landscapes is, in its own way, both 'natural' and 'cultural'. What we frame as 'wild' in our discourses and minds is thus rather easily contested. Although these assumptions of wildness are powerful and thus matter, I began to question if the concept of wilderness is the one of crucial importance here. I started to wonder back to the concept of agency. Through my investigations in the archives and in the field, what seemed to be in common was the tendency to experience sublime and sentimental encounters with the elements of the landscape people thought of having agency. Through my research I was able to identify that Tornionjoki and the old Kemijoki are perceived as active agents, whereas the heavily modified Kemijoki of today is discursively 'dead'. At the same time it is Tornionjoki that is engaged with recreationally and celebrated in different ways, whereas the engagement with the heavily modified sections of Kemijoki is almost non-existent. It is thus possible to ask: are we affected by elements in the environment that we perceive as having agency? In other words, when materiality seemingly loses control over itself, does it also lose the ability to affect us? This will be discussed further in the following chapter.

Chapter 6: Non-human agencies - new geographies

'Complex systems are alive with process. They are restless and unsettled' (Jones et al, 2012: 81).

What is the place of the non-human in river landscapes and what is the place of 'human' in a non-human world? How does one pin down the agency of the non-human, its capacity to act and affect? And what happens to the agency of the river when it is modified? Asking these types of questions may prove useful for both academic geography as well as the wider environmentalist movement as means of re-framing human-nature relationship. However, it might be difficult to assess such questions in a traditional academic sense. As discussed earlier in Chapter 2, post-humanist artistic methods may have potential in addressing these themes (Dillon et al, 2012; Dixon et al., 2012a; Dixon et al., 2012b). I experimented with such practice through my photography project. Here, through the lens of the camera a glimpse is offered that closely reminds us of our own – yet this is a gaze that is 'inhuman', a technology mimicking the eye of a fish. Such an inhuman lens gave me the possibility to imagine a gaze from within, but the project also turned into the inspection of self and my place in these landscapes. What did I become through submerging the camera and the hand into the water? How much human was there left in me as my gaze morphed into a lens? In this chapter I will highlight the capacity of the environment to act as well as affect in a form of a photo essay. In re-thinking the human-environment relationship, discovering non-human agency has the potential to evoke new kinds of ethical considerations.



Figure 6.1: (Own picture, 2015)

Chasing after a moment of clarity I look at the river, only to see my eyes reflected from the surface of the water. I sit by the river for what feels like a lifetime and forget my purpose for being here. The concept of my name feels bizarre. An eye is staring back at me, made from

floating water and rays of sunlight. Am I alien to you like you are to me? Or are we intertwined in this unfolding moment? I wonder whether it is you thinking in my head as well as me. An assemblage of non-human, material things; sediment, water, plants, light – does it become a being capable of inspiring our thoughts and influencing our behaviour? In academia, attention is now increasingly given to the agency of the non-human and its capacity to affect. Indeed, Jones and Cloke (2008: 79) argue that ‘denial of non-human materiality is both deluded and potentially dangerous’. I would further suggest that only labelling certain aspects of the environment as having agency and denying it from others is potentially harmful. Generally, non-human agency is afforded to the technological (Jones, 2009b), but when talking about landscapes it seems that only the wild could have a ‘mind of its own’. From my findings it appears that people only tend to allow agency to the nature that is unchanged, not to the nature that is ‘executed’ by the human hand. We understand this crude natural as sublime and alive, and the altered as corrupted and reduced.

Water used to flush over us, beating the bones of this land. The memory is engraved in every inch of our body. For us it is just a blink of an eye. A moment of rest in the sun now, a shower of rain. Exposed scar on the surface of the Earth, gazing up with nothing between us and space. Time unfolds above us.⁵



Figure 6.2: (Own picture,2015)

This hollow silence aches my bones. The memory drowns my dreams with opening floodgates and crystal clear water. I lie down beside the riverbed and I lie there for so long that I feel as though my bones are growing to be a part of its skeleton. I wonder, why is it that we determine landscapes dead by our hand –

⁵ Italics used to emphasise the imagined non-human perspective

is that not just another form of celebrating the human intellect and ability, like Cronon (1993) suggests? To imagine that we are capable of slaughtering the environment, do we not become gods, terrible gods? Declaring modified landscapes as not worthy of appreciation is hardly a productive approach on a planet where majority of landscapes are in fact modified to a degree. Instead evoking new imaginations of modified landscapes and allowing agency back to places that we declared dead could begin to modify our perception of the world. Giving new meanings to 'lost' landscapes, approaching change in therapeutic ways, potentially through artistic collaborations... Perhaps recording the sense of loss in heavily modified landscapes might create a platform for new engagements and meanings.

Sometimes we tell tales of the skies that we have crossed in our never ending cycle. Waves fly with birds and airplanes. What do we know that you do not, familiar pair of eyes? Have we not been in this place together, year after year? Have we not taught you everything we know? You can see the answers lying beneath your feet, before your eyes, in every cell of your body.



Figure 6.3: (Own picture,2015)

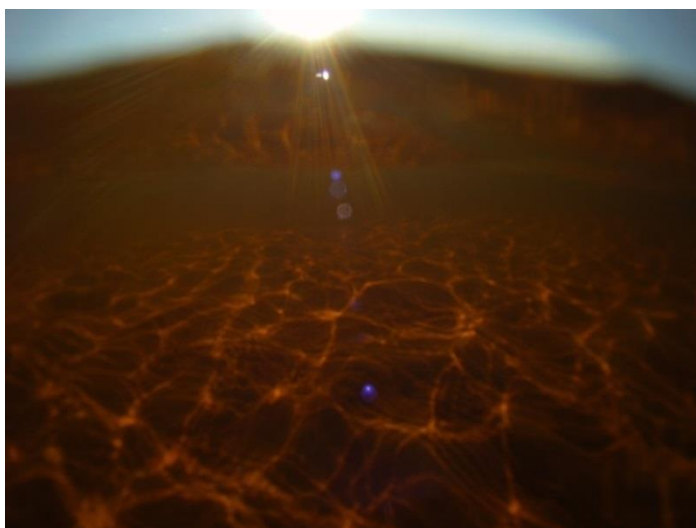


Figure 6.4: (Own picture, 2015)

Through different methods of researching and communicating we might begin to understand that the non-human and the human are so closely entangled in landscapes that the binaries of our Western ways of knowing start to dissolve (Wylie, 2007). Culture and nature become emergent from the same fabric of

the world rather than from entirely separate spheres. Is it blood or water that runs through my veins? Is it blood or water that runs through the land? The river brought life here like an artery of the north. I am of the river. Once again I wonder where the wave ends and the body begins. I open my eyes in the blariness of the water. Eyes that are not meant for this unfamiliar domain. How is a world so familiar so strange, or is it me who is the stranger? I feel like I am no longer the one watching, but am being watched.

You may think that you are alien to us. But is that not just your mind playing games with you? Do you not remember the way we caressed you small wrinkly toes and eased your mind when you had no words to confuse you? Would you not rather come back to us?

If the line between the human and the non-human becomes blurry, does it validate our actions as emergent from this world? Does dissolving the binary of nature and culture de-demonize environmental exploitation and authorise whatever we might set our minds onto? While that might be a matter of concern to some, in dissolving the gap between the human and the non-human, agency becomes a more-than-human quality. And through agency, ethical considerations become crucial. Once nature ceases to be inert, it is impossible to regards ethics as a purely human issue. And like Jones (2009a) suggests, this is when we start to focus on entanglements of nature and culture, some of which are harmful, some of which harmonious. Rather than dividing the world into unhelpful binaries,

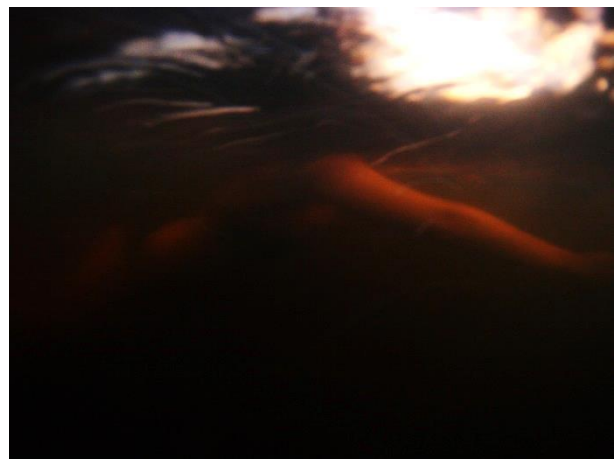


Figure 6.5: (Own picture,2015)



Figure 6.6: (Own picture,2015)

good entanglements of nature and culture become our focus, both in discourses and in the material world. But for such change in our ways of knowing to take place, new ways of communicating knowledge and non-human agency are needed. Perhaps it is time for

the researchers to find new ways of becoming the researched, submerging an inhuman lens into the object of their study.

Chapter 7: For landscapes after nature/culture

In this study I set to explore how landscapes have a capacity to affect us and how that capacity might be made use of in environmental management. Further I wished to investigate how we seem to be more affected by landscapes that we frame 'wild' than those we think of as 'tamed'. Through discourse analysis and direct engagement with the landscapes I was able to form an idea about the affective relations and post-human agencies at play in the two river landscapes. What became abundantly clear is that discourses not only shape how we think about the world, but also how we act upon it. Kemijoki is declared to be 'lost' and hardly any productive engagement with the heavily modified sections of it exists. Meanwhile, Tornionjoki inspires sensuous engagements which resonate with the imaginations of a living river. This may partly be because of our cultural preference for the 'wild' – a preference that is rather easily contested in the context of these rivers.

Hence, regarding Kemijoki as lost while Tornionjoki is seen as a nurturer of identity and engagement might also relate to with how we understand and negotiate non-human agency. While academia has suggested that agency is often seen as a purely human quality (Jones, 2009b; Knappet and Malafouris, 2008; Cronon, 1993), this study has demonstrated that when it comes to landscapes, we seem to allow agency to the elements of nature that are untouched by human. Tornionjoki and the old Kemijoki are thought of as active agents modifying their environment and affecting the lives of people around them, while the 'tamed', new Kemijoki is seen as lost, or indeed dead. It seems that when the river loses control over itself, it also loses the ability to affect the humans dwelling around it. While it is too simplistic to regard some aspects of the environment as 'alive' and others 'dead', as exemplified by my own engagement in the landscapes, the living river and the lost river seem to be particularly strong narratives in the context of these two rivers. It is thus possible to ponder if we are only affected by the elements of the environment that we *perceive* as having agency.

It seems that in order to have a meaningful relationship with the environment, it is vital to acknowledge the more-than-human agency of landscapes. The concept of agency is a key idea in deconstructing the nature/culture divide and explaining the affective

capacity of landscapes. To acknowledge the affective capacity and agency of the environment is a constructive step for a better management of the environment. When we acknowledge the vitality and agency of the non-human, nature ceases to be inert and we are forced to re-think ethics as a more-than-human concern (Jones, 2009a; Jones, 2009b; Whatmore, 2002). The first step is to acknowledge the autonomy of the untouched nature; and due to its ability to inspire wonder, it is the untouched nature that is most often granted our affections and protection. But living on a planet where most places are touched by human influence, there is a need to extend our sensibilities and affections to the nature that has been altered, moulded and made fragile by anthropogenic processes. As Worpole (2010: 66) notes, 'there is now an urgent need to interpret and value contemporary landscapes anew, especially those that resist traditional categories of taste and approbation'.

When we recognize that nature and culture are emergent from the same fabric of the world, we become part of the planet's 'non-humanness' and post-human processes that take place within complex affective relations. Thus, dissolving the nature/culture binary de-demonizes human action, but it also allows agency to the non-human. As a result, we can see the world in terms of destructive and desirable entanglements of nature and culture, and encourage entanglements where they can co-exist harmoniously. As Jones (2009a) argues, this might be a slippery ground to stand on, but it is a hopeful slipperiness that has the potential to enter the world *after* nature and *after* culture where desirable entanglements form the base for our considerations.

I have argued that post-humanist methods may have potential in highlighting the agency of the non-human. The dialogue between art, science and philosophy could communicate environmental issues and invite people to re-think their engagement with landscapes (Dillon et al., 2012; Dixon et al., 2012a; Dixon et al., 2012b; Selman et al., 2010). Art projects exploring the post-human elements of the river are already happening in Tornionjoki, possibly due to its ability to inspire such imaginations. Perhaps similar projects in modified landscapes could act as a way of giving new meanings to places, or even function as a therapeutic way to approach the change. A wider discussion on interdisciplinary collaborations of art, science and philosophy could form a fertile ground for new approaches to the human-nature relationship. As Dixon et

al. (2012b) suggest such dialogues act as an invitation to thought, which is necessary if we wish to reconsider our ways of being with nature. Yet further research into how such post-humanist accounts might capture the imaginations of the public and question our traditional ways of sense-making is needed.

For me, approaching river landscapes with an intention not to 'measure' and 'analyse', but to listen and be aware was a way to negotiate deeply engrained presuppositions. I engaged with the affective realms of the landscapes, becoming less human with each realisation of the non-human agencies around me. Approaching rivers or landscapes in general in such way may allow us to take a small step back from mere representation; through the process of being affected the landscapes speak in our actions. To claim that our thoughts, feelings and actions are a sheer product of cultural processes is to dismiss non-human agency, agency without which our bodies would not exist. Rivers, those that flow free and those that have been dramatically altered by humans, are actors in the affective processes taking place between bodies. They inspire our imaginations and gather our affections, sometimes loudly, sometimes silently. In order to exist harmoniously with rivers we need to understand that we are emergent from the same fabric of the world; how we treat rivers is also projected onto ourselves.

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