Translating Climate Change Adaptation to Local Context and Practice



The case of floods and landslides in Rwanda

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Abstract

The purpose of conducting this study was to analyze how forced expropriations and the demolitions of informal settlements could fall under the umbrella of "climate change adaptation" measures. Using an actor-network lens and translation theory, these translations are systematically broken down between three distinct levels: global discourse, national discourse, and implementation. As the idea of adaptation is translated between different actors and networks, it is given context-specific meanings that socially construct adaptation to fit the interests of said actor-networks. Who gets to decide how to problematize and subsequently implement adaptation depends entirely on the political process. The case of landslides and flooding in Rwanda was used to conduct a qualitative single case study to explore this phenomenon. Discourse analysis methods, with the help of Nvivo, were used to derive and analyze the data. Analysis of the data showed how both the global and the national networks use an applied view of adaptation to legitimize their power, reinforce one another, and assume roles as agenda-setting networks within their own respective spheres of influence. More importantly, the data revealed the power imbalances between the global and the national networks, as well as between the national network and the people being impacted by expropriations. These inequalities are what open up the spaces to allow human rights violations within the framework for climate change adaptation.

Keywords: climate change adaptation; floods; landslides; Rwanda; translation theory

Word count: 10.024

Table of contents

1	In	troduction	1		
	1.1	The space between global discourse, policy, and practice	1		
	1.2	Case study – Why Rwanda?	1		
2	Re	esearch question and purpose	3		
	2.1	Research question, aim, and objectives	3		
	2.2	Scope	3		
	2.3	Purpose	4		
3	Literature Review				
	3.1	CCA as a global discourse			
	3.2	CCA and Human Rights in Rwanda	7		
4	Th	neoretical Framework	9		
	4.1	Translation theory (within actor-network theory)	9		
	4.2	Connecting translation to adaptation	10		
5	M	12			
	5.1	Research design	12		
	5.2	Materials	12		
	5.3	Collection	13		
	5.4 5.4	Analysis4.1 Discourse analysis			
6	Li	mitations	15		
7	Ar	Analysis			
	7.1	Problematization – framing problems and solutions	16		
	7.2	Intéressement and Enrollment – becoming indispensable	18		
	7.3	Mobilization – the process of silencing others	21		
8	Discussion				
a	C	anclusion	20		

10 References	30
11 Data collection sources	33
Appendix	36
List of Abbreviations	
ACP African, Caribbean, and Pacific group of states	
ANT – actor-network theory	
CCA – climate change adaptation	
CCCM Camp Coordination and Camp Management	
CDA – critical discourse analysis	
DRR – disaster risk reduction	
FONERWA – Fund for Environment and Climate Change	
GCCA – Global Climate Change Alliance	
IFAD – Fund for Agricultural Development	
MIDIMAR – Ministry of Disaster and Refugee Affairs	
MINEMA – Ministry in charge of Emergency Management	

MININFRA – Ministry of Infrastructure

SDGs – Sustainable Development Goals

NST1 – National Strategy for Transformation 1

UNEP – United Nations Environment Program

UNFCCC – United Nations Framework Convention on Climate Chang

MoE – Ministry of Environment NCP – National Contingency Plan

RPF – Rwandan Patriotic Front

1 Introduction

1.1 The space between global discourse, policy, and practice

The space between global discourse and national policy and likewise between policy and implementation leaves a lot of room for many different interpretations. How an issue as abstract as climate change adaptation is problematized into a specific context can have radical implications for the lives of the people who are perhaps the most vulnerable to the negative effects of climate change.

I began thinking about these themes during my time interning at the Swedish Embassy in Kigali. One of the topics heavily discussed was the forced resettlement and demolitions carried out by the government as an adaptation strategy. These drastic measures were explained as a response to recent occurrences of flooding and landslides; preventative measures to ensure human safety when more rain came. Understanding how these violent practices have come to fall within the framework of climate change adaptation is what this study will focus on.

1.2 Case study – Why Rwanda?

It is difficult to characterize present day Rwanda without recognizing the tragic past that impacts every social, economic, and political aspect of society. The 1994 genocide against the Tutsis was the culmination of decades of structural discrimination and civil unrest that resulted in the loss of approximately one million lives (Ndahiro 2014). The path of reconciliation and reconstruction has been spearheaded by Paul Kagame, sitting president since 2000 and former leader of the Rwandan Patriotic Front (RPF). The RPF has characterized their movement as the liberators of Rwanda and as the only ones capable of building up a modern state (Beresford, Berry, and Mann 2018:1234). Since then, the government has pushed forward "good governance" measures and anticorruption reforms while maintaining steady economic growth and substantial improvements regarding child mortality and primary education (Friedman 2012:256; Rwanda – Overview 2020). However, this peace and stability has come at the cost of individual freedoms, with the government exercising a tight control on the economic, political, and social rights of its citizens (Lyons 2016). This control materializes in

constriction of the media and civil society, suppression of dissent, and single-party domination within the government, essentially making Rwanda an authoritarian state (Beresford, Berry, and Mann 2018:1235).

Geographically, Rwanda is a small landlocked country located in the great-lakes region of central Africa with few discernable comparative advantages. It is currently the home of approximately 12 million people and is predicted to reach 16.3 million by 2032 (UNFPA 2017). Renowned as the "land of a thousand hills", Rwanda is among the two countries in the world that are most susceptible to water erosion due to it's abundance of steep slopes and intense rains (Nambajimana et al 2019:3). This factors into why Rwanda is classified as "highly vulnerable" to the impacts of climate change (BBC 2020).

During 2019, 110 people were killed by landslides and flooding. On top of that, 232 people were injured, and 4,891 houses were damaged (New Times 2019). One of the adaptation measures being carried out by the state are controversial expropriations of the urban poor from informal settlements for the sake of "saving lives". The motives behind these actions have been questioned by critics and human rights organizations, and beg the question: how does demolishing the houses of impoverished communities fall under the globally recognized umbrella term known as climate change adaptation?

2 Research question and purpose

2.1 Research question, aim, and objectives

How does the global discourse of climate change adaptation (CCA) translate into the policy and practices of Rwanda regarding landslides and floods?

The aim is to connect the dots between the global discourse on adaptation, national policy, and subsequently into practice in the context of landslides and flooding in Rwanda. The "practice" in this case means the implications that the discourse has on the everyday lives of Rwandans and particularly on expropriation and demolitions.

The objectives are as follows:

- 1. Connect the global conceptualization of CCA to the discourse at the national level in Rwanda by identifying the moments of problematization, intéressement and enrollment.
- 2. Identify the mobilization process by analyzing the implementation of displacement and silencing at the local level.

Problematization, intéressement, enrollment, and mobilization are the four "moments of translation" outlined by Callon (1984) within the context of Actor Network Theory (ANT). These moments will be discussed further in the theoretical framework.

2.2 Scope

This study is not comparative in nature. The analysis of the data didn't focus on normative themes, nor does this study make any value-judgements on the science behind climate change. Rather, it attempts to explore how knowledge and science are constructed and how actions are legitimized by the discourse these constructions inhabit.

The focus is primarily on the politics of flooding and landslides, since implementation of adaptation measures surrounding these disasters are concrete and highly contested by human rights organizations.

Being a single case study, the aim is to delve deeper into the specific context, regardless of how representative the case may be to other contexts (Bryman 2012:550). However, the theoretical implications that reveal themselves in the analysis of the data could potentially offer broader generalizations.

2.3 Purpose

This topic matters because the concept of climate change adaptation has become a part of the global framework for fighting and mitigating the effects of climate change. The inequalities inherent in the global and local adaptation networks create the spaces where translation goes awry. This has specific policy and practical implications on developing countries who are most vulnerable to the negative effects of climate change. The topdown nature of adaptation discourse and policy begs the question of how the people who are most affected by these policies experience them based on how it translates into practice. The social construction of vulnerability on the part of the powerful actors who make up the Rwandan CCA network has given way to human rights abuses in the name of adaptation. This approach can be traced upwards to the global CCA network, which is why the concept of adaptation can be so problematic. These concepts are touched upon in the literature review and the theoretical framework and will contextualize what CCA can mean to respective networks and how these interpretations can materialize. A systematic analysis of these interpretations and materializations is vital to address gaps and ensure that human rights are not compromised in the process (Iyalomhe et al 2013:369).

3 Literature Review

The literature review details the conceptualization of climate change adaptation (CCA). It begins at an abstract level and narrows down into the context of developing countries and finally into the context of Rwanda. Main findings from the literature review point to an undertheorization of adaptation using a social constructivist view. Further needed is a systematic analysis that follows the chain of translation from the global level down to human rights abuses.

3.1 CCA as a global discourse

The definitions of what CCA actually is varies between and within disciplines depending on how "adaptation" is framed in different contexts (McEvoy 2013:283).

"Climate Change [adaptation] has the contours of a grey box or boundary object, enjoying enough stability to acquire commensurable meanings in-between social worlds, but enough flexibility to accommodate the concerns of political and economic elites, NGOs, mass media, and public constituencies." (Blok 2010:906)

In social sciences, there are two distinct strands of thought which greatly impact how CCA is translated. The first strand is an applied approach to CCA, which views adaptation simply as a response to the adjustment or predicted change of an ecosystem's natural state and character (Weisser et al 2014:112; Iyalomhe 2013:369). This view also implicitly assumes that there are optimal ways to achieve "successful" adaptation. This is the strand of thought employed by the majority of global climate institutions and impacts their respective goals and policies they produce. Examples include the UNEP's global adaptation network, the global adaptation goals underlined in the Paris agreement (2015) and the climate conference in Bonn (2017), the SDG's (2015), the Sendai framework (2015) for action, and the World Bank's (2019) action plan on climate change adaptation and resilience. The majority of CCA literature has utilized an applied view, resulting in the "apolitical", linear, conception of formal policy and planned actions in response to biophysical changes (Smit and Pilifosova 2001).

The second strand of thought is a response to applied CCA, namely a social reproductionist view. This view argues that detaching CCA from the social opens the door for different groups to appropriate climate issues in the interest of specific ideologies. This appropriation is further legitimized by the occurrences of natural disasters which can be associated with scientific findings (Weisser et al 2014:116-117). Social reproduction strands of thought therefore aim to combat the idea that

vulnerability is determined by nature as opposed to societal structures and political economies (Eriksen, Nightingale, and Eakin 2015:524). In other words, resettlement, property damage, and other negative impacts on livelihoods caused by adaptation to disasters shouldn't be seen as purely natural, but rather as the translations of CCA propagated by the political interests of powerful actors involved (Dodman 2008:67).

There's a clear consensus among scholars that research using a social reproduction strand of thought is lacking. As Eriksen, Nightingale, and Eakin (2015) state, adaptation research suffers from an "undertheorization of political mechanisms of social change and processes that serve to reproduce vulnerability over time and space" (Eriksen, Nightingale, and Eakin 2015:523). This gap in the research invites reflections on the ontology of CCA and how this translates into different contexts (Weisser et al 2014:117).

3.1.1 CCA in developing countries

Once the global climate networks came to the consensus that climate change threatened economic growth and poverty reduction, development practitioners began incorporating adaptation discourses into policy (Block 2010). Adaptation discourses have become prominent in international development and are being mainstreamed into development policy all over the world (Weisser et al 2014:111; Ayers et al 2014). This becomes problematic given the incentives to legitimize agendas or gain funding by labelling a particular project as an adaptation measure (Ayers et al 2014).

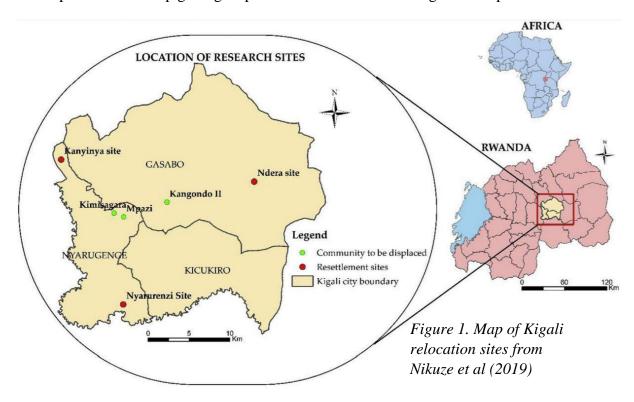
Failures in adaptation are theorized as a lack of material capacity and the result of "under-development" (Ayers et al 2014:293; Kashaigili, Rajabu, and Mosolwa 2009). This has in turn led to an impact-based approach to adaptation that relies on tech-heavy interventions and building the material capacity of states (Ayers et al 2014:294). Examples of this would include building dams, irrigation schemes, installing bio-gas energy systems in schools in Bangladesh, or building river catchments in Tanzania (Ayers et al 2014; Kashaigili, Rajabu, and Mosolwa 2009:220; GCCA 2016:39-40). Consequently, the research revolving around CCA in developing countries is concerned with reviewing the effectiveness and results of such interventions.

Similar to the global focus on applied CCA, this approach situates vulnerability outside of the scope of socio-economic and political factors. This leaves a large gap in the research regarding human rights. The research consistently lacks a critical assessment of the linkages between adaptation in developing countries and global CCA discourse despite the evident connections between the two (Gebauer and Doevenspeck 2014:98).

3.2 CCA and Human Rights in Rwanda

Adaptation in Rwanda has mainly taken the form of "building resilience". This shift in language is an attempt to frame climate change and vulnerability with positive connotations (McEvoy 2013:280). This claim is supported by a study by Weisser et al (2014), which analyzes how adaptation is translated into the context of Africa and uses Rwanda as one of the cases. One of the conclusions drawn in the study was that the Rwandan state prefers to frame CCA as resilience building because the term is more active; matching Rwanda's "authoritarian, state-driven development approach" (Weisser et al 2014:114). The state tries its best to limit and contain foreign influences on domestic resources in order to independently create policy, climate or otherwise (Weisser et al 2014:114). Weisser et al's study (2014) observes the need for introspection of the north-south dynamics these translations have (Weisser et al 2014:112). Another study by Gebauer and Doevenspeck (2014) focused on reforestation as a translation of CCA in Rwanda. In this case, reforestation and soil erosion were the natural factors being reproduced by the state to justify the expropriation of residents. They detailed the historical origins of the construction of soil erosion in Rwanda, showing a pattern of forced resettlement under the guises of different names (Gebauer and Doevenspeck 2014:98).

Another article, written by Nikuze et al (2019) examines the impact of forced resettlements in the Kigali area by conducting interviews and focus group discussions (Nikuze et al 2019:38). This study was conducted because of the increasing prevalence of city modernization or beautification projects in rapidly urbanizing cities in Africa. These projects typically target informal settlements and have the greatest effect on the urban poor who ends up getting displaced for the sake of housing redevelopment



projects. Nikuze et al (2019) constitute that many developing countries believe that removing informal settlements will help build up the city image and attract investments (Nikuze et al 2019:39). In Kigali, the informal settlements targeted for clearance, in accordance with the Kigali Master Plan that was released in 2013, are all centrally located. One such informal settlement is set to be transformed into a high-end residential area to house upper-middle class households (Nikuze et al 2019:40). Demolitions of the buildings were further justified by city officials by citing climate change concerns, deeming the areas to be "high risk zones" for flooding or landslides (Nikuze et al 2019:43). The study concluded that households that were subjected to the relocation endured psychological, physical, and economic strains both before and after the resettlement took place. Some of the challenges commonly faced were loss of livelihood, homelessness, loss of common property resources, social divisions, food insecurity, health issues, anxiety, and marginalization (Nikuze et al 2019:39).

The previous sections of the literature review revealed gaps in terms of analyzing the chain of global discourse of CCA all the way down to reality. Based on the review of the literature concerning Rwanda, it is clear that additional research is needed concerning the connections between the human rights abuses happening at the level of implementation and the conceptualization of adaptation happening at the national level. The studies by Weisser et al (2014) and Gebauer and Doevenspeck (2014) lay the theoretical groundwork for the conceptualization of CCA as a travelling idea and the study by Nikuze et al (2019) highlights the human rights abuses that are being justified as adaptation measures. Applying an actor-network approach to the human rights violations demonstrated in the literature, and then systematically working up to the global level would be a valuable addition to the existing literature.

4 Theoretical Framework

It became clear after reviewing the existing literature that the theoretical lens for this study needed to be grounded in social construction and take into account the realities created by a plethora of actors. This chapter goes into depth on translation theory and its application to CCA in the context of this study.

4.1 Translation theory (within actor-network theory)

Translation theory is the theoretical perspective used to conduct the research, disseminate data, and analyze results. I am particularly focusing on translation as conceptualized within actor-network theory, which I deemed to be the best theoretical framework to analyze how ideas can travel and the steps in which they are translated from individual actors and networks into action.

Actor-network theory (ANT) revolves around understanding how networks come about, tracing relationships, and how they reach temporary stability (Cresswell, Worth, and Sheikh, 2010:3). Actors are defined as a "source of action", meaning that humans and non-humans alike can be considered actors and have agency. This agency however can only occur within the scope of possibility given by a constellation of other actors. The ANT lens thereby interprets reality as "actively performed by various actors in a particular time and place" (Cresswell, Worth, and Sheikh, 2010:3). In doing so, ANT provides a means of exploring dualisms such as action and structure, global and local, or nature and society (Murdoch 1997:357).

As the idea or concept moves between actors that have different understandings of what it means then those actors end up giving it context-specific meanings that modify the idea according to their interests (Weisser et al 2014:112). This means that translation processes are formed by the changing power structures and cultural contexts which produce a deviation from the "original" which exists in its own right (Gebauer 2018:15; Czarniawska 2008:95).

This idea of translation stems from the work of Callon (1984). Callon (1984) identifies four specific moments in the translation process that explain the modes that actors try to exercise power (Weisser et al 2014:113). These moments are problematization, *intéressement*, enrollment, and mobilization. None of these moments are necessarily bound to a specific scale or direction (Weisser et al 2014:117). To sum up how translation is used in this theoretical lens, it refers to all of the "negotiations, intrigues,"

calculations, acts of persuasion and violence" that actors use to gain the authority to speak for others using one voice in the political process (Callon and Latour 1981:279).

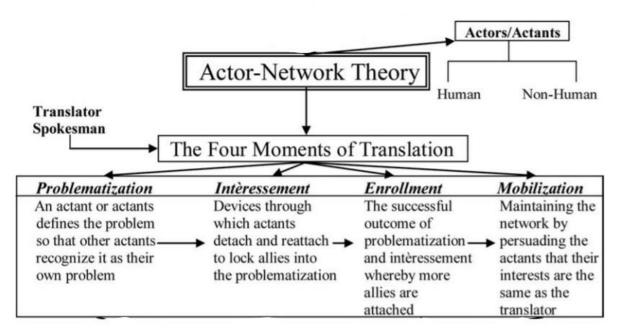


Figure 2. Four moments of translation according to Callon (Rhodes 2009)

4.2 Connecting translation to adaptation

Through translation theory's ontological lens, CCA cannot purely be explained as a response to the climate, but rather the reactions to dominant ideas, individual incentives, and funding (Weisser et al 2014:117). Epistemologically, interpretations of adaptation that take place in a context that is different from the origin of the conceptualization will produce a modification of that idea (Weisser et al 2014:117). It isn't a linear transplantation from the North to the South (McEvoy 2013:280). These translations are fluid and conceptualizations are temporary depending on the composition of the network that problematizes and eventually mobilizes it. What is seen as good adaptation by one network might be seen as mal adaptation by another, and politics is what determines which view is considered more "legitimate" in different contexts (Eriksen, Nightingale, and Eakin 2015:523).

Problematization is the process of certain actors defining a problem and providing a solution (Gebauer and Doevenspeck 2015:98). In this case the situation might be problematized as people dying from natural disasters. A possible solution is then to make people move from a steeply hilled area that are "vulnerable" towards landslides and flooding. How a situation is problematized greatly impacts the solutions, which are can have broad political implications. *Intéressement* is the process of getting other actors to jump onto the formulation of the problem, and enrollment is when the actors

attach themselves through negotiation of their roles. Mobilization is then when specific actors become legitimized representatives and reaffirm the network's problematization and solutions, meanwhile convincing all the actors within that they have the same interests. Taking a closer look at mobilization, this stage reveals the political nature of for instance floods. The actors left out of the network are muted while the representatives who are speaking "for their benefit" have all the agenda-setting power and capitalization on climate induced disasters and solutions; allowing them to frame natural disasters to legitimize the expropriation of vulnerable communities (Gebauer and Doevenspeck 2015:98; Callon 1984:216).

It is important to recognize the connection between interpretation and social construction. According to Foucault (1998), the discourse that is produced by these different interpretations establish what is "true" based on socially accepted knowledge production. Acknowledging the social construction of so called "natural" phenomena does not mean that the climate isn't changing, or that excessive rain doesn't lead to flooding. All it means is that there are multiple interpretations of these events and that the biophysical reality is intrinsically intertwined in the social (Feindt and Oels 2005:162; Weisser et al 2014:113). It is certain that alternative realities or rejections of the reigning problematization and interpretation of CCA present themselves in the data. In this study these manifestations of alternative realities or discourses reveal themselves in the implementation of policy. It is in the mobilization that groups are silenced, to the extent that they cannot control the narrative to influence actions. However, these groups are given platforms in the media and may resist the "truths" propagated by the national CCA network. It is in the statements from residents and other "silenced" actors that alternative realities come forward from the periphery, rebelling against the mainstreamed translation of landslides, floods, and expropriations.

5 Methodology

5.1 Research design

The study is designed as a qualitative single case study. Scheyvens (2014) states that qualitative research is especially useful when researchers want to explore interpretations and behaviors, both of which are key to answering the research question (Scheyvens 2014:60). Another characteristic of qualitative research is the inductive nature of qualitative studies, which begins with the observations and experiences of the researcher (Scheyvens 2014:61). I used a critical postmodernist ontological approach paired with translation theory. These are particularly well suited to use in tandem with one another given the postmodernist and translation theory's rejection of secure representations of reality outside of discourse itself (Punch 2005:139).

5.2 Materials

I categorized my materials based on which conceptual level of discourse they inform, global discourse, national discourse, and implementation. For the global discourse I examined four documents, a news article, a website page, and six videos. At the national level I analyzed six government documents/policies and three media reports. At the implementation level, I examined eight news articles from five different media outlets. In total these amount to 31 files (*see section 11*).

Government and policy documents are typically presented using 'matter of fact' language to imply scientific objectivity (Bryman 2012:550). Through the ontological lens of this study however, interests and power dynamics within respective networks need to be considered during analysis. Atkinson and Coffey (2011) refer to the ontological status of documents as a "document reality" which aren't direct representations of the underlying social realities of the institutions which create them (Atkinson and Coffey 2011). These documents create their own reality which should be analyzed in consideration of the implied reader audience and the context the documents were produced in. This "document reality" also takes into consideration intertextuality, which means that documents are linked to other documents since they refer to and respond to other documents (Bryman 2012:555).

Media reports and video content, like policy documents, will also present a specific reality or narrative. Unlike policy documents however, media reports can vary greatly in how they present themselves to the reader. Credibility can be an issue and authorship of articles can be unclear. A deeper understanding of contextual factors is also necessary to take into account when analyzing credibility and content (Bryman 2012:553).

5.3 Collection

Collecting data for my Rwandan network analysis, I looked for documents on the different government branch websites that had connections to landslides, flood management, or climate change. The government in Rwanda is pretty clearly structured into respective categories, the websites are maintained relatively well, policy documents are in English, and policy is available for download. The branches I found my material in were the MoE, MINEMA, and MIDIMAR. The most difficult part of gathering documents was determining which documents were relevant to the study, since Rwanda in general is very policy-heavy and produces a lot of official documents.

I collected data for the global discourse analysis after finding all of the material for the national discourse analysis. This way, I could see which international organizations or policies were mentioned directly. In addition to this, I searched for videos about CCA that were made by those organizations, or other organizations I was already familiar with.

Media reports have been collected by searching prominent news websites in Rwanda such as The New Times, KT Press, News of Rwanda, and the East African, for keywords like "climate change", "adaptation", "landslides", "floods", "expropriation", and "demolition". I used my search engine to find international coverage by entering these key words along with "Rwanda" and found articles by Reuters and the BBC.

Coding techniques helped me narrow down the information and discover recurring themes (Creswell 2014:247). These themes aided in identifying a larger discourse in the analysis (Bryman 2012:56). Although the literature review and theory gave some pretext to these themes, they were formulated through an inductive approach; first reading the documents, coding references that stood out in regard to the research question and objectives, then grouping together recurring codes into nodes that could be analyzed thematically (Bryman 2012:26). I used the software program Nvivo in order to save time and help me classify and organize my codes (Hilal and Alabri 2013). Using Nvivo was especially helpful when it came to websites and visual materials because a feature called Ncapture allowed me to turn websites into documents and create documents for transcription.

5.4 Analysis

Due to the qualitative design for this study, the analysis process is fundamentally about reducing the amount of data as opposed to preserving all of it (Bryman 2012:13). This process of zeroing in on the data will be done using discourse analysis. These analytical tools will help me aggregate the data so that deeper insights can be made on the results of the study. The process of analysis will be ongoing during data collection and the coding process will help me discover different themes which I can link to my research question and objectives. (Creswell 2014:245; Bryman 2012:13).

5.4.1 Discourse analysis

How environmental issues are shaped by policy and discourse impacts how those issues are dealt with. These formations run the risk of missing the mark regarding the people who are most impacted by the practical implications of respective discourse and policy and the social reality they construct (Feindt and Oels 2005:162). Critical discourse analysis (CDA) is especially useful when analyzing policy, particularly pertaining to complex policy that shapes the realities of so many people. In reference to critical discourse analysis, Bryman (2012:536) states that:

"Social reality is produced and made real through discourses, and social interactions cannot be fully understood without reference to the discourses that give them meaning."

Foucault (1998) maintains that discourse not only establishes what is "true" based on socially accepted knowledge production, but it is the space where power and knowledge meet (Foucault 1998:100). In other words, discourse is more than just the language that make up policy documents, it encompasses the construction of a social reality that can have real life implications (Bryman 2012:528). This is in line with the underlying ontological lens in this study.

Environmental discourses may at times have to compete with for example development discourses or economic growth discourses, while simultaneously being dependent on and interwoven with these discourses. Likewise, environmental discourse in the form of policy is dependent on other texts and policies which embed it into a social and historical context (Feindt and Oels 2005:162; Bryman 2012:538). I identified discourse by looking for reoccurring themes and language that depoliticizes adaptation since I had an inkling that I would find congruencies between the global network and the national network's discourse in regard to ontological perspectives. I started by looking for value-sum meanings and similar rhetoric between the global and national levels.

6 Limitations

Originally, I had planned on conducting interviews in person while I was interning at the Embassy of Sweden in Kigali. Due to the coronavirus and on the orders of the ministry of foreign affairs, I had to return to Sweden prematurely. This limited my choice of data collection methods and materials. A heavier reliance on document and media analysis compensated for this to ensure adequate triangulation of results. Although this shifted the angle of my study, this method eliminated the uncertainty that comes with online communication, interview logistics, and ethical considerations that have to be taken when speaking to people. When it came to online newspapers, I had trouble finding content from smaller local newspapers in English, which limited my media content.

The researcher is the main instrument regarding qualitative research which means that the quality of the results heavily dependents on that researcher's point of view and selected methods (Patton 2002:513). Rejecting a positivist approach to science entails acknowledging personal biases regardless of whether there is a qualitative or quantitative design. Choices of methods and design are inherently political and will only provide explanations for a small sliver of the social world being studied (Punch 2005:135; Scheyvens 2014:62). Spending time in Rwanda, my skin color and language made it apparent that I was not a native and that, in combination with the colonial history and current geopolitics, impacted the way I was received by the world surrounding me and how I perceived the country and the people in it. I acknowledge that my positionality and these circumstances had a significant influence on how I collected and interpreted data. I systematically and critically took these things into consideration throughout the process of this study.

7 Analysis

Referring back to the theoretical lens, translation is the process of actors negotiating and using persuasion to gain the authority and power to speak as representatives over others while simultaneously silencing the actors they represent. When analyzing the data gathered from the documents and videos of prominent actors, recurring themes revealed themselves in the discourse that show the tactics that the respective global and national networks use to legitimize their authority. The themes being discussed in this chapter will be grouped into three sections. The first section will focus primarily on the problematization process within the global and Rwandan CCA networks while the second section will analyze the *intéressement* and enrollment processes. The last section will narrow down to the mobilization process and the practical implications that these translations have on the implementation of CCA measures regarding landslides and flooding in Rwanda. These four moments won't necessarily happen in this specific order and there may be a bit of overlap due to how intertwined they are.

7.1 Problematization – framing problems and solutions

The first step is tackling the moment of problematization, which is taking place at two different scales: the global and the national. The themes that stood out were the usage of positivist language and the portrayals of good vs. bad adaptation used to problematize climate change and offer up solutions in the form of adaptation measures or "best practices".

Science – defining the problem

Disasters are broadly characterized as a consequence of climate change, and adaptation is seen as the measures that must be taken in order to protect people from the "inevitable" (GIZ 2012). Climate change is problematized as being caused by human consumption patterns, and words like "we" and "our" are used without specifying whose consumption, whether it be acknowledging the role of western industrialization or the responsibility of companies (UNFCCC 2014; GIZ 2012: 1.30-1.40).

"Adaptation is the invitation that we're being given to change behaviors and consumption and production patterns that we have had for 100-150 years that are simply no longer sustainable." (UNFCCC 2014: 2.05-2.21)

These claims defer to the "best available scientific knowledge" and "scientific methodologies" that point to likely scenarios and offer up solutions and "practical

guidance for implementation" (Paris Agreement 2015; United Nations 2015:26). Although alternative methods or "traditional knowledge" are acknowledged as a resource to fight climate change, these are presented as complimentary forms of knowledge production that should only be utilized when "appropriate" (Paris Agreement 2015:10; United Nations 2015:15). This in combination with other terms like "evidence-based", "non-sensitive", and "unbiased" sets the tone for a discourse that tries to eliminate the political nature of problematization from the equation and instead present cold hard facts (United Nations 2015; GCCA 2016).

"The approach was to produce inventories that are the result of an unbiased gathering of facts to be used in this evidence-based summary report." (GCCA 2016:20).

This document, produced by the GCCA, states that some of the main aims of the report are to help member states create evidence-based policies and identify best practices (GCCA 2016:36). The Sendai framework employs the usage of identifying certain data and information as "non-sensitive" (11 times) as a way to distance itself from the political ramifications of such data and how it shapes CCA practices (United Nations 2015).

This language is mirrored in the policies and documents produced by the Rwandan CCA network. The quarterly *Country Engagement Update* report, the *Social Protection Sector Strategy Plan* (2018), and the *National Risk Atlas* (2015), include "evidence-based" terminology to describe knowledge management, and justify policy formulations as well as Rwanda's approach for disaster risk reduction (MoE 2020; MINILOC 2018, MIDIMAR 2015). The *National Contingency Plan for Floods and Landslides* (2018) uses this sort of rhetoric to obscure the biases that frame the causes of disastrous outcomes and likely scenarios. For instance, "inappropriate farming and housing techniques" are identified as contributors to heightened risk. These claims are then backed up by risk profiles created by MINEMA and rainfall forecasts, made by the Rwandan Meteorology Agency; both government agencies (MINEMA 2018:6).

"The key issues and challenges identified include high population density... land degradation... irrational exploitation of natural ecosystems....". (MoE 2019:5)

When the problem is identified as "poor farming techniques" or "irrational exploitation" then this is met with solutions that will teach people how to farm "the right way" as opposed to addressing the issue of institutionalized poverty. This is yet another allusion to the applied approach seen within both networks.

Best Practices – offering up solutions

Adaptation interventions are presented as the main solution to the problem, alongside mitigation. These solutions are typically tech-heavy and are labelled as "best practices". Best practices have been deemed as "essential for adaptation" by the UNFCCC and are examples of solutions that have been effective in certain contexts (UNFCCC 2014: 8.42-8.48). Oftentimes, replication and adoption adaptation policy around the world is encouraged; especially in developing countries (GCCA 2016:39; UNEP 2020; Paris Agreement 2015; Global CCCM Cluster 2014:14). This is also the case for tools like standards, codes, science-based methodologies, operational guides, and other guidance

instruments that have been recognized as the correct or best methods by the global network (United Nations 2015:22). Most of the solutions recognized as "best practices" focus heavily on the usage of "climate-smart" technology and investments to achieve "successful" adaptation (OECD 2014). Examples include climate-smart agriculture (CSA) and climate-smart farming practices promoted by the GCCA and the World Bank in East Africa, floating pavilions in Rotterdam, wetland restoration, multi-hazard early warning systems, and modified maize drying shelters (GCCA 2016:66; World Bank 2019; The Economist 2015; United Nations 2015:16; IFAD 2019). The dissemination of these globally recognized technological solutions and standards to a national level is stressed in multiple documents (United Nations 2015:25).

"The hazard assessment and mapping of selected hazards (drought, landslides, floods, earthquakes and windstorms) used well-established scientific assessment tools and modeling techniques based on international best practices and standards." (MIDIMAR 2015:XVI)

It is clear that the dissemination of internationally recognized "best practices" and tools to the national level has been successful when analyzing Rwandan policy documents, as demonstrated by excerpt from the *National Risk Atlas* (2015) located above. The national *Environment and Climate Change Policy* (2019) also references international cases of best practices in depth, pointing out the potential to replicate Sweden's sustainable consumption and production model for building sustainable houses (MoE 2019:56). This is subsequently echoed in the media, calling for cost-effective technologies that will ensure "hazard resistant" housing (Mushaija 2014).

The characterization of adaptation as practices that can be worse or better, regardless of the context they are in, give full authority to whomever can label certain practices as "best". This is what the global CCA network has achieved and it's what national networks strive to achieve through association. This can become problematic when this terminology is translated from the global to the local network. "Apolitical" terminology is used at the local level to legitimize and justify adaptation that fits the interests of the actors within the network. This translation can differ significantly from the motives and interest in the global network, considering the kinds of actors that encompass them.

7.2 *Intéressement* and Enrollment – becoming indispensable

The problematization of adaptation is solidified and legitimized through the process of convincing other powerful institutions and organizations to adopt the same problematization; effectively incorporating those actors into the network. This process is called *intéressement*. Enrollment enables actors to make themselves indispensable to the network by contributing with a role. I decided to incorporate these two moments into the same section because they are closely related to one another. Themes identified in these processes are international cooperation, exchange, and expertise. Through these

mediums, actors will make themselves indispensable and gain a role at the cost of aligning their interests and translations with the network.

International cooperation

Successful *intéressement* entails convincing actors that they have something to gain by aligning their conceptualizations of problematization with the network. In the case of CCA actor-networks, one of the key benefits of this alignment is the international recognition and legitimacy that accompanies adopting the network's problematization. For nation states, this recognition can be used to leverage funding from international agencies or to legitimize themselves as an authority on national CCA issues. This relationship can be quite problematic due to implicit power imbalances between the global and the national.

"To achieve implementation, it is necessary:

To enhance access of States, in particular developing countries, to finance, environmentally sound technology, science and inclusive innovation, as well as knowledge and information-sharing through existing mechanisms, namely bilateral, regional and multilateral collaborative arrangements, including the United Nations and other relevant bodies" (United Nations 2015:25)

Likewise, actors within the global network such as the UN system are dependent on the recognition of powerful nation states in order to maintain their role as an authority on climate change and adaptation. Rwanda however, is not particularly powerful and the legitimacy given to the global network by Rwanda is only valuable in the context of Rwanda as a part of a larger community. This is what creates an imbalanced dependency from the part of Rwanda on the global network.

The Global Centre of Excellence on Climate Adaptation (GCECA) was initiated by the UN Environment with the support of governments from the Netherlands, Japan, and the Philippines. GCECA has forged partnerships with NGOs, governments, financial institutions and businesses, all in the interests of accelerating climate adaptation." (UNEP 2020)

This authority is typically exercised through the dissemination of technology, funding, or knowledge to the local level in exchange for cooperation and adherence on the part of developing countries to the global CCA discourse agenda. This trade-off is stressed at both levels; however, the focus varies depending on the context. The primary focus in the global discourse is on enhancing the capabilities of developing countries and exporting best practices to ensure that adaptation is sustainable in the eyes of the global network (Paris Agreement 2015:9). *The Sendai Framework* (2015) explicitly mentions the intent to support the priorities of developing countries in a "balanced, well-coordinated and sustainable manner, within their respective mandates", however it is understood in the discourse that these priorities still need to be within the framework of CCA measures recognized at the global level (United Nations 2015:15,25).

"There is a need to mobilize the capacity, the knowledge, the tools, the political and financial support, and the scientific expertise to increase resilience to climate change through adaptation." (UNFCCC 2014: 2.24-2.36)

Rwandan policy documents however put a larger focus on receiving resources and "strategic support" than knowledge sharing regarding international cooperation (MoE 2020).

"We expect all players ranging from Government Agencies, cooperating partners, the UN System, the Private Sector, Non-governmental organisations (Local and International) and those that are community based to be fully involved in the mobilisation of the required resources to implement the contingency plan." (MINEMA 2018:17)

This pattern can most likely be chalked up to the power imbalance between the global and local spheres of influence at play. Where the global network needs the nation states to buy what they are selling in order to maintain authority and propagate their problematization of CCA, the national network needs the funds and recognition of global entities to enforce implementation and practices locally.

"Rwanda invites developed nations and international organisations interested in supporting its green growth vision to contribute to the country's fund for the environment and climate change." (News of Rwanda 2014)

This quote is referencing Rwanda's green fun (FONERWA) that was launched in 2014. The call for "developed countries" to contribute to the fund shows yet another aspect of the underlying economic power imbalance. The majority of so-called developed countries are western and have arguably more agenda-setting power in the internationally recognized CCA organizations that comprise the global network. Rwanda's environmental policy also makes mention of international cooperation in the form of supporting Rwanda's endeavors and sharing technology and data to ensure effective adaptation measures in accordance with their national agenda (MoE 2019).

Creating roles – experts and authorities

Enrollment is closely tied together with the *intéressement* process because sometimes the modes of guaranteeing representation of respective interests is dependent upon the roles different actors are given. For instance, one of the main interests identified within the global network was the dissemination of knowledge to the national level. This establishes the global network as teachers, offering expertise on disaster risk management and climate resilience to developing countries through mediums like the *Inter-Agency and Expert Group on SDG Indicators* and the *United Nations Office for Disaster Risk Reduction Scientific and Technical Advisory Group (UNFCCC 2014)*. This secures the role of scientific institutions in the network because they are needed to provide expertise, which is only valuable if it is needed by actors such as Rwanda. So, by using the science produced by the global network, Rwanda is legitimizing them. Likewise, the global network legitimizes governments by acknowledging them as the primary entities responsible for "planning and implementing emergency response mechanisms" and protecting the people effected by disasters aggravated by climate change (Global CCCM Cluster 2014:11)

"Governments are the duty-bearers to protect populations at risk." (Global CCCM Cluster 2014:35)

This acknowledgement is problematic in the case of authoritarian states that have tight control over accountability and transparency. In the case of Rwanda, this total authority is expressed in veiled threats and gatekeeping the production of information about adaptation.

"The Government of the Republic of Rwanda will not take kindly to individual organizations that may choose to unilaterally carry out assessments and later on disseminate their findings without Government clearance." (MINEMA 2018)

The network in Rwanda is mainly comprised of government agencies which makes the division of roles within the national network relatively clear. These actors reinforce each other's authority and cooperate to ensure cohesive problematization and mobilization. The Ministry of Environment (MoE) has jurisdiction of wetlands and is responsible for conducting nationwide assessments on "erosion prone areas likely to be affected by floods and landslides" and on holding educational workshops of members of the private sector (Mugisha and Bishumba 2019; MINEMA 2018). Meanwhile, the Ministry of Infrastructure develops flood and landslide analyses, values properties that are set to be demolished, and sets building regulations for climate resilient buildings (MINEMA 2018; Mwanza 2018; Bizimungu 2020). The Ministry of Agriculture (MINAGRI) conducts assessments on "flood-prone" areas and the Ministry of Emergency Management (MINEMA) maps flood and landslide risk alongside the MoE (MINEMA 2018; Mugisha and Bishumba 2019). Identification of shelter for displaced people and implementation monitoring is conducted at the district level by disaster management committees (Mugisha and Bishumba 2019).

7.3 Mobilization – the process of silencing others

It appears that Rwanda has negotiated with the global network and acquiesced to their translation of the problem (in terms of policy) in exchange for the technological and financial resources needed to implement at the local level. The shift from the global to the national level however will entail a modified translation of the initial problematization of adaptation. This means that although Rwanda (on paper) is moving within the guidelines of the global translation of appropriate adaptation, implementation won't necessarily be in line with the problematization at a global level. It has become clear through analyzing Rwandan policy documents that this is the case, since I couldn't find mention of expropriation or demolitions as a form of adaptation in any of these documents. These mismatches can only really be addressed after they have occurred, which is what this section is about. The previous two sections have shown how networks construct "adaptation" through problematization, intéressement, and enrollment; this analysis has focused primarily on the first objective of connecting the global discourse to the national. Mobilization is the process of speaking for others and acting based on that constructed reality; this section is therefore more concerned with achieving the second objective of connecting national discourse to implementation in Rwanda.

CCA in practice

Analysis of media reports revealed a pattern of poverty production on behalf of the state through demolitions and forced expropriations. Most of these demolitions take place in informal settlements or "slums" and displace hundreds of households (Bizimungu, 2020; Gardner 2017; Mwanza 2018). One source reported that demolitions in informal settlements were prioritized over other wealthier areas, despite the appearance of similar risk (Gardner 2017). In the case of Kigali settlement Bannyahe, homeowners are being compensated with a single sum of 90.000 Rwandan francs (around 96 USD) in order to cover the costs of alternate accommodation for three months (Bizimungu, 2020). Even so, property owners have reported that they have yet to receive any sort of compensation for accommodation. Compensation for the actual buildings is yet another contested area, as the city intends on compensating property owners with newly built, sturdier houses, that are being developed in another part of the city (Bizimungu, 2020). Property owners however argue that their original properties have been undervalued by authorities (Bizimungu, 2020; Karuhanga 2018).

"People don't like to be expropriated by the government, because the government always underpays," said Dieye, the urban planner." (Gardner 2017)

City authorities valued more than 75% of houses in Bannyahe at under 10 million Rwandan francs (around 11,7000 USD) (Kanamugire 2018).

"I'm not in a position to say 'no' to any amount," said Mukamugara Josepha, an elderly widow who inherited her home." (Gardner 2017)

According to an article written in the *East African*, this is a common way for homeowners to generate income, hence the worries that a move to a smaller property would eliminate primary source of income. One owner estimated his three bedroom property at 30 million Rwandan francs (around 35.100 USD) and said he won't be able to make a living at the new property since it is smaller (Kanamugire 2018).

"In most cases, the rent is the sole income for many of the families in the slum, who depend on it to cater for their living costs, school fees and other expenses." (Kanamugire 2018)

Other owners have said that they would prefer to have monetary compensation over a new house so that they can make their own choices (Bizimungu, 2020; Kanamugire 2018). This is most likely linked to the fact that relocation can have an impact of available job opportunities.

"The bus fare from here to Nyabugogo is not the same as that from Busanza. How would you expect me to feed my children?" (Karuhanga 2018)

Tenants find themselves in an even worse situation that owners. Most people residing in informal settlements are only tenants who rent rooms and compensation is only given to the owners of buildings that have been granted legal permission to build on the land (BBC 2019; Mugisha and Bishumba 2019). Understandably, this greatly limits the amount of people who are entitled to claim compensation for alternate accommodation, and the people who won't get it are already the more impoverished out of the two groups. Many residents relay feelings

of hopelessness and fear, saying they have "nowhere else to go" and moving back to the countryside entails losing their jobs (Gardner 2017).

"The Executive Secretary asked me to go back to the village, but I cannot go home [Kayonza] because I don't feel safe there due to some family wrangles." (Mugisha and Bishumba 2019)

One resident stated that the reason why he moved to the slum in the first place was in search of work (Gardner 2017). The most vulnerable part of the affected population is being penalized for being poor. If you can't afford to own a house, then you won't get any monetary compensation or assurance of safe shelter until you can find another place to live. Efforts to convince people to leave voluntarily have been fruitless because of this very reason (Ngabonziza 2017). Now as hoards of people search for affordable housing, they are put at risk of others taking advantage of their desperation.

Although members of these targeted communities have been given a platform to voice their concerns in some instances, these concerns have not been incorporated into the decision-making processes (Karuhanga 2018). An urban designer commented that the demolitions lacked a participatory element to them, further marginalizing the affected population (Karuhanga 2018).

"I suspect the target population has not been well informed and involved enough perhaps because their voice is not valued, or the process lacks the right tools or time for that." (Malonza in Karuhanga 2018)

She continues on, stating that sustainable development "ought to allow urban inhabitants to access decisions that produce urban space". This sentiment can also be found within the global discourse.

"While the enabling, guiding and coordinating role of national and federal State Governments remain essential, it is necessary to empower local authorities and local communities to reduce disaster risk, including through resources, incentives and decision-making responsibilities..."

(United Nations 2015:13)

In theory, involvement in mapping and "empowering" local communities is a way of involving them in the process of building the network and impact the translation of the problem into reality (UNFCCC 2014: 17.54-18.18). Stress on inclusivity into the CCA network is lacking however in the national discourse. This is most likely a reflection of the authoritarian government, which has constrained the power and voices of human rights groups and other forms of civil society. The contradictions and mismatches found in these statements when juxtaposed with the national discourse reveal the alternative realities existing on the ground. The voices that have been "silenced" in the mobilization process still try to rebel and proclaim their truth through mediums that allow it (in this case the media). However, these examples of mismatches in reality are still constrained by the media reporting on them and the relationships these media outlets have to the national and global CCA networks.

Justification – Saving lives in high-risk zones

Many of the disputes over compensation for demolished houses between vulnerable populations and the government are grounded in how the government frames geography; property ownership is one aspect of this, whether it be distinguishing property owners from tenants or private property vs government property.

"By January 2020, compensation funds will be ready. However, people will not be reimbursed for the land because wetlands are government property." (Mugisha and Bishumba 2019)

Another aspect has to do with what constitutes a "risk zone". This is very much intertwined with the classification of certain populations as vulnerable since by this reasoning, people living in "disaster-prone" areas are more vulnerable to being affected by a landslide/flood. How these areas are constructed is political because a high-risk label on a piece of land gives the government justification to enforce drastic, and violent measures such as demolishing houses and forcefully evicting people who may not have anywhere else to go or have the legal rights to compensation.

In Kigali, targeting informal settlements for demolition is in line with the Kigali Master Plan that was released in 2013 (Kanamugire 2018). This plan outlines the path for Kigali to become the "Singapore of Africa" and intends on eliminating informal settlements within the capital by 2040 (Mwanza 2018; Gardner 2017). The fact that these areas are also "vulnerable" to landslides and floods is yet another reason to expropriate people. Critics question the motives behind the interventions, since plans to expropriate people have been in the making since the plan was released.

"They'll just put expensive houses here once we've gone." (Gardner 2017)

One type of area that has been deemed high risk for flooding are wetlands (Ngabonziza 2017). At the global level, wetlands are identified as areas that are "prone to flooding" and mainstreaming risk assessments and mapping is identified as a solution to prevent

human settlement (United Nations 2015:19).

Areas that are prone to landslides however are highly contested, since nearly all of Rwanda consists of hills and steep slopes. Hazard mapping and location-based risk maps are tools used globally to assess and categorize risk zones (Global CCCM Cluster 2014; United Nations 2015:15). Terms such as "high risk" and disaster-prone" are used extensively in both Rwandan policy and by officials in media reports as

justification to demolish buildings and expropriate people. These terms have their basis in the data that is produced by the hazard mapping technology.

GASABO NYARUGENGE KICUKIRO

Figure 3. Slope analysis topographical map of Kigali – from the Kigali Master Plan

Transparency however seems to be lacking within the policy documents on how exactly this technology is used in the creation of risk maps in the context of Rwanda (MIDIMAR 2015).

"... to generate the hazard zonation maps per district at a scale that is adequate for implementing on-the ground risk reduction interventions." (MIDIMAR 2015:161)

This justification is further enforced with language that stresses the importance of protecting vulnerable people and saving lives in the wake of landslides and floods.

"Authorities said demolishing the houses was about saving the lives of those living in wetlands..." (BBC 2019)

This rhetoric can be found in the National Contingency Plan as well, stating that the purpose of the NCP is to "minimize the loss of life" (MINEMA 2018). There are however no explicit mentions of expropriation in any of the policies or documents at the national level. Authorities have spoken out on the demolitions on numerous occasions, explicitly framing the demolitions as necessary measures taken to protect people who might otherwise be killed by "heavy rains" (Mugisha and Bishumba 2019; BBC 2019).

"Since Saturday, the small residential houses and shops that lined the road are being razed by the City of Kigali, in a move authorities say is aimed at protecting residents from dire consequences of the heavy rains that continue to pound the country." (Mugisha and Bishumba 2019)

As evidenced in the previous section, informal settlements have been prioritized and targeted for the sake of "saving lives", even when other interests from the side of the government are at play. The quest to save lives however is acknowledged at the global level and legitimizes the interventions of the state (Global CCCM Cluster 2014; United Nations 2015).

"Persons unwilling to leave should not be evacuated against their will unless such forced evacuation: (a) is provided for by law; (b) is absolutely necessary under the circumstances to respond to a serious and imminent threat to their life or health...." (Global CCCM Cluster 2014:29).

The first of the seven global targets listed in the Sendai framework calls for the substantial reduction of global disaster mortality by 2030 (United Nations 2015:12). Where the global network specifies the need to cater to vulnerable groups, the local network gets to define who is vulnerable to landslides and floods by conducting vulnerability analyses (MoE 2019:8). Vulnerability is more or less defined at the global level as the characteristics of a community or population that make it susceptible or disproportionally effected by natural disasters (Global CCCM Cluster 2014:19; United Nations 2015). Vulnerability analysis is yet another tool that is highly credited and depoliticized in the discourse; yet transparency in methods and data collection is lacking, much like hazard mapping.

Summary of findings

The analysis of problematization by the global and national network showed that a positivist ontological conceptualization dominated the discourse on both levels. This took the form of using scientific language to explain the formulation of the problem and the usage of "best practices" to describe successful adaptation as solutions to the problem. In terms of *intéressement*, it appears that the global network has succeeded in attracting the cooperation and recognition of many nation states including Rwanda. This is evident in the international cooperation between the two levels and the adoption of similar problematizations. In this case, legitimacy through recognition and increased capacity through resources appear to be the determining interests. Enrollment takes the form of enlisting experts and assigning roles. In the case of Rwanda, it is clear that the government has taken on a dominating role in the network, allowing them to construct reality through the problematization and mobilization processes unchallenged. This is reinforced by the global discourse that acknowledges the authority of nation states above all others in carrying out adaptation interventions. Finally, the analysis of mobilization revealed that informal settlements are being targeted for demolition first and that the people exposed to the most danger by these actions were tenants who will not receive compensation is any form. These people have no agenda-setting power and are effectively silenced by the Rwandan CCA network's legitimization process, citing "high-risk" zones and concern for human life.

8 Discussion

A key finding garnered through the analysis was that although there is a lot of media material confirming how authorities are framing expropriation as adaptation, none of these measures can be found in official policy or the discourse at a national level. Referencing back to the methodology section, this is an instance of a mismatch between the "document reality" and the reality being constructed by authorities during the implementation of expropriation (Atkinson and Coffey 2011). This implies that these actions aren't included in policy because of the intended readership of said policy. Considering the strong connections and mutual reinforcement between the global and national networks, it is safe to assume that the reality these documents are constructing doesn't include information that would be considered problematic at the global level. Human rights violations cannot be included in policy because that could entail losing the funding or the legitimacy that accompanies aligning your problematization with the global network. Eliminating expropriation from the written discourse is the only natural course of action, since including it could jeopardize the interests of the primary actors, in this case the Rwandan government. Rwanda needs to save face in this regard because of the inherent power imbalance between the global network and the national.

This also relates to the issue of community involvement. Where the global network makes a point of identifying communities as key stakeholders within the network, the Rwandan CCA network does not; indicating yet another power imbalance. I believe that this is where the translations differ the most in terms of how to problematize, who to involve through the *intéressement* and enrollment processes, and how to construct reality through mobilization and representation. Involving affected communities in the translation of the natural phenomena of landslides and floods would entail giving those actors the power to sway the problematization process. This could result in the current actors (the government) losing footing in how they produce the knowledge and subsequently the reality concerning these phenomena, allowing for ulterior motives or interests to come to light besides "saving lives".

Regardless of this key difference, the symbiotic relationship connecting the global network to Rwanda's network is clearly visible. Rwanda uses the same scientific jargon and positivist language touted by the global network to justify problematizations that in fact political. Meanwhile, the global network legitimizes Rwanda's actions by acknowledging them as the primary entity responsible for protecting people effected by disasters and implementing adaptation interventions (Global CCCM Cluster 2014:11). The caveat is that the global network's normative view of states demands community participation and doesn't take into account the modifications that are made to the idea of adaptation when translated locally. That is where the mismatches occur, and that is where human rights abuses fall between the cracks; all under the blanket term of

climate change adaptation. The broader implications of these findings call in to question the power imbalances between affected population and other national governments, and also power imbalances between the global discourse and developing countries.

9 Conclusion

This study has been a qualitative case study of the social reproduction of climate change adaption and followed the translation from a global level down to human rights violations taking place in Rwanda. The materials were split into three conceptual levels: global discourse, national discourse, and implementation. The data was derived using discourse analysis, with the aid of Nvivo. The theoretical lens guiding this study was translation theory, a sub-theory within actor-network theory.

In this study, two major networks are at play and two power imbalances preside over them. Both of these imbalances can be found within the contexts of the first and second objectives. The first imbalance is the unequal dependency and exchange between the two networks which can be observed in the intéressement process. Rwanda's problematization mirrors that of the global network's, taking a positivist applied approach that values "best practices" and the "best available science". Associating themselves with these terms and conceptualizations ensures the funding, approval, and recognition from the global stage required to implement interventions and have them be considered legitimate adaptation. Meanwhile, the global network needs other actors to accept their problematization of adaptation to gain power, but this is not dependent on Rwanda on an individual level. Rwanda's usage of scientific standards and guidelines are only relevant to the global network within the context of a larger collective, which means that the global network has much more leveraging power. The second imbalance can be found between the state (which dominates the network in this case) and the populations affected by these policies, whose voices are being silenced in the mobilization process. The interests of these people are not being represented by the national CCA network, which holds all of the agenda-setting power to do whatever they want as long as they classify certain areas high-risk zones and label demolitions as adaptation in the press. The inequalities in these two networks are what create the obstacles that CCA practices face in Rwanda today.

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Appendix

Codes:

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