



Utrecht University

**bc<sup>3</sup>** BASQUE CENTRE  
FOR CLIMATE CHANGE  
Klima Aldaketa Ikergai

# EU'S EXTERNAL CLIMATE GOVERNANCE

## THE ROLE OF DECENTRALISED COOPERATION AND MULTI-LEVEL GOVERNANCE IN CLIMATE ADAPTATION

By

Andrea Briones

July 31, 2020

**University College Dublin**  
**MSc European Governance**

School of Politics and International Relations

Sutherland School of Law

Supervisor: Dr. Joseph Lacey

Student ID: 18203134

[andrea.palomerobriones@ucdconnect.ie](mailto:andrea.palomerobriones@ucdconnect.ie)

**Utrecht University**

**MSc European Governance**

Utrecht School of Governance

Supervisor: Dr. Gijs Jan Brandsma

Student ID: 6561853

[a.palomerobriones@students.uu.nl](mailto:a.palomerobriones@students.uu.nl)

**Basque Centre for Climate Change (BC3)**

Edificio Sede 1, Planta 1, B/ Sarriena s/n, Parque Científico UPV/EHU

Supervisor: Dr. Elisa Sainz de Murieta

[andrea.briones@bc3research.org](mailto:andrea.briones@bc3research.org)

**Abstract:** The most recent decade has witnessed more frequent and severe impacts of climate change. These take various forms and affect people differently, but injustice and inequities baked into the global system are once again at the core of the challenge. The most vulnerable communities, which have usually contributed the very least to climate change and are beyond EU's borders, are the most affected ones and the least prepared to act. The European Union's climate governance should therefore comprehend territories beyond its administrative boundaries in order to *leave no one behind*. Through different instruments the EU is increasingly strengthening its position as a global climate leader, but soft tools of governance and the involvement of a wide variety of actors and levels of governance are necessary to effectively respond to this quest. The analysis of the synergies of MLG and decentralised cooperation is done to gain an overall understanding of the potential benefits of these approaches. The central objective of this research is thus to discern the advantages of applying these two key approaches to EU's external climate action, to see whether they might lead to reinforce EU leadership through reinforcing adaptation standards and coherence. Since a literature review was not enough due to the lack of data on the specific framework proposed, nine interviews with experts from relevant disciplines were carried out and their content analysed. The findings further point to the benefits of this approach although some challenges remain ahead. Multi-level and multi-actor governance are known to be applied for domestic challenges, but EU's external governance might as well benefit from such lenses. While complexity will remain a characteristic of global governance structures, EU's external climate (adaptation) governance would be strengthened if decentralised cooperation was applied as a complementary soft governance tool.

**Keywords:** Climate Adaptation, Decentralised Cooperation, European Union, External Governance, Multi-level Governance, Soft Policy.

*With gratitude to my supervisors at UCD, UU and BC3 for all their support, guidance and feedback, as well as to the interviewees who have helped me undertake this research.*

*I would also like to extend my deepest gratitude to my close friends for their unwavering support and constructive advice.*

# Table of Contents

<u>ABSTRACT:</u> .....	<u>1</u>
<u>LIST OF TABLES</u> .....	<u>4</u>
<u>LIST OF FIGURES</u> .....	<u>4</u>
<u>ABBREVIATIONS</u> .....	<u>5</u>
<u>1. INTRODUCTION</u> .....	<u>6</u>
1.1. CLIMATE CHANGE IMPACTS: PREDICTIONS ARE BECOMING VISIBLE .....	6
1.2. EU'S INTERNATIONAL COMMITMENTS ON CLIMATE CHANGE .....	8
1.3. RESEARCH OBJECTIVES: .....	13
1.4. STRUCTURE OF THE DISSERTATION .....	14
<u>2. LITERATURE REVIEW AND THEORETICAL FRAMEWORK</u> .....	<u>15</u>
2.1. MULTI-LEVEL GOVERNANCE: CROSS-LEVEL TIES AMONG A WIDE VARIETY OF ACTORS .....	15
2.2. DECENTRALISED COOPERATION: THE IMPORTANCE OF REGIONAL AND LOCAL LEVELS .....	18
2.3. THE SYNERGIES OF MLG AND DECENTRALISED COOPERATION APPLIED IN THE CONTEXT OF EU'S EXTERNAL CLIMATE GOVERNANCE .....	21
<u>3. METHODOLOGY</u> .....	<u>25</u>
3.1. CASE STUDY: GOVERNADAPT AS AN EXAMPLE OF CLIMATE CHANGE DECENTRALISED COOPERATION BETWEEN EU AND NON-EU REGIONS .....	25
3.2. CLIMATE GOVERNANCE THROUGH MLG AND DECENTRALISED COOPERATION APPROACHES.....	26
3.3. VALIDITY AND RELIABILITY .....	26
3.4. ETHICAL CONSIDERATIONS .....	30
3.5. LIMITATIONS .....	30
<u>4. DISCUSSION</u> .....	<u>31</u>
4.1. CLIMATE ADAPTATION: BOUNCING FORWARD IN THE FACE OF UNCERTAINTY .....	31
4.2. MULTI-LEVEL AND MULTI-ACTOR GOVERNANCE: THE IMPORTANCE OF NON-STATE ACTORS.....	33
4.3. DECENTRALISED COOPERATION: BUILDING FURTHER ALLIANCES TO STRENGTHEN CLIMATE GOVERNANCE.....	37
4.4. CLOSING KNOWLEDGE GAPS: MULTI-DISCIPLINARY RESEARCH AND BEYOND .....	41
4.5. GOVERNADAPT .....	43
<u>5. CONCLUSION</u> .....	<u>47</u>
<u>6. BIBLIOGRAPHY</u> .....	<u>51</u>
<u>ANNEXES</u> .....	<u>59</u>

## *List of Tables*

Table 1: Types of EU leadership .....	10
Table 2: EU's external governance <i>toolbox</i> .....	11
Table 3: Main challenges of climate adaptation .....	21
Table 4: Benefits and barriers at the different layers of governance .....	35

## *List of Figures*

Figure 1: Risk as the interaction of climate-related hazards with the vulnerability and exposure of human and natural systems .....	7
Figure 2: Possible dynamic interactions in global multi-level governance .....	17
Figure 3: A broad conception of multi-level climate governance .....	18
Figure 4: Evolution of decentralised cooperation .....	19
Figure 5: Synergies between MLG and decentralised cooperation .....	24
Figure 6: Three disciplines and nine interviews to validate the theoretical framework .....	27
Figure 7: Thematic analysis of quantitative data .....	29
Figure 8: Main narratives from the interviews & case study .....	31
Figure 9: <i>Governadapt</i> , a mapping exercise to contextualise the theoretical framework ..	44

## *Abbreviations*

DG DEVCO	Directorate-General for International Cooperation and Development
EEAS	European External Action Service
EU	European Union
GHG	Greenhouse Gas
IPCC	Intergovernmental Panel on Climate Change
LRG	Local and Regional Government(s)
MLG	Multi-level Governance
NGO	Non-governmental Organisation
UNFCCC	United Nations Framework Convention on Climate Change

# 1. Introduction

## 1.1. Climate change impacts: predictions are becoming visible

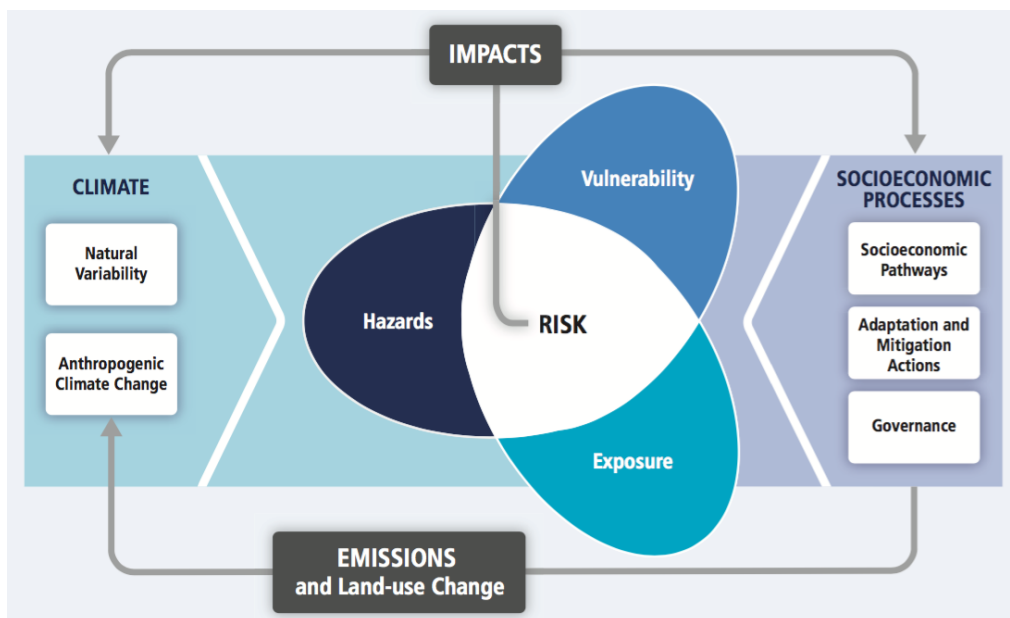
Although climate changes naturally over – geological – time, human activities like fossil fuel burning have led to an intensification of global warming (Alves et al., 2018, p. 50). Due to this interactive aspect, climate change needs to cease to be considered purely as an environmental phenomenon to be conceived as ‘a complex phenomenon that highlights the global interdependencies of socio-political and biophysical systems’ (Arriagada et al., 2018, p. 68). The term *Anthropocene* surged in order to designate these interlinkages, i.e. human-induced transformations of the environment and their consequent impacts on nature (Brondizio et al., 2016). Despite the interdisciplinary use of the term, the role of social sciences has been comparatively neglected, being scientific narratives prevalent (Ingram et al., 2019). Climate change not only poses environmental problems but touches, and will increasingly affect, human health, food and water security, energy systems, global stability and the economy (Böřner and van Asselt, 2017; European Commission, 2019a). This thesis makes a call to reflect on the importance of socio-political actions – as a need to move towards an integrative research between the physical and social sciences.

Climate change projections are inherently uncertain since they are linked to a series of factors beyond our control, such as climate variability and future anthropogenic forcings (Böřner and van Asselt, 2017; Collins et al., 2013). Nevertheless, projections are turning into reality, and sometimes reality goes beyond what it was expected. Negative impacts of climate change, predicted long time ago by scientists, are already being felt across the world in an unprecedented way (European Commission, 2019a, p. 1), and will be increasingly common and intense through the years to come (SISS, 2018). A clear picture of that was the year 2019, which witnessed an unparalleled melting of Greenland’s ice sheet (Tedesco et al., 2019); an acceleration in coastal erosion and floods in West Africa (WB, 2019); destructive bushfires in Australia (Piper, 2020); and deadly heatwaves all over the world beating previous record temperatures (IPCC, 2018).

Recent events have also shown that climate change ‘will not affect everyone equally – not in the same way, not at the same time, not at the same magnitude’ (UNDP, 2019, p. 175), but will disproportionately impact the most vulnerable and least responsible countries (Burck et al., 2019, p. 6). Furthermore, the IPCC already acknowledged (see Figure 1) that factors such as exposure and vulnerability of ecosystems and human systems to climate change reveal asymmetric perceived hazards, and thus different risk thresholds depending on the location (IPCC, 2014a, p. 3). In Moser’s words,

‘fully understanding the real importance and potential severity of climatic change for any location (both the impacts experienced locally and those affecting other regions but impacting local communities and sectors indirectly) requires placing climate change into the real-world context of multiple stressors, on-the-ground vulnerabilities, and the actual capacity of communities, businesses, and local and state government institutions to respond to rapidly unfolding changes in the physical and social environment’ (2010, p. 467).

**Figure 1: Risk as the interaction of climate-related hazards with the vulnerability and exposure of human and natural systems. Source: IPCC, 2014a, p. 3.**



According to Moser (2010), adaptation pathways and climate governance might alleviate these risks, but they might also exacerbate climate change risks if the local context is not properly assessed.



Contributing the least to global greenhouse gas (GHG) emissions, the African continent suffers the most adverse effects of climate change due to its high geographical exposure, its large economic reliance on natural resources, and its restricted capacity to operationalise climate mitigation and adaptation strategies (Niang et al., 2014, p. 1205). In turn, climate impacts fuel other existing political, economic and social problems in the continent – e.g. widespread food insecurity, significant water stress, increased poverty, new health hazards, forced migration, and political and social instability (ARGA, 2015, p. 7). The same can be applied to people, with those considered to be vulnerable groups within a certain territory being particularly affected.

Given the above, climate change constitutes an ethical and a moral challenge which needs urgent mitigation and adaptation actions that embrace social justice and equity at its core so as *no one is left behind*, as articulated in the Agenda 2030 (UNSDG, 2015). Climate change requires a coordinated action around the world. And, although these climate-related repercussions seem distant for some, they will ultimately strike countries not experiencing them yet, ‘in the form of food price shocks, economic damage, greater migration pressures and the fallout from conflicts’ (Gaventa, 2019, p. 21). The European Union cannot afford to invest in climate resilience exclusively within its borders, but should continue to strengthen its position in global cooperation to climate change, as it was pledged by the EU in several instances (European Commission, 2020a).

## 1.2. EU’s international commitments on climate change

### *Beyond mitigation: the need of adaptation strategies*

The issue of climate change first entered the international agenda in the form of global warming, with adoption of the United Nations Framework Convention on Climate Change (UNFCCC) in 1992, at the core of this global climate ‘regime complex’ (Keohane and Victor, 2011), which led, *inter alia*, to the Kyoto Protocol (1997) and most recently to the Paris Agreement (2015). In this line, the primary response to climate change by the EU and the international community so far has concerned *mitigation strategies*, particularly through the reduction of GHG emissions (Vinke-de Kruijf and Pahl-Wostl, 2016, p. 242).

Over the years, and because of recent and more recurrent climate change-related and unrelated catastrophic events, climate action’s timeline has moved towards the emergence

of *adaptation strategies* encouraged by present rather than potential needs affecting future generations (Lenhart, 2015, p. 7). Irrespective of future projections, warming scenarios and how successful mitigation efforts prove to be, adaptation measures are needed to face the unavoidable economic, environmental and social costs of climate change (European Commission, 2013; Vinke-de Kruijf and Pahl-Wostl, 2016). Yet adaptation is not always well differentiated from mitigation on the mainstream public discourse (Cotton and Stevens, 2019). Adaptation refers to the ‘process of adjustment to actual or expected climate and its effects. In human systems, adaptation seeks to moderate or avoid harm or exploit beneficial opportunities. In some natural systems, human intervention may facilitate adjustment to expected climate and its effects’ (IPCC, 2014a, p. 5). Adaptation cannot be effectively addressed by one category of actor, or using a *one-fits-all* approach. Moreover, the North/South divide, and countries’ historic responsibilities highlight the need to move towards a ‘localised, bottom-up, place-based and co-produced approach’ (Cotton and Stevens, 2019, p. 3) so as to deal with existing tensions between policy agendas and work on environment, economic and socio-spatial inequalities and vulnerabilities. Arriagada *et al.* go further and emphasise that:

‘[c]limate change governance agendas and action strategies are characterised by contradictions between global and local needs, core and periphery understanding, nationally determined versus market-driven motivations, urban and rural contexts, universal versus individual approaches, region variations, developed and developing socio-economic realities, large and small scales, and approaches seeking integration versus disintegration’ (2018, p. 69).

Climate change follows the rationale of the ‘tragedy of the commons’ (Hardin, 1968), suggesting that it should be collectively managed at different levels of governance, through the consultation of all kind of stakeholders. The UNFCCC-centred international climate regime is evolving towards this inclusive approach, formally recognised in the Paris Agreement (UNFCCC, 2015). A controversy remains at the international level on how to structure the global climate governance architecture (Galarraga *et al.*, 2017). Before entering into an analysis of this governance structure, EU’s actorness and international leadership needs to be explored, for the purposes of this dissertation.

### *EU's external climate governance toolbox*

Climate change impacts such as coastal erosion, heat waves, floods, droughts, or sea-level rise affect different sectors and communities with no regard to national administrative borders (Bölsner and van Asselt, 2017, p. 1). For this reason, EU's innovative solutions to fight against climate change need to transcend the boundaries of the Union to encompass the global arena (Biedenkopf and Dupont, 2013, p. 181). The EU is increasingly advancing climate change objectives. This dynamic approach not only is illustrative within its own borders, but also through external actions. At first, systematic analysis of EU's climate action largely focused on the internal dimension, some may even see the EU as a 'microcosmos of the international climate change *problématique*' (Jordan et al., 2010, p. 8). However, the EU's role in climate action beyond its borders, which falls within the realm of the broader EU's external governance, has gained importance over time.

Different authors have provided a conceptual basis that supports the idea of the EU being a global climate power (e.g. Gupta and Grubb, 2000; Parker and Karlsson, 2010; Wurzel and Connelly, 2011; Biedenkopf and Dupont, 2013; Bölsner and van Asselt, 2017). There are, however, multiple types of leadership (see Table 1), although they might overlap in certain matters. Some authors might even go further and distinguish between transformational and transactional leadership styles, i.e. leading to immediate important changes and small incremental changes respectively (*see e.g.* Wurzel and Connelly, 2011, pp. 12–15). These leadership styles rely on a series of complementary *tools*.

**Table 1: Types of EU Leadership. Based on: Biedenkopf and Dupont, 2013.**

<b>STRUCTURAL LEADERSHIP</b>	<b>ENTREPRENEURIAL LEADERSHIP</b>	<b>COGNITIVE LEADERSHIP</b>	<b>SYMBOLIC LEADERSHIP</b>
<ul style="list-style-type: none"> <li>• use of hard power (e.g. coercive tools) to influence third parties</li> <li>• use of material power to alter the cost/benefit of actions and inactions</li> </ul>	<ul style="list-style-type: none"> <li>• unilateral introduction of pioneering policy</li> <li>• <i>lead by example</i> to incentivise other parties to follow you</li> </ul>	<ul style="list-style-type: none"> <li>• ideas to influence policy decisions (e.g. promotion of pioneering policies, cooperation, and exchange of information)</li> </ul>	<ul style="list-style-type: none"> <li>• rhetorical statements (more talk than action)</li> <li>• meaning is at the core</li> <li>• change will be significant only if combined with another type</li> </ul>

First, the Union’s competences in international climate negotiations come, on the one hand from the EU Treaties,<sup>1</sup> and on the other hand, from the international climate regime that allows EU participation in parallel to its Member States<sup>2</sup> (Savorskaya, 2016, p. 74). This allows the EU to negotiate climate arrangements through the use of argumentation and persuasion. Second, the manipulation of utility calculations is also used as a governance tool to *push* countries for a change. It usually implies an asymmetric power relationship, but ‘[i]n its external climate policy, the EU has relied more on incentives than on coercive measures’ (Biedenkopf and Dupont, 2013, p. 189). Third, adopting domestic pioneering measures to stimulate third countries to follow EU’s example can be considered as having possible transnational effects outside the EU – in the form of either emulation or adjustment (Scott, 2011). EU’s external governance regarding climate action might, indeed, seem obvious through (i) EU’s participation in international negotiations and agreements; (ii) incentives (e.g. financial resources); and (iii) pioneering policies that serve as a ‘leading example’ at the global level. Notwithstanding, cooperation with third-countries remains an important part of EU’s climate leadership and figure within its external governance *toolbox* (see Table 2).

**Table 2: EU external governance *toolbox*. Adapted from: Biedenkopf and Dupont, 2013.**

	<b>BI- AND MULTI-LATERAL</b> (need for consensus)	<b>UNILATERAL</b> (uncertainty that non-EU countries will follow)
<b>HARD POLICY TOOL</b> (immediate and apparent change; relative certainty)	International treaties and agreements	Coercion and Incentives
<b>SOFT POLICY TOOL</b> (incremental, not necessarily apparent change; uncertainty)	Cooperation with extra-EU jurisdictions	External effects of EU pioneering policy

<sup>1</sup> Art. 191(1) TFEU refers to ‘combating climate change’. Art. 191(4) adds that ‘[w]ithin their respective spheres of competence, the Union and the Member States shall cooperate with third countries and with the competent international organisations’.

<sup>2</sup> Art. 22 UNFCCC, claims that ‘Regional Economic Integration Organisations’ are allowed to participate in international negotiations, just as member states.

### *Cooperation with extra-EU jurisdictions: decentralised cooperation as a soft policy tool*

Some consider international cooperation in general, and decentralised cooperation in particular, too uncertain to find themselves among the options mentioned above. In the past decades, local and regional governments, as well as non-governmental actors in the EU and abroad have nevertheless been increasingly involved in international cooperation (Vermeer, 2019, p. 8). However, it is not always evident which roles are played by non-state actors in global climate governance. Strengthening the importance of these actors not only will contribute to increase the coherence of climate policies with the specific impacts in the respective territories, but also their effectiveness (Fernández de Losada Passols, 2017). The importance of global decentralised cooperation resides on local and regional actors' pivotal roles when it comes to climate governance, since climate change impacts are felt most pressingly by local communities (Vermeer, 2019). Decentralised cooperation has indeed the added value of such a proximity with local realities and a multi-actor component that makes it flexible, but it also has the legitimacy of being part of the public policy of democratically elected subnational governments. Nevertheless, much still remains to be done. Although some European subnational authorities are striving to build alliances through this type of cooperation, there is no general mechanism that connects EU with non-EU territories and non-state actors across levels of governance (Vermeer, 2019, p. 9).

It has become clear that EU's innovative solutions to fight against climate change need to transcend the boundaries of the Union to encompass the global arena (Biedenkopf and Dupont, 2013). In this sense, the EU seems to be making a step forward in seeking to combine a *societal pull* with a *technology push* to work towards inclusive and coherent climate governance (European Commission, 2019b, p. 18). The European Green Deal, proposed in 2019, includes for instance a section called 'The EU as a Global Leader' (European Commission, 2019b, pp. 20–22) so as to introduce a challenging – but necessary – response to this quest. This thesis aims to contribute to the literature on EU's external climate governance by enhancing assessing the similarities between multi-level governance and decentralised cooperation, within the broader *tool* of international cooperation, in the context of EU's external climate adaptation governance.

### 1.3. Research objectives:

It is paradoxical that, while climate change impacts are vividly perceived at the local level, global negotiations and climate governance were state prerogatives. Until quite recently, non-state actors were not paid particular attention. This dissertation aims to pay attention to decentralised cooperation at a time when a subnational plurality of actors is taking an increasingly visible role in climate governance. Given the relatively scarce literature on decentralised cooperation and multi-level governance approaches in EU's external climate governance, I strive to contribute to current scholarship by combining important strands of literature. Decentralised cooperation and multi-level governance find interesting synergies that might be crucial for EU's external climate action, particularly for global challenges that require a localised response.

#### RESEARCH OBJECTIVE

To improve the understanding of decentralised cooperation and multi-level governance as assets for EU's external climate governance to meet strengthened standards of climate adaptation.

#### RESEARCH QUESTION

Since adaptation governance has to be tailored to meet particular localised needs, would decentralised cooperation and multi-level governance lenses help the EU reinforce its global leadership on climate adaptation?

- RsQ1: Which are the synergies between decentralised cooperation and multi-level governance?
  - Objective 1.1: To reconcile multi-level governance approaches (EU and international models) and decentralised cooperation literature to obtain a theoretical *framework* that explains the potential benefits of both approaches.
  - Objective 1.2: To assess the compatibility of the framework resulting from these synergies in a context of EU's external climate adaptation.
- RsQ2: Which is the dynamic potential of multi-level and multi-stakeholder approaches, and that of decentralised cooperation, in EU's external climate governance?
  - Objective 2.1: To identify the main challenges when facing uncertainty and long time-frames, and the influence the framework proposed would have to overcome such problems.

- Objective 2.2: To understand how the theoretical framework can contribute to reinforce the ties among different types of EU and non-EU actors across levels of governance so as to create more efficient, coherent and complementary partnerships to enhance EU's external climate (adaptation) governance.

#### 1.4. Structure of the dissertation

The document is organised as follows. Chapter 2 summarises a selection of key literature on multi-level governance and decentralised cooperation and its connection to the EU's climate efforts – and efforts in the global arena. Then chapter 3 presents the methodology used for the elaboration of this dissertation, which has combined the assessment of secondary sources with primary data obtained from semi-structured interviews (e.g. via Skype) with a plurality of key actors. This participative approach contributes to assess the validity of the theoretical framework, considering the lack of literature on the whole component that is being analysed. In Chapter 4, the theoretical framework and methodology are applied to an empirical case study. This section draws on four main narratives that arise from the interviews and are crucial to highlight the benefits of multi-level coherence and decentralised alliances in climate governance to reach both local needs and global objectives. The case of Governadapt is used as an example of the theoretical framework in a localised context. Hence, to validate the framework's applicability and to assess its complementarity to traditional climate governance tools. Finally, Chapter 5 outlines the main findings and draws some conclusions.

## 2. Literature review and theoretical framework

### 2.1. Multi-level governance: cross-level ties among a wide variety of actors

The concept of governance has been studied by scholars for a while, yet it is an ambiguous concept without a main consistent tradition. National governments and regulatory measures are no longer capacious enough – if they ever were – to generate widespread solutions or exploit opportunities alone, particularly in complex global issues such as climate change. The importance of this broad concept relies in its perceived connection with legitimacy, hence the acceptance and effects of the proposed solutions (Scott, 2009, p. 160). A broad understanding of governance could be illustrated as the ‘management of the course of events in the social system[s]’ (Burriss, 2008, p. 9), particularly the coordination of ‘complex relationships between stakeholders and the role of the government in these coordination efforts’ (Knieling and Klindworth, 2016, p. 6). Applying a narrower understanding, the term highlights the blurring boundary between traditional government-centred hard power and softer forms of regulation, resulting in a diffusion of capacity and legitimacy among a set of actors (Scott, 2009, p. 165).

This changed the perception of traditional hierarchical forms of organisation, resulting in multiple re-definitions of the concept and a variety of frameworks that surged as new models of governance (Knieling and Klindworth, 2016, p. 7). Multi-level governance (MLG) marked a distinction towards a more participatory and cooperative model. The term finds its origins in the early 1990s as an approach used by the EU to refer to the remarkable governance approach used within its borders. Indeed, no other term in the EU literature on policy-making has acquired such a wide recognition (Stephenson, 2013, p. 817). It essentially means ‘to activate the dynamic potential of each level and the interaction between all levels to achieve a global mobilisation of actors’ (Jänicke and Quitzow, 2017, p. 122). Its founder, Gary Marks (1993) used MLG to accentuate the parallelism between the *Europeanisation* and decentralisation processes, where government actors at different governance levels assumed a central role. Other authors followed this idea (e.g. Scharpf, 1997; Benz and Eberlein, 1999; Börzel and Risse, 2000; Hooghe and Marks, 2001; Conzelmann and Smith, 2008). Basically, it

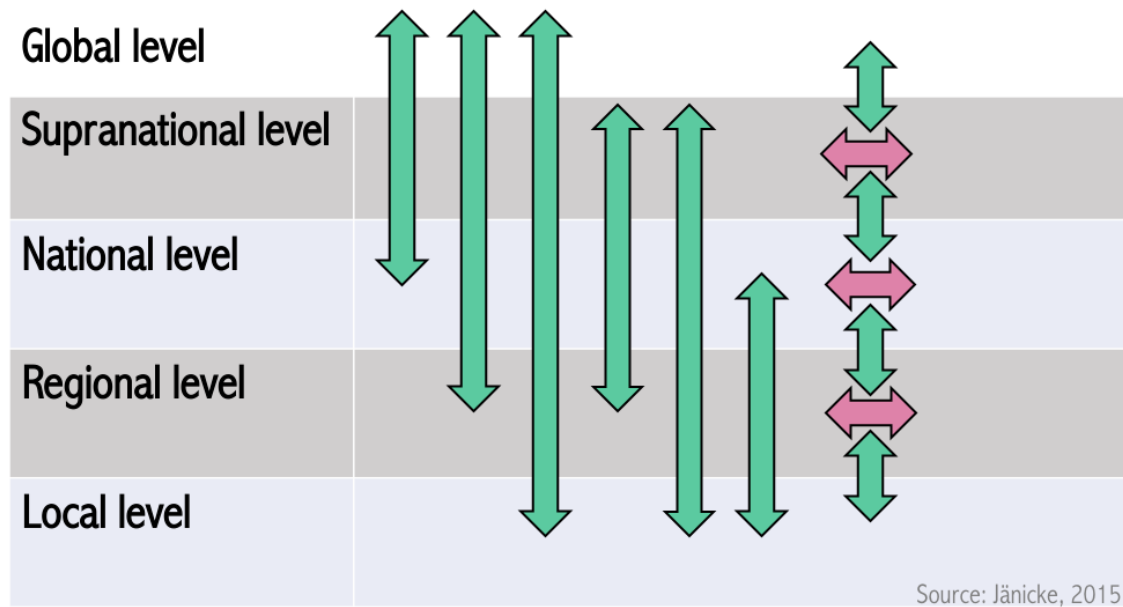


depicted a vertical arrangement among government levels and their intimate entanglement. However, 'MLG has been embraced by a *wide range* of scholars and used in *different ways* over time, regardless of the original intentions' (Stephenson, 2013, p. 818). For instance, a remarkable aspect concerned the inclusion and role of non-governmental actors on the debate (Hooghe and Marks, 2003; Marks and Hooghe, 2004; Stephenson, 2013, p. 829).

Not only was MLG used to refer to the complex EU governance system, but it also was reconciled with other sets of literature in the international realm (e.g. Enderlein et al., 2010; Rennstich, 2017). International multi-level *climate* governance seems to follow this logic. A distinctive model of MLG dates back to the UN Rio Summit (1992), which is mainly applied to climate protection, but its application is possible in other related fields. The Agenda 21 was a direct result of the advantages of this MLG model, and its ability to mobilise actors at different levels of governance to pursue sustainability (United Nations, 1992). The Rio model of MLG was partly successful in that it put the emphasis on subnational level and multi-sectorial approaches in the processes of agenda-setting and policy formulation. Nevertheless, it failed to adequately address institutional structures, and the lack of coordination across governance levels, thus ending up losing its influence on certain levels of implementation (Jänicke and Quitzow, 2017, p. 109).

According to Ostrom (2010), collective action is needed to fight climate change. Despite the fact that international negotiations are proposing global goals, those goals need to be 'backed up by a variety of efforts at national, regional, and local levels' (Ostrom, 2010, p. 550). This approach, echoed by Jänicke and Quitzow (2017), argue that climate governance needs to be understood as a dynamic concept, since traditional top-down approaches have not proved to be effective so far. 'Without active participation at each level of governance, the far-reaching [...] changes needed to meet international climate targets will not be forthcoming' (Jänicke and Quitzow, 2017, p. 124). Additionally, they also acknowledge that several developments at different scales (see Figure 2) have demonstrated to be promising to achieve global climate objectives, including *inter alia* the use of cooperation, networking and mutual learning as governance instruments (Jänicke and Quitzow, 2017, p. 124).

Figure 2: Possible dynamic interactions in global multi-level governance.

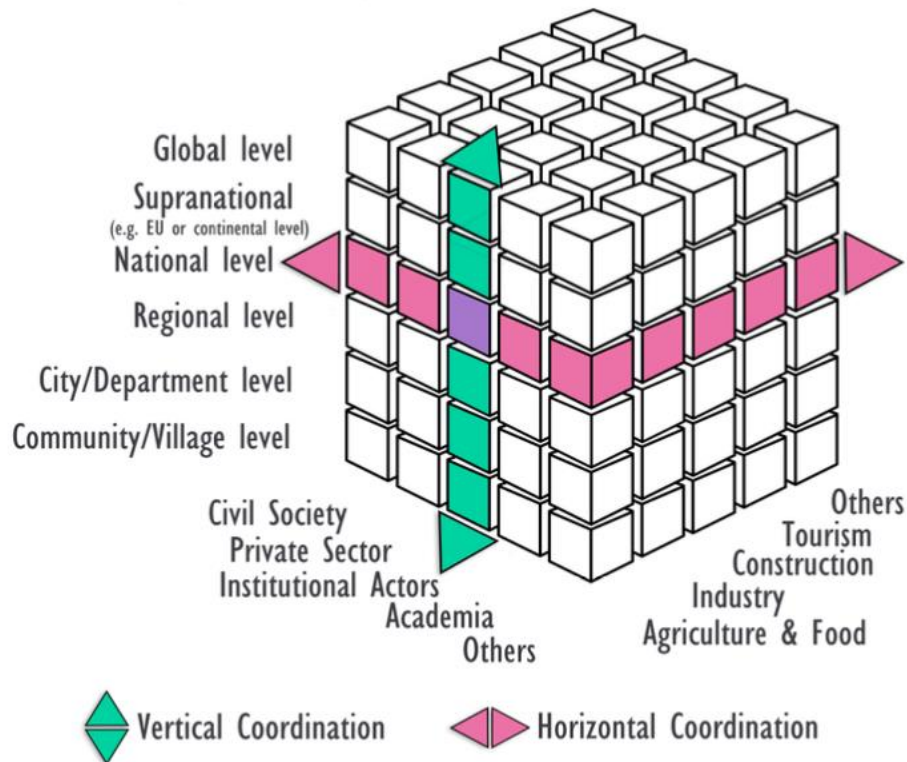


National Adaptation Plans (NAPs), established under the Cancun Adaptation Framework (2010) prioritised already the need for multi-level approaches for countries to prepare to climate risks and mainstream climate change adaptation. This cross-scale approach was said to better align with the localised nature of climate change. More recently, the Paris Agreement (2015) supported these dynamic interactions across levels by removing traditional differentiation between *developed* and *developing* countries. This came hand in hand with an inclusive framework that seeks to balance ambition, transparency and justice (UNFCCC, 2015). In fact, the year 2015, marked a distinction from the traditional top-down approach, moving towards a hybrid governance architecture that combines top-down and bottom-up decision-making (Bößner and van Asselt, 2017, p. 4). Climate governance should be dynamic, where different modes of governance co-exist and are constantly transformed to adapt to the complexity of climate change (Knieling and Klindworth, 2016). Bößner and van Asselt's (2017) and Jänicke's (2015) conception of the international climate governance landscape is characterised, indeed, by its hybridity and complexity. They recognised climate governance as encompassing three different components:

- i. its *diffusion* – horizontally across sectors and vertically across levels of governance;
- ii. its *multi-actor essence* – governments, although usually receiving most of the attention, are not the only ones involved. Other non-state actors such as civil society organisations, NGOs, the private sector are recognised in many studies;

- iii. its *collaborative nature* – ‘climate governance involves a range of non-hierarchical, collaborative modes of governance’ (Bölsner and van Asselt, 2017, p. 3).

Figure 3: A broad conception of multi-level climate governance.



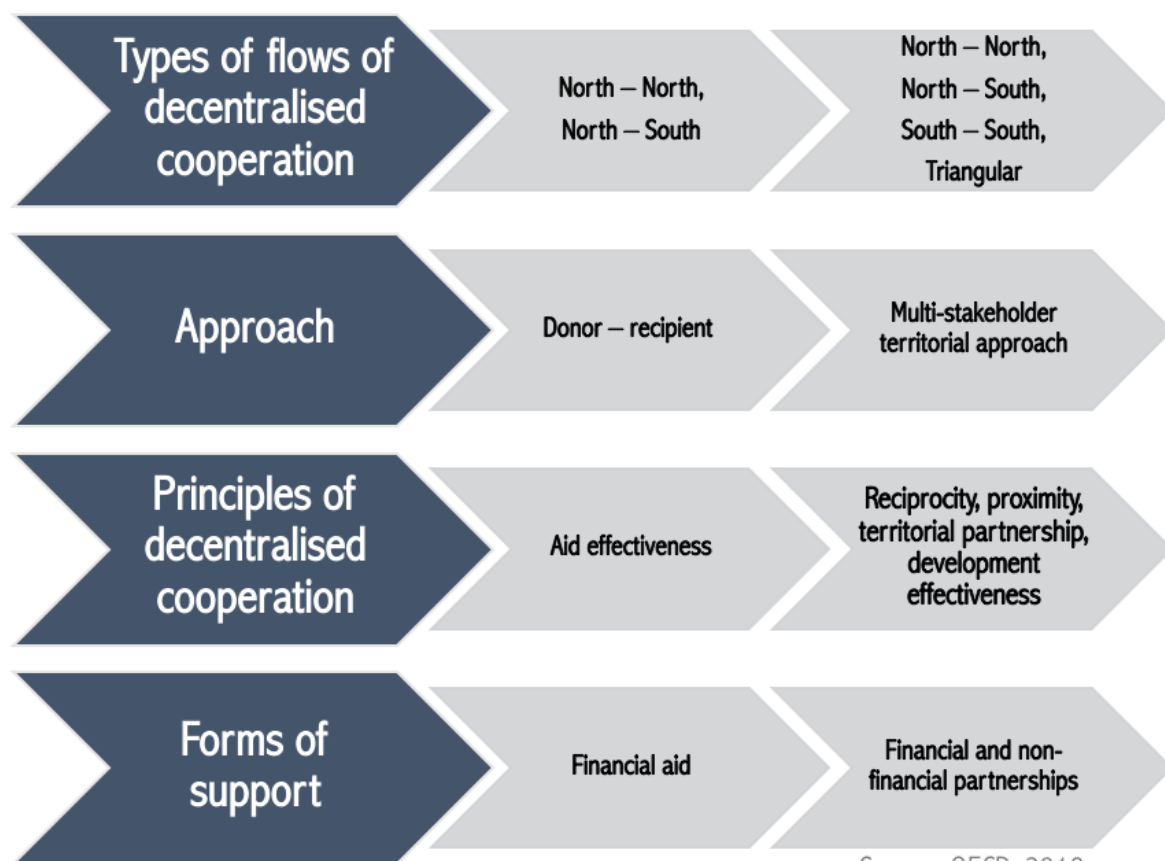
Source: Adapted from Jänicke, 2015.

## 2.2. Decentralised cooperation: the importance of regional and local levels

Despite the efforts the EU has done recognising the critical role of international cooperation to tackle climate change, decentralisation is not always obvious within that broader tool. However, cooperation among cities, municipalities, regions, or any other subnational level, has become further recognised as critical at the global level (Vermeer, 2019, p. 8). Originally, the concept mainly referred to development cooperation, since goals such as poverty alleviation, sustainable development, and local empowerment were implicit in its meaning (UNDP, 2010). Over the last decades, decentralised cooperation has evolved in terms of its types of flows, approaches, principles, forms of support and even the vocabulary used to refer to the coordination and interventions within multi-stakeholder networks. Figure 4 illustrates the evolution of the core elements of decentralised cooperation. Nowadays, international cooperation no longer lies solely on the hands of central authorities, but refers to multi-

stakeholder partnerships among *inter alia* local and regional government (LRGs), the private sector, civil organisations and academia. For the purposes of this study, LRGs will henceforth be understood ‘in its widest sense to encompass the large variety of subnational levels and branches of government i.e. municipalities, communities, districts, counties, provinces, regions, etc.’ (European Commission, 2008, p. 3). These complex partnerships changed from predominantly ‘North-South’, ‘donor-recipient’ and ‘financially-driven’ approaches to more horizontal and inclusive types of cooperation (OECD, 2018, p. 26).

Figure 4: Evolution of decentralised cooperation.



Source: OECD, 2018.

*How can decentralised (development) cooperation align with climate action?*

Non-state actors in international relations strive towards having a predominant role in climate cooperation. Decentralised cooperation engages these actors in international cooperation by creating strong links through dialogue, trust and sustainable results inspired by local strategies and perceptions. However, an important question remains: how should these different actors interact with one another across levels of governance in a coherent and complementary way?

Climate adaptation strategies need to be sustainable to make their implementation contribute to territorial development and resilience to future climate risks. In this sense, development cooperation and climate adaptation have intertwined priorities (Platforma, 2020). Besides policy solutions, strategies and regulatory measures, this approach allows for more, i.e. the 're-definition of society's relationship with the environment' (Knieling and Klindworth, 2016, p. 4). Climate adaptation should be linked to decentralised development cooperation in that it transcends natural disasters and extreme events. Climate impacts are human-induced both in direct and indirect ways. To put an example, in the case of coastal erosion in Dakar, the main drivers are far from being the salinization of the land and sea-level rise due to climate change. Indeed, rapid urbanisation near the coast led to excessive sand extraction from beaches and dunes. In turn, the balance between erosion and deposition changed, thus resulting in gradual lowering of the land and eventual massive scale coastal erosion (Amara et al., 2019; ONU Habitat, 2020).

All things considered, decentralised cooperation encourages the participation of different local stakeholders to obtain a coherent picture of climate risks and adaptation opportunities (Fernández de Losada Passols and Calvete Moreno, 2018). While LRGs are considered as pivotal stakeholders, other actors form also part of the picture. *Academia* and the *scientific community* are important due to their extensive pool of knowledge and their expertise on a wide variety of issues. *NGOs* and *civil society organisations*, for their part, can help with a myriad of aspects ranging from gender inclusiveness to the empowerment of local communities and vulnerable groups, while contributing to deal with climate impacts. In the same line, engaging the *private sector* comes as an opportunity to mobilise and steer actors that need to contribute if there is to be a sustainable adaptation. Decentralised cooperation offers to climate adaptation strategies context-based advantages and territorial partnerships to co-design innovative and collaborative exchanges (OECD, 2018). Moreover, it allows for a re-definition of cooperation that is complementary to state-centred international cooperation, which results with climate change issues integrated in a broader picture of territorial development. Moreover, the interlinkages with multi-level governance might contribute to a better adaptation governance that transcends EU's borders.

## 2.3. The synergies of MLG and decentralised cooperation applied in the context of EU's external climate governance

### *Climate adaptation: an ally to MLG and decentralised cooperation discourses*

Localised impacts of climate change make a *one-fits-all* solution for climate adaptation impossible. Climate change adaptation cannot count solely on physical measures to protect existing infrastructures from climatic events, but needs to be conceived with a broader societal approach. Multi-level, multi-stakeholder and decentralised modes of governance and cooperation offer a suitable framework characterised by its dynamism, its multi-disciplinary nature and its complementarity with state-centred governance tools. Indeed, it could be said that climate adaptation is 'allied' with contemporary governance discourses that value the roles, engagement and capacities of different actors across levels, and the share of responsibilities. However, a set of institutional barriers of climate adaptation undermine these discourses (see Table 3 to see the main challenges to reach effective adaptation results).

**Table 3: Challenges of climate adaptation.**

<b>MULTI-LEVEL</b>	<ul style="list-style-type: none"> <li>• Responsibilities of actors at subnational levels remain unclear for most states and supranational actors. More dynamic and open structures need to be adopted to improve coordination among levels.</li> </ul>
<b>MULTI-ACTOR</b> (including non-governmental actors)	<ul style="list-style-type: none"> <li>• Since climate adaptation is more than a technical issue, it asks for complex direct interactions and cooperation among actors to drive change. Governments need to incrementally find ways to work with a variety of non-governmental actors.</li> </ul>
<b>MULTI-SECTORAL</b>	<ul style="list-style-type: none"> <li>• Horizontal cooperation among actors is needed: across types of actor at the same level, but also across sectors. Cross-sectoral coordination and exchanges need to be reinforced.</li> </ul>
<b>COMPETING FOR FINANCE</b>	<ul style="list-style-type: none"> <li>• 'Long-term oriented climate adaptation measures compete with other more short-term oriented and more tangible political concerns over scarce resources' (Knieling and Klindworth, 2016, p. 11).</li> </ul>
<b>COORDINATION AND COOPERATION</b>	<ul style="list-style-type: none"> <li>• Dynamic interconnections among actors and levels are usually confused, and sometimes coordination is difficult to achieve.</li> </ul>

Source: Knieling and Klindworth, 2016.

Dealing with these barriers makes a clear suggestion of the need for comprehensive, flexible, coordinated and inclusive strategic approaches. Comprehensive in that traditional knowledge of the smaller communities needs to be valued equally as knowledge in the 'Global North'. Existing coping strategies need to be assessed and new strategies explained in order to make them sustainable. For that, flexibility is required to advancing better localised adaptation strategies. Coordinated approaches facilitates cross-scale and cross-sectoral collaboration and, ideally, harmonised work to avoid duplication of efforts and incongruence. Inclusiveness adopts a broad approach to include all levels of actions – including municipal, village, community levels, which are usually not considered –; all kinds of actors – multi-disciplinary experts and vulnerable people affected somehow by localised impacts with no expertise on the matter at hand –; and cross-sectoral action – to guarantee a management of those risks that may affect different sectors (Knieling and Klindworth, 2016).

#### *EU's external climate governance: also an ally?*

Climate adaptation requires an 'evaluation of planning steps, processes and outcomes as well as continuous reflection and learning' (Knieling and Klindworth, 2016, p. 10). Indeed, the EU is involving a broader group of actors in the process of decision-making in climate-related issues. For instance, building on the current EU adaptation strategy, the Commission has launched online public consultation on a new adaptation way (European Commission, 2020b), thus inviting all stakeholders and citizens to submit their views on the matter. Moreover, the context-specific nature of adaptation is acknowledged by the EU. Principles highlighted to guide EU member states are, for instance, sustainability, partnership, coordination, tailoring to the scale required – e.g. local, sectoral, cross-border –, flexibility, and transparency (European Commission and EEA, n.d.). Moreover, the EU emphasises the importance of reviewing the effectiveness, efficiency, equity and legitimacy of adaptation decisions repeatedly due to its localised and dynamic nature. The question now arises: should the EU's external climate governance, based on this 'domestic' principles, apply a multi-level and decentralised lenses to co-design with other territories adaptation solutions?

Decentralisation needs to be understood as a tool for climate governance, in this case, for EU's external climate governance. According to Di Gregorio et al., '[c]limate change

governance has evolved into a complex polycentric structure that spans from the global to national and subnational levels, relying on both formal and informal networks and policy channels' (2019, p. 64). The role of decentralised cooperation could further strengthen these complex interrelations between EU and non-EU communities to co-evaluate localised climate risks and co-design governance strategies to adapt to them. Indeed, the degree of decentralisation is becoming increasingly important in the EU, and the international cooperation is also present in some LRGs' agendas (Galarraga et al., 2017). The case study *Governadapt* exposed later in this thesis, supports this evidence.

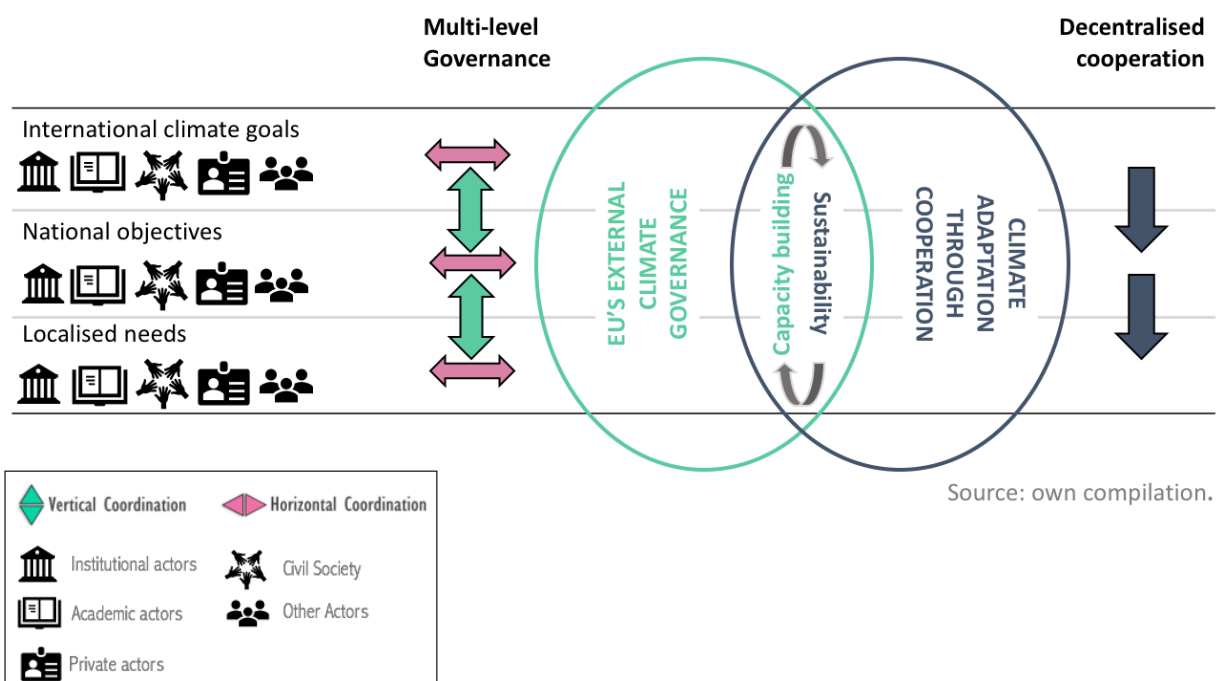
As we have highlighted above, the problem of climate governance 'has shifted from a structured, simple issue [expected to require] only a technocratic response, to an unstructured, uncertain, non-linear, ideological, systemic and therefore highly-complex challenge' (Arriagada et al., 2018, p. 69, *emphasis added*). If the EU wants to continue to be considered a key actor in global climate governance, decentralised cooperation and formal and informal coordination of actors across all levels and sectors, is needed. Multi-level decision processes need to be better-informed and subnational authorities' power should not be underestimated. LRGs are in a position where, with the right support, appropriate actions could result in a strengthening of adaptation to climate change. 'Local priorities and expertise need to feed into sub-national and national adaptation processes, requiring flexibility and an explicit focus on participation' (Ziervogel et al., 2019, p. 2730). Most of the existing tensions between levels of governance lie on the lack of *nestedness* between policies and actions at different levels. MLG transforms the top-down model to a hybrid one that is increasingly supported because its objective is to solve these incongruences across scales of interaction. Adaptive responses to climate change need both 'hard' and 'soft' responses to better embrace uncertainty, i.e. with flexibility and iterative learning at its core. Despite the use, in EU studies, of MLG models to refer to the governance within the Union, EU's external climate governance can find its inspiration in the international MLG model to achieve better outcomes in climate actions. International cooperation is already among EU's external climate governance tools. However, given the localised nature of climate impacts and the importance placed in local knowledge, decentralised cooperation would improve the actual implementation of international climate adaptation goals by complementing existing efforts and reinforcing actions at local levels. Responding to research question 1, this structure of



EU’s external climate governance – illustrated in Figure 5 – would find synergies between MLG and decentralised cooperation. These synergies will also integrate intergenerational justice because of their localised effectiveness, inherent flexibility and sustainability.

Due to the lack of literature on the use of MLG in EU’s external action and decentralised cooperation as a soft tool for governance, experts with different backgrounds were interviewed so as to gain discernment. Three broad disciplines were chosen: (i) climate adaptation; (ii) multi-level and external climate governance; and (iii) decentralised cooperation. Although the interviews touched aspects from the three disciplines, I focused mainly on the interviewees’ respective field of expertise. The interviews gave me the connections that are currently missing on existing literature to better understand the benefits and challenges of the theoretical framework. The similarities in the responses from different actors allowed for a triangulation of these, which validates – within certain limits – the research results. The empirical analysis (see Chapter 4) offers a discussion on the potentiality of the theoretical framework (i) to face the challenges of uncertainty and long time-frames (Objective 2.1), and (ii) to create spaces of knowledge exchange and sustainable alliances among actors, levels and disciplines to create strengthened adaptation results (Objective 2.2). Finally, the framework is applied to a precise context, i.e. the Governadapt project.

Figure 5: Synergies between MLG and decentralised cooperation.



### 3. Methodology

#### 3.1. Case study: *Governadapt* as an example of climate change decentralised cooperation between EU and non-EU regions

This dissertation draws on qualitative data collected between February to July 2020. During my work as research assistant at the Basque Centre for Climate Change (BC3), I worked on a research and cooperation project between the Basque Country (Spain) and the Region of Dakar (Senegal). The project, *Governadapt*, came up in the framework of the Basque Cooperation Agency's goals to involve new actors to the development work (in this case, a research centre). The project aims at assessing climate impacts, particularly coastal erosion and floods, in Dakar. This project and the multiple related workshops I attended – specially one on decentralised cooperation – caught my attention and inevitably aroused curiosity about how decentralised cooperation would contribute to climate governance, since decentralised cooperation is usually associated with development cooperation. In the case of EU's climate governance, the focus resided in EU's external actions on the grounds that the most affected and vulnerable locations are beyond the Union's borders. Localised impacts need localised solutions, but global cooperation and coordination are essential. Hence, multi-level and multi-stakeholder governance lenses seemed appropriate to guide this research. In other words, the study required a territorial approach, thus a focus on LRGs and other non-state actors, and on the interlinkages across all levels of governance. The assessment brought also theories of EU actorness and leadership to the fore. Decentralised cooperation, within the broad approach of EU's external climate governance allowed me to attain a different perception and detailed understanding of what effective climate adaptation entails and the complexities of climate governance.

While the interviews did not focus on the case study, using *Governadapt* to provide real-world context permitted a better understanding of the synergies between decentralised cooperation and the coordination of different actors across levels in the context of EU's external climate governance. As Blatter and Haverland conveyed, case study research offers 'an intensive reflection on the relationship between concrete empirical observations and abstract theoretical concepts' (2012, p. 19). This is especially useful when the theoretical component is not that clear or observable in practice (Yin, 2018, p. 39). *Governadapt* is a

specific project among two particular territories, one being within EU's administrative borders and one beyond them. However, if Governadapt is able to apply the theoretical framework into practice and the work and methodologies are replicable, this would imply that the theoretical framework would be beneficial and a potential complementary *tool* to existing EU's external climate governance actions.

### 3.2. Climate governance through MLG and decentralised cooperation approaches

The empirical analysis explains how MLG and decentralised cooperation are useful (i) to face uncertainty and long time-frames – huge concerns in climate governance (Objective 2.1); and (ii) to create more coherent, efficient and complementary partnerships to strengthen EU's climate external governance (Objective 2.2). To answer the aspects on time-frames and uncertainty, the interviewees were asked about how, in their respective fields, both aspects are dealt with. Hence, a section on climate adaptation was convenient to contextualise the analysis. Regarding the second question, the analysis emphasised the increasingly important role of multi-level and multi-actor structures and the usefulness of decentralised cooperation as a complementary tool with adaptive advantages. The experiences of different types of actors at different scales of the governance layer were analysed, taking into consideration the actor's degree and way of engagement in climate governance, their knowledge (in science, policy-making and cooperation mainly), and their expectations on the framework proposed. The importance of multi-disciplinary research between the physical and social sciences is once again accentuated.

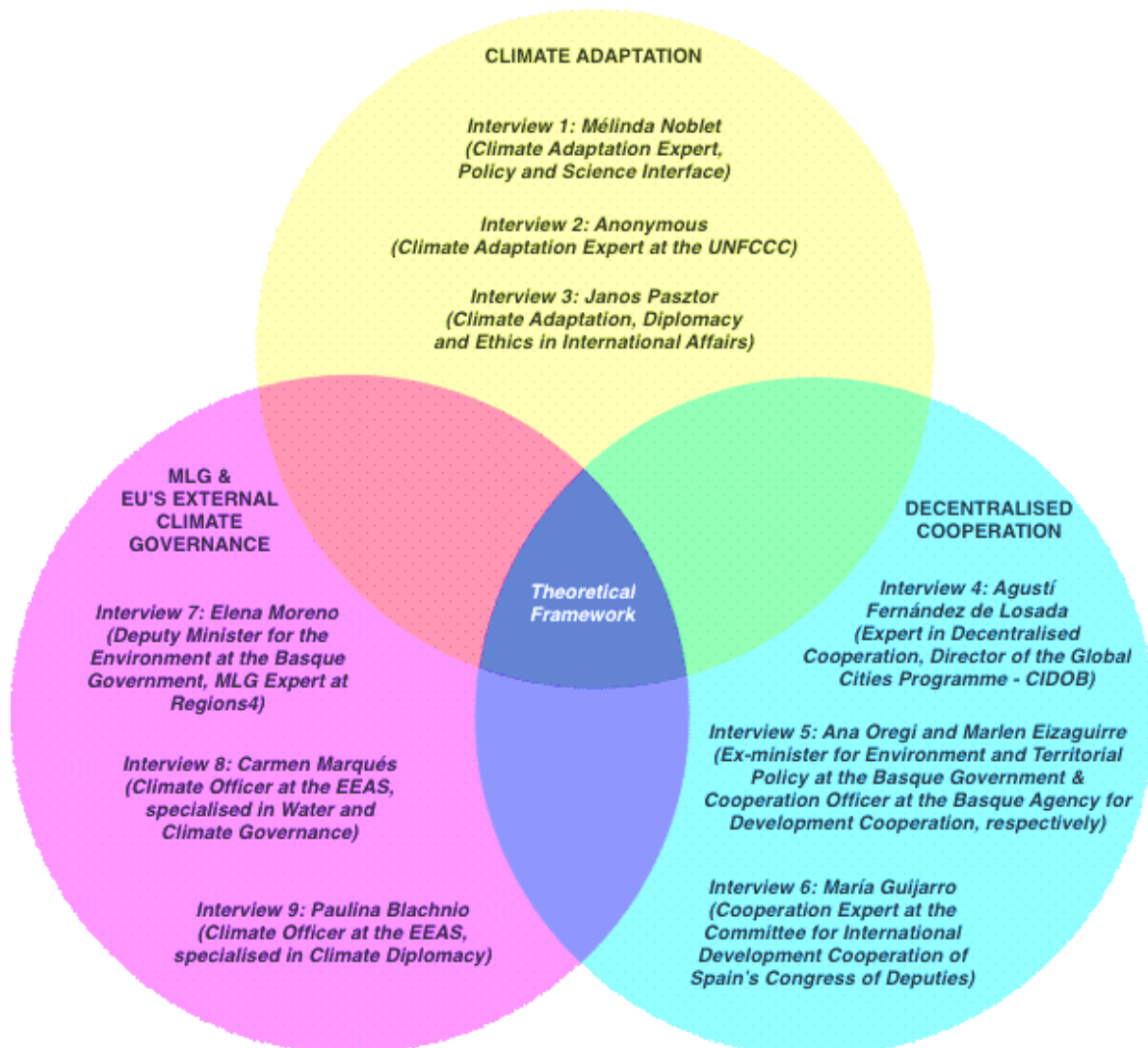
### 3.3. Validity and reliability

#### *Data collection*

The working methodology adopted enabled a qualitative analysis. Data collection included a review and analysis of primary and secondary sources, using search engines (e.g. Google), and virtual platforms to conduct interviews (e.g. Skype). An analysis of secondary data was conducted from the review and analysis of key literature on MLG and decentralised cooperation, as well as on EU actorness and leadership. The objective of this review and identification of literature was to gather adequate information that was later used as a framework and guidance to conduct the empirical research. Once the framework was

established, semi-structured interviews with primarily open-ended questions were carried out. To capture the knowledge required to answer my research questions, interviews required a qualitative assessment of knowledge and experiences from different professional actors in climate adaptation research, governance and cooperation, thus capturing perspectives from multi-disciplinary sources. Focusing also on different contextual geographical levels, I wanted to go beyond simple diversity to capture the complexity of the climate governance puzzle. This dissertation features the results of such review and analysis activities, as well as the results of the interviews to obtain a better-informed response to the usefulness of decentralised cooperation within the current EU’s external climate (multi-level) governance architecture.

Figure 6: Three disciplines and nine interviews to validate the theoretical framework.



Source: own compilation.

### *Interview selection*

To ensure research practicality and effectiveness in practice I conducted interviews with actors from the following stakeholders' groups: (i) institutional actors; (ii) academia and scientists; and (iii) civil society. The total number of interviews was 9 (see Figure 6). All of them were conducted online due to geographical distance or social-distance measures adopted during the COVID-19 pandemic. One interviewee introduced a colleague she thought to be well-suited for the discussion (Interview 5). The approximate duration of the interviews was around 45 minutes, and I was allowed to record the interviews which gave me the opportunity to transcribe them *verbatim*. An objective transcription process recovered from recordings was thus chosen to reduce bias and increase overall validity.

### *Interview technique*

Semi-structured interviews where the respondents are asked primarily pre-set open-ended questions are advantageous to follow the desired line of action during an interview, while remaining relatively open and flexible. On the one hand, the interview guide makes possible to contrast different opinions during the data analysis. On the other hand, the respondents are encouraged to express their thoughts in their own words, which increases response validity (Aberbach and Rockman, 2002, p. 674). Moreover, the fact that most of the questions were open-ended induced interviewees to go more in-depth sometimes, since it was felt more like a collaboration between the investigator and the informant. This combination of semi-structured questions with unstructured exploration was useful to understand how the theoretical framework (*i.e.* the synergies between the two important approaches) results in increased effectiveness and a sustainable advantage.

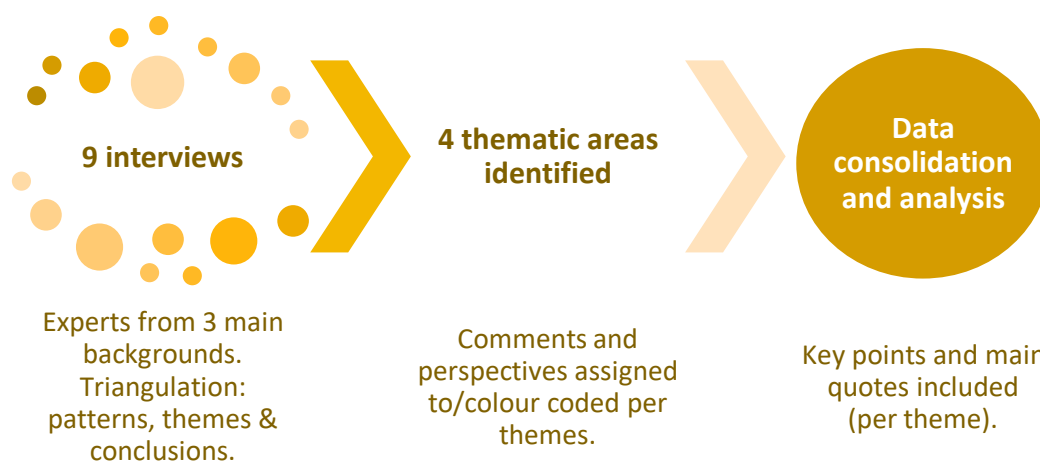
In practice, the interviews were structured in a threefold process – moving from one field of expertise to the following – to obtain useful and comparable findings in the end. The interviews were done in the respective *local/working* language of the interviewees (EN, ES, FR). These experts, who worked at different scales of interest for this study, shared their perceptions and experiences. The interviews surrounded the three main topic of this research: climate adaptation, multi-level and external climate governance, and decentralised cooperation. Hence, the interviewees answered very similar questions, but they constantly created links to their fields of expertise or made more extensive comments thereof. On facing

the challenges of doing research in a multi-disciplinary topic, these interviews would facilitate a better understanding of the matter. Due to the lack of data on the synergies between MLG and decentralised cooperation, as well as their utility for EU's external climate governance, data from experts on different fields was an interesting source of data. Moreover, the triangulation of data reiterated the proposed synergies from the theoretical framework and recognised the benefits of such approaches in EU's external action and overall climate governance.

### *Data analysis*

The data resulting from the interviews was analysed following a thematic analysis, resulting in four dominant narratives that emerged during the conversations (Figure 8). As a result, a matrix structure was created to make easier the comparisons among participants' opinions, specialised knowledge or experiences. Themes make comparisons easier, but they also allow new themes or questions to constantly emerge. The dominant themes were thus identified, to skip those being barely mentioned from the main analysis. During the data consolidation and analysis phase, the information collected during the interviews was validated through the exemplification of the theoretical framework applied to the Governadapt project as a case study of decentralised cooperation with actions transcending one scale of governance.

**Figure 7: Thematic analysis of qualitative data**



### 3.4. Ethical considerations

In order to deal with personal data collection and to prevent the risk of accidental leakage, personal data treatment complied with the following procedures.

#### *Informed Consent*

Participants were informed about the purposes and scope of the study and were asked to sign an informed consent form (see Annex I). The content form stipulated that respondents were participating voluntarily and they could stop participating in the research without a justification required.

#### *Confidentiality and anonymisation*

Participants' identity needs to be protected. Only few data such as the job position, gender, type of stakeholder, geographical scope of their work, can be disclosed in the dissertation (if previously agreed).

#### *Data security*

Only after obtaining previous consent, the interviews were recorded using a secure device (i.e. an audio recorder). The recordings, which enabled to generate a verbatim transcript of the interview, were deleted after being used for the purposes of this dissertation.

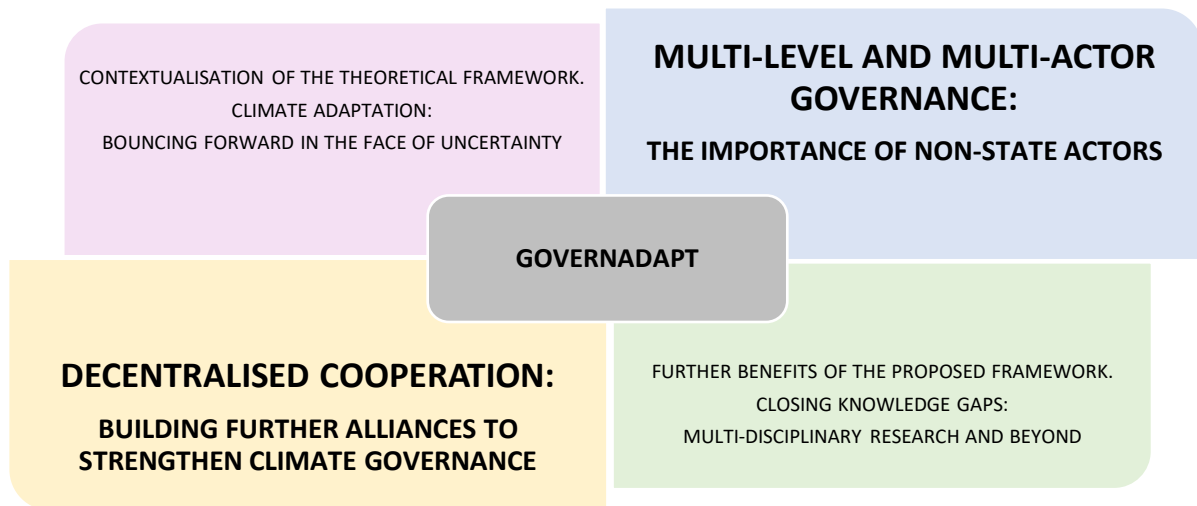
### 3.5. Limitations

It is difficult to explain the complexity of climate governance, being climate change a complex phenomenon itself. It is also extremely important to beware of oversimplified solutions. This dissertation was written with the objective of achieving a better understanding of that complexity, and of the assets and limitations of MLG and decentralised cooperation as tools for EU's external climate governance. Another important limitation to consider relies on self-reporting data methodologies. Participants of interviews, when asked to provide information, might be subject to a series of biases. Some examples are selective of confounding memories; exaggeration, hypothesising in case they do not know or do not remember the answer to the question asked. Moreover, data generation techniques using video calling (e.g. Skype) to virtually replicate the face-to-face interview have further limitations. Due to the state of alarm in Spain and the national lockdown during the ongoing COVID-19 pandemic, remote data collection was the most suitable option available for me at the moment.

## 4. Discussion

This chapter draws on nine interviews with experts in climate adaptation, decentralised cooperation and EU governance – particularly in MLG, and external climate governance. The experts include policy-makers, diplomats, professionals from civil society organisations, researchers and scientists. The content of the interviews is exposed hereafter in the form of general observations to reflect about the proposed framework and the experts’ opinions. This part of the dissertation delves into the main findings that resulted from the thematic analysis (see Figure 8). Yet it is important to highlight that the main themes – MLG and decentralised cooperation (Themes 2 and 3) – are assessed in a context of climate adaptation (Theme 1). The benefit of closing knowledge gaps (Theme 4) was also underlined by all the experts, that is why it was also added to the empirical chapter in the end. Governadapt is analysed as a result of these general observations to put the theoretical framework into practice.

**Figure 8: Main narratives from the interviews & case study.**



### 4.1. Climate adaptation: bouncing forward in the face of uncertainty

#### *Forward adaptation or bouncing forward*

In order to understand external climate adaptation governance, there is a need to sympathise with different concepts such as ‘risk’ and ‘uncertainty’. In theory, adaptation has been over the table for a while now. However, in practical terms, ‘the usage of the word in the early



days of climate international negotiations was seen more as a *defeat* approach to deal with climate change' (Interviewee 1). It was common to see adaptation as an avoidance to tackling the actual problem. For instance, Al Gore called adaptation 'a kind of laziness' (1992). Over the years, adaptation started to be conceived as a normal component of climate actions and development, although it remained tiny in terms of global funding and actions until recent years (IPCC, 2014b). 'Nowadays, adaptation is not only seen as the results of negative climate impacts that are becoming increasingly visible, but in the urgency to move forward in such a changing world' (Interviewee 2).

As policymakers address the threat of climate change, concepts like resilience and adaptation have found themselves at the centre of the discussion. According to an adaptation expert from the UNFCCC (Interviewee 2), these two notions, adaptation and resilience, unfortunately in normal speech imply a meaning of 'giving up' and 'bounce back' respectively. However, there are scientists and policymakers that, on the other hand, argue that getting back to where we started is not enough – the objective should be to improve our position, to be better prepared in the future, to *bounce forward* (Longstaff et al., 2010). 'If you think of it strategically, you find that both should carry that meaning, they should be more couched in the opportunity to move forward a future developmental state taking account of all the realities of a changing climate' (Interviewee 2).

Other implied 'excuse' or 'reason' not to invest into adaptation or climate actions that all interviewees seem to agree is uncertainty. Interviewee 1 accurately describes uncertainty as an 'anchor to the *status quo*' that sceptics unsurprisingly like. Interviewee 2 comes to add that, in the first few years of action on climate change, one of the main reasons to avoid investment in adaptation was this lack of certainty, not just on what the effects would be, but also regarding attribution – of certain events to climate change. However, full certainty is condemned to be impossible by scientists and all interviewees seem to accept that we will have to work in uncertain scenarios.

#### *False sense of security*

Despite the scientific facts that acknowledge some certainties about the future of the planet if we do not take climate actions now, some people still question the validity of science. Interviewee 2 claimed: 'I cannot believe I am saying that. We are talking here about believing

in Science... Unfortunately, this is where we are now'. However, we cannot continue to live with a false sense of security in default of immediacy and visible dangers (Interviewee 5.1). All the experts interviewed cohere on the fact that governments should learn to manage uncertain scenarios, and proposed the same example, i.e. the current COVID-19 pandemic crisis, to depict the lack of adaptability and preparedness in Europe despite all the information that we had before states were closing boundaries. 'National and subnational authorities need to learn how to deal with such uncertain scenarios, and multi-level governance and decentralised cooperation are key to make societies more resilient and working towards effective and sustainable adaptation' (Interviewee 4).

If we focus on the science-policy interface, the role of the precautionary principle, one of the underlying principles mentioned by the UNFCCC (Art. 3.3.), should serve to deal with scientific and social uncertainties dealing with long time-frames. In other words, 'response actions should not be delayed in the name of absence of certainty because we are dealing with existential threats, because if something happens, the loss is so much bigger' (Interviewee 2). While policy-makers and the general public might encounter some challenges understanding and building on information from scientists that work on long time-frames, several options are possible to engage the different actors in a common problem. Science usually work in long-term scenarios, but Interviewee 1 clarified that other short- and medium-term scenarios are also assessed, and different actors might find it easier to build on that and propose adaptation solutions in their respective sector(s). Uncertainty needs to be understood not only on scientific terms, but multi-disciplinary research is important to reach a broader part of the society and make more actors play a dynamic role in climate governance structures. Multi-level and multi-actor governance facilitate this dynamism to governance structures.

#### 4.2. Multi-level and multi-actor governance: the importance of non-state actors

##### *A territorial approach: an appropriate 'landing' for global climate objectives*

Contemporary climate governance scholarship has shifted away from a top-down approach towards a more decentralised approach, combining a multi-level governance (MLG) and multi-actor perspectives (Jordan et al., 2018; Wurzel et al., 2019). Both perspectives share an amount of core assumptions, but 'conceptually they are *not* identical' (Wurzel et al., 2019, p.

2). They place different emphasis on the role of certain actors and types of leadership. While MLG accentuates the importance of the existing networks of actors between the international, supranational, transnational, national and subnational levels, it mostly focuses on *government* actors. This approach pays more attention to entrepreneurial and structural leadership, although cognitive and exemplary leadership are also recognised. On the other hand, the multi-stakeholder perspective underlined the attention that non-governmental actors (e.g. NGOs, the civil society in general and the private sector) should receive, without leaving aside the power of state actors. These multi-stakeholder settings allow for experimentation and leaning-by-doing, which translates into the cognitive and exemplary types of leadership (Interviewees 6 and 9).

Despite the conceptual power that MLG might offer, the actual governance structure implied within the concept can pose certain challenges. One of the main problems concerns the core values of our 'traditional' state-centred governance systems, namely clear lines of accountability and democracy (Interviewee 2 and 4). This issue is well-explained by Peters and Pierre, who called it the potential 'Faustian bargain' where the 'core values of democratic government are traded for accommodation, consensus and purported efficiency in governance' (2004, p. 85). Traditional climate governance systems cannot offer such efficient solutions, particularly when there is a need to 'land' global objectives into context-specific needs of a territory (Interviewee 7). However, it is also true that multi-level structures of governance are less transparent, more informal and might be difficult for external observers to trace back who took this or that decision. For this reason, it is important to *peel the layers of the onion*, as it was said by Interviewee 3. The different layers of governance need to have more or less defined roles in order for the coordination among actors to be efficient. The following table will summarise the main benefits and problems that might arise on different layers.

Table 4: Benefits and barriers at the different layers of governance.

		BENEFITS AND BARRIERS	
		INSTITUTIONAL ACTORS	OTHER ACTORS
LAYERS OF GOVERNANCE	INTERNATIONAL	<p>✓ Global objectives are necessary since they promote initiatives at inferior levels of action. Indeed, a lot of states started to take action once they signed international agreements.</p> <p>✗ International organisations and institutions do not have the capacity to address very local problems in an efficient and sustainable way. Their role is undeniable, but other levels and actors are needed to reach such localised objectives.</p>	<p>✓ We are moving towards a more inclusive governance structure, through the inclusion of other set of actors. For instance, NGOs are able to attend some UN negotiations as observer organisations.</p> <p>✗ Non-state actors do have a voice sometimes at international levels, but in most of the cases, they cannot participate actively in decision-making processes.</p>
	NATIONAL	<p>✓ The national level is crucial since it is the <i>traditional</i> level involved in all international negotiations. National governments are the ones that set up laws and regulations upon which the rest of non-state actors build their actions, this include for instance the conditions to guide the private sector and cooperation agencies.</p> <p>✗ The state can be a catalyst for certain aspects, but other actors need to work with state actors to fully achieve climate adaptation. State actors do not have the economic and human capacities, the intervention capacities for the societal transformation that we need to do so.</p>	<p>✓ The role of non-governmental actors at subnational levels is important to share the traditional knowledge and existing coping strategies, combining it with international resources and technology. While academic actors might have an extensive source of knowledge, civil society organisations might help getting closer to vulnerable communities and the private sector might help with its pragmatic views and complement adaptation with development benefits.</p> <p>✗ Not all non-state actors are going to serve the same functions. If we want adaptation actions to be sustainable, local actors need to be involved, and those ones are usually impossible to find online. Fieldwork is necessary and it goes hand in hand with building a network that transcends the duration of a policy or a project, and that includes different levels of expertise, actors, sectors and disciplines.</p>
	SUBNATIONAL	<p>✓ Sometimes LRGs are more active in climate action than the state level. In this case, this results in building climate resilience despite state's reluctance to do so. In other cases, these subnational levels just complement and what has been generally said at the national level.</p> <p>✗ Institutional barriers remain and such a coordination and participation of different actors is sometimes very difficult nowadays. Efforts should come from both governmental and non-governmental actors to evolve towards mutually beneficial partnerships</p>	

Source: Interviews.

These layers are exposed to realise how important coordination is, since all actors and levels are part of the same puzzle (England et al., 2018). Climate adaptation needs to take place alongside rapid social, health, education and economic changes due to its cross-cutting nature (Interviewee 8). Thus, adaptation needs to be mainstreamed into different sectoral policies at different levels despite the importance of localised actions. Indeed, local actions will not have a durable impact if there is not a vertical and horizontal coordination among actors (Interviewee 6). We are not talking about a bottom-up approach, but the need for a hybrid approach that combines the latter with the traditional top-down approach which is informed and harmonised. Greater policy coherence is thus essential to enable climate adaptation to become mainstreamed.

#### *Traditional knowledge and capacity-building*

Most local knowledge, local coping strategies and local understanding of existing risks are context-specific (Interviewee 3), and that is why it is not beneficial for large international institutions to downscale efforts to reach those levels – ‘so much effort is done for such a small delimited scope’ (Interviewee 2). International, supranational and national bodies have too many responsibilities to add detailed analysis of local knowledge to the list. However, traditional knowledge and capacity building are necessary to build resilience in a sustainable basis. In this sense, the European External Action Service or other supranational bodies would benefit from this approach in that a set of non-state actors might contribute to apply in external governance the MLG vision promoted by the EU within its borders (Interviewee 9). Both experts in EU’s external climate governance (Interviewees 8 and 9) agreed that all these non-traditional channels, levels of governance and non-state actors were getting more and more important in EU’s external climate leadership and diplomacy. One step towards that might be the European Climate Pact, adopted as part of the European Green Deal to ‘build on and amplify existing activities, trigger and embrace new ones, offering opportunities for learning, exchange, co-creation and collaboration’ (European Commission, 2020c). Although non-state actors are being increasingly accepted in climate governance structures, local communities, cities and regions were considered by the EU for a while in its external action (Interviewee 8). Despite EU institutions and member states being at the core of external relations, non-state actors increasingly contribute to climate adaptation challenges. Indeed, the EU is working towards the maximisation of multi-stakeholder networks’ capacities.

Capacity-building is also necessary to reach global climate ambitions and to reach an integrated and sustainable adaptation to climate change (Interviewee 8). In fact, support systems that envision how and where people are affected by climate impacts and how they see present and future risks are needed to prioritise actions as well as to build specific technical skills. International networks of cities and regions have currently achieved a global recognition in addressing climate impacts (Interviewee 7). Some examples are the Global Covenant of Mayors – ‘the largest global alliance for city climate leadership’ – (GCoM, 2020), and Regions4 – the ‘global voice of regional governments in the fields of biodiversity, climate change and sustainable development’ (Regions4, 2020). Unlocking the potential of subnational authorities is an important contribution towards the inclusiveness and capacity-building we are talking, but other non-state actors also need to be active at different levels of governance to equip local partners to achieve sustainable adaptation (Archer and Dodman, 2015). ‘Non-state actors have added value, capacities, human and economic resources, different ways of working and treating issues that should not go unnoticed’ (Interviewee 6). And linked to that argument, Interviewee 7 clarified that perceptions of risk are crucial since without the implication of the whole society and without considering their views, sustainable solutions are not possible. Solutions need to be embraced by the society and without an aligned action between government actors, the public and private sectors, education, media, civil society organisations and so on, sustainable adaptation is impossible. As other cross-cutting issues, climate adaptation needs the abilities of different stakeholders to build resilience and local capacities in a particular territory, and all interviewees agreed on that.

#### **4.3. Decentralised cooperation: building further alliances to strengthen climate governance**

##### *Spaces to share knowledge to be able to build on what it works*

As this thesis has been acknowledging since the beginning, subnational realities and actors are gaining importance at the international level, problems are increasingly interconnected and responsibilities more and more fragmented. As a result, it is evident that strategies need to be conceived in a way that considers different levels and actors’ strengths which can address local adaptation needs. Decentralised cooperation, multi-level governance and sustainable development are all parts of the same puzzle. State and non-state actors are

increasingly working together and in more inclusive ways to combat climate change and to make global objectives and proposed actions attain the local level. However, most international actions sometimes do not reach where it matters the most, and they do not consider community's priorities and perspectives, who would actually provide a clearer vision of climate impacts and needs (IBP and IIED, 2020). Without an adequate approach, the climate crisis will probably entrench or deepen existing inequalities (Interviewee 3).

There is an interesting argument that all the interviewees shared: as long as the proposed actions come solely from above – from the funding source –, as long as the response measures come from scientists from the 'North', the results suffer the potential consequences of not being sustainable or obstructing existing local knowledge. Even this division of 'Northern' knowledge and 'Southern' challenges is loaded with ideology that have negative impacts on the way knowledge is sometimes completely disconnected from reality. Indeed, the – usually neglected – knowledge from the 'South' is really useful, for instance, in terms of dealing with uncertainty, and it has not been considered until recently (Interviewees 2 and 4). According to Interviewee 3, 'even the best supporters of development tend to simply look at their own needs. Sometimes that coincides with what is needed by some countries, but it does not necessarily reflect the preferred and more sustainable means to carry out adaptation actions.' However, he staid positive and added that it is important to look at very specific examples that worked well, where there was serious engagement, to start building on that.

Decentralised cooperation is known to create appropriate spaces for that, by applying a co-production of knowledge while assessing local perceptions of risk and existing coping strategies at the very local level and sometimes at various levels. These inclusive and participatory aspects are the reason why decentralised cooperation is sometimes called 'the human face of international development' (European Union, 2017). This comes from the potential of decentralised cooperation to offer territories to build alliances so as to reach spaces where knowledge and efforts *flow* among territories, scales and actors. Additionally, such an approach needs to 'perceive the territories as multi-dimensional factors of development' to move away from cooperation projects that fixate on the bureaucratic bond among different actors rather than focusing on what is being done in practice (Interviewee 4). A good example to show this disconnection with local realities is that a lot of projects cost

millions of dollars when in certain cases what communities need might cost 50 dollars or some connections with territories with the same problem (Interviewee 2). The importance of *'landing global objectives'* (Interviewee 6), *'building up on existing knowledge and strengthen local structures to deal with adaptation challenge'* (Interviewee 5.1) and *'facilitating mechanisms where different actors might be able to participate and bring added value'* (Interviewee 4) is thus undeniable.

*Long-term partnerships with the most vulnerable people at their core*

For a while, cooperation has tried to adopt a horizontal approach by co-producing knowledge (Interviewee 6). Nevertheless, not only existing coping strategies and local knowledge need to be integrated in the assessment of cooperation projects, but vulnerable groups – i.e. those that are usually excluded from decision-making and are indeed at the frontline of climate impacts – need to be reached so that they could benefit from climate adaptation projects. *'Vulnerable communities understand local climate change impacts and what needs to be done, but they have the least resources and capacity to respond strategically'* (IIED, 2015, p. 1). An inclusive and participative decentralised cooperation not only would empower local authorities and other local actors, but it also ensures that vulnerable communities are brought into the discussion. Without forgetting about the importance of international cooperation and traditional governance interactions, decentralised cooperation provides tailored solutions to localised adaptation challenges while boosting community ownership and reinforcing capacity-building (Interviewees 5.1 & 5.2). *'Acknowledging the power imbalances that prevail at all levels – from households to global forums – is critical if we are to better understand and address them'* (IIED, 2015, p. 1).

The multi-level approach is thus *'essential to know the imbrications of the main actors playing at different levels'* (Interviewee 6), and cooperation needs to obey the same logics of governance in that it has to have a strategy, a tactic and an operative level to assess the obvious and hidden existing challenges (Interviewee 7). It is indeed at this operative level that people living in the most vulnerable situations and that face more challenges of adaptation need to be consulted to attain full inclusiveness and assess their realities to obtain a more complete picture of the challenges ahead. *'Diverse knowledge and approaches need to be*



deployed to understand and embrace climate related uncertainties in order to facilitate socially just adaptation' (Mehta et al., 2019, p. 1533).

As we have seen on this thesis, every level of governance has its meaning. The most technical part might be more efficient if carried out through decentralisation, but that does not rest importance to the different levels of governance. According to Interviewee 4, one of the remaining challenges for decentralised cooperation is to work on that coordination and complementarity among levels. This has to do with policy coherence once again. Indeed, the EU and its member states, European regions and cities as well as non-EU territories need to respect the responsibilities of the different governance levels and should work towards harmonisation to create sustainable adaptation pathways. As a matter of fact, even if cooperation projects have positive impacts at local levels, states and regions need to be coherent in terms of economic, environmental and other policies if there is to be sustainability. The EU is working hard to achieve such a coherence, working together with its member states and LRGs. An interesting example is found when we look at the work of the EEAS and the Directorate General on Development and Cooperation (DG DEVCO), which have both included different governmental authorities and increasingly more types of actors (Interviewee 8). It is evident that they are moving in this multi-level and multi-actor direction, complementing external governance efforts with soft governance tools like cooperation 'due to the added value of cooperating with actors who really know what is happening on the spot' (Interviewee 9). Decentralised cooperation could be an asset in that proximity to the territories is inherent to its meaning and that decentralised cooperation could easily complement traditional cooperation. In this sense, this type of cooperation would contribute to build flexible and dynamic alliances that transcend the duration of cooperation projects, and to increase effectiveness by complementing hard tools of governance with soft tools whose positive impacts reach the most vulnerable groups. Using the words of Interviewee 6, 'these alliances and their complexity need to be explained to the general public, the added-value of collective action needs to be emphasised and thing cannot be sustainable if there is exclusion'.

#### **4.4. Closing knowledge gaps: multi-disciplinary research and beyond**

##### *Knitting evidence-based narratives about daily-life visible changes*

Uncertainty is a challenge for societies where almost everything in their daily life's routine is certain. This might have repercussions in policy-making and climate budgets – including funding for cooperation. Although it might not seem important for sceptics in climate change, 'Europe is affected by indirect climate impacts occurring in other parts of the world in multiple ways, for instance through trade and supply chains, spread of infections, threats to international security, or [large] migration' trends (European Commission, 2020d). It is thus important to approach scientific facts to the whole society to bring action in all levels and engage as many people as possible. For that, it is essential to have an informed and educated society. Three main aspects are critical for this task: language, times and mixed profiles. 'Language is important to translate facts that might seem far away from our problems, to our daily reality' (Interviewee 7). People that do not suffer yet the impacts of climate change are not going to act without specific information about daily-life actions and implication. Indeed, 100-year climate scenarios, geoengineering or cooperation projects *far away* from "home" seem to pertain to another reality they feel they might never live. As a result, reaction might be inexistent – due to the false sense of security – or even negative – because of the connections to coercive measures or the increasing detachment from *business as usual* attitudes (Interviewee 5.1 and 6). In this sense, the time-frames we have mentioned in this thesis are paramount to try to move the scope from future generations to what is going to happen in the short and medium terms. And, finally, all the interviewees agreed on the decisive role of multi-disciplinary research to understand the impacts of climate change in every aspect in which societies might be affected. 'These points should let us build this pedagogy of climate change. Indeed, if we are able to educate society while weaving in stories told in very concrete terms, then people's behaviour changes' (Interviewee 6).

##### *Understanding and facing complexity*

'We need scientific data since it is fundamental for climate adaptation. However, there is always this adjustment between what could do a scientist for science and then the application of data into daily life events' (Interviewee 1). If scientific data is not translated into different type of knowledges, it will not reach part of the society. This disconnection to reality is one of

the main problems to attain an effective a coherent adaptation action. Interviewee 2 argued that, sometimes, even when the science and the knowledge is at the local level, solutions might still be unknown by local farmers, fishermen, construction workers and other sectors of the industry. The fact that academic actors have really good knowledge of science does not mean that such knowledge is going to be translated into equally sound knowledge at the level that matters, i.e. where adaptation is taking place. Applied research and the implication of local actors are deemed necessary to build sustainable and effective adaptation pathways (Clay, 2017). The goal is (i) to have a well-functioning governance structure (ii) that in a policy-making context would be able to transmit the results of the science from academia and technological advantages of the public and private sectors, (iii) into proper policy incentives and support, (iv) using all of that knowledge to reach the ground level and the realities of the most vulnerable people (Interviewee 2). However, this challenge is not only in hands of the government, but other actors are required to move beyond academic documenting processes and broad objectives to generate observable results at the ground level that, in addition, would legitimise climate budgets and policies.

The EU is doing efforts to promote multi-disciplinary research that reaches the ground level and involves multiple stakeholders to better govern climate change issues (Interviewee 8). If the whole society is not engaged, if people understand the challenges ahead as alien to them, adaptation governance will not be sustainable (Interviewee 7). For that reason, the necessity for transboundary ways of cooperation that embrace different levels and actors is so evident. For instance, the EEAS and the DG DEVCO are trying to work together towards mainstreaming climate change in EU Development Cooperation and External Action (European Commission, 2018). In order to do so, experts from diverse disciplines need to collaborate to make a coherent picture of what it needs to be done to complement and enhance EU's external climate governance (Interviewee 9). Indeed, interviewee 8 emphasised the importance of using different approaches when climate change and climate governance are assessed. The EEAS recognises other perspectives besides those of external policy and security. Foreign policy cannot leave aside climate interconnections with *inter alia* human rights, health issues, development, humanitarian assistance, energy, food security and gender equality. Multi-level, multi-actor governance and decentralised cooperation spaces are helpful for that.

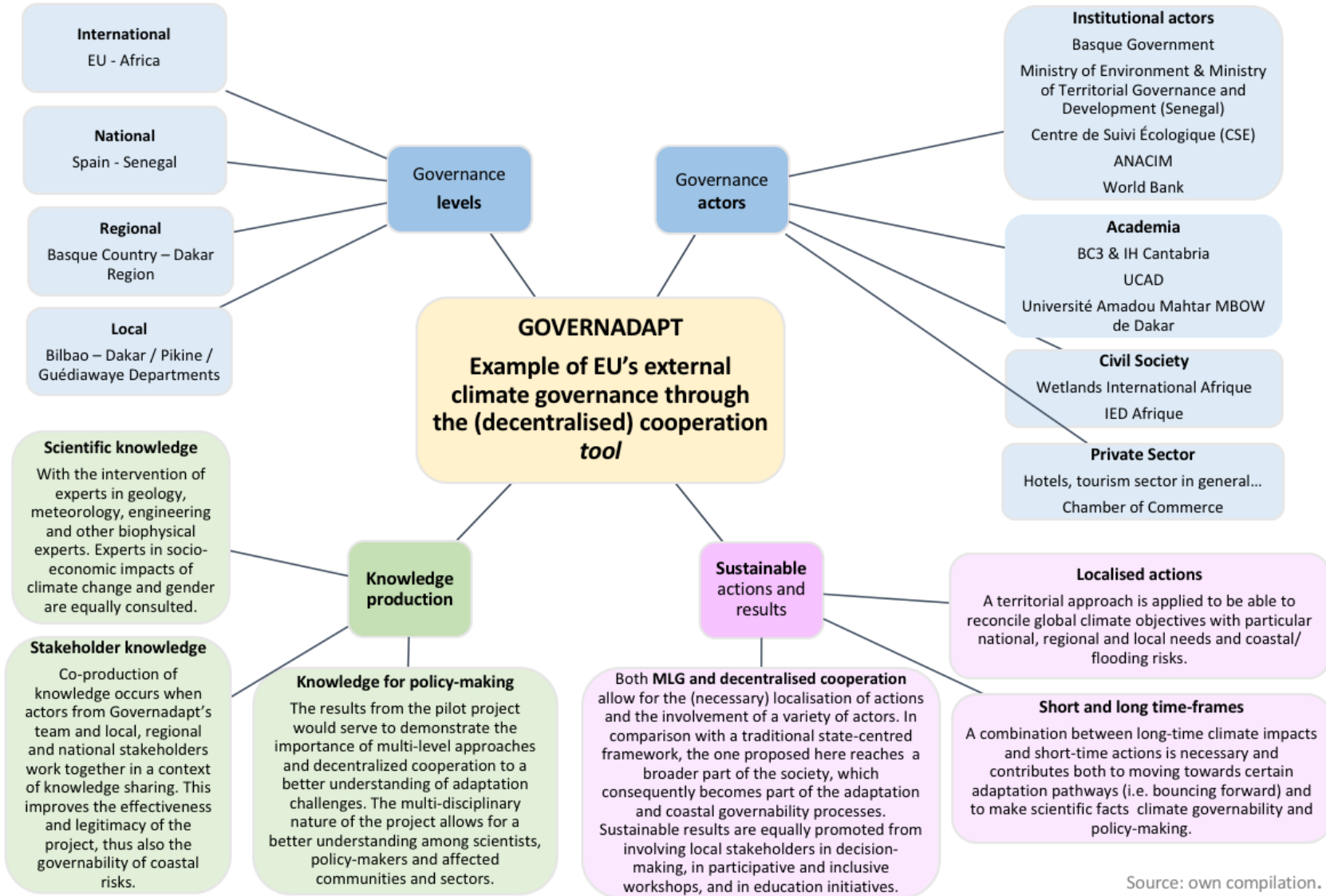
#### 4.5. Governadapt

Governadapt finds itself represented at the core of the scheme exposed at the beginning of the empirical chapter (Figure 8). This last section tries to explain as briefly as possible how the framework analysed in this thesis is applied in an ongoing project resulting from decentralised cooperation among EU and non-EU subnational actors. This exemplification tries to help obtaining a complete overview of the four narratives translated into a specific context of EU's external climate action through the lenses of the theoretical framework (Figure 9). Although Governadapt was designed as a pilot project in Dakar, its methodologies and technologies might be replicated elsewhere – contemplating context specificities. This way, the short-term benefits will be observed by Dakar's population, but the replication and applicability of the project elsewhere would open the possibility to benefit other territories in the medium and long-terms.

##### *MLG and decentralised cooperation at the core of effective external climate governance*

As we have observed, the localised aspects of climate impacts make an effective coordination of actions across levels essential for sustainable adaptation. In this sense, a local contextualisation of the impacts and needs becomes a requisite. The Governadapt project focuses on coastal risks and adaptation, particularly in the region of Dakar in Senegal. Governadapt has among its main objectives to understand properly the climate-induced and anthropogenic coastal risks for the region of Dakar contemplating data that goes beyond purely biophysical data. Coastal degradation not only involves scientific interest since it affects the whole society in that ten per cent of the world's population is accommodated in human settlements in coastal areas (CTCN, 2019, p. 60); areas that are also gateways for economic infrastructures, social interactions, and in Dakar, also for different hospitals, research institutes and universities (WB, 2018; ONU Habitat, 2020). Hence, aspects such as economic impacts of climate negative events, culture, gender inequality, or the local perception of risk and uncertainty are also considered in every 'step' of the project to identify informed and appropriate adaptation pathways.

Figure 9: *Governadapt*, a mapping exercise to contextualise the theoretical framework.



Governadapt's contributions to coastal adaptation are aligned with the economic, political and social objectives and strategies from Senegal, to promote policy coherence. Dakar is not the most affected region, but it does not remain exempt from the negative impacts of climate change. The socio-economic and physical consequences of coastal erosion in Dakar region are massive and they should not be neglected (Niang et al., 2010; WB, 2018). Localised actions will result from a detailed assessment of the risk and estimated projections, which is done through a dynamic process of engaging local stakeholders in a co-production and mutual learning environment. This is only achievable through an integral governance network where levels, actors and sectors find the right balance to contribute to each other's work and where challenges and solutions are understood by the whole population. Translating long time-frames in which scientists work to short-term steps is key to improve common understanding of the problem, to obtain better results and to reduce uncertainty (see the pink squares in Figure 9 for more details). This translation should also come in the form of multi-disciplinary knowledge, characteristic from Governadapt's team work. Summarised in green in Figure 9 we find the different types of knowledge around which a space was built to share ongoing results and efforts with different actors and levels.

Hence, despite the local focus of the project, stakeholders from different levels are involved to create a strong network that, ideally, would transcend the duration of the project. If we reflect on the importance of the different levels and actors in climate governance (see Table 4 above), we find that Governadapt aligns with the significance of MLG. We currently count with international, transnational and national stakeholders in our network. At those levels, most actors are mainly institutional and academic and usually have a strong influence in climate governance structures. Once we approach regional and local actors, the variety of actors increases, including institutional and academic actors, but also the private sector and civil society organisations for instance. These set of actors work in coordination at different levels thus promoting (re)actions and contributing to coastal adaptation strategies and needs in the West African coast, in Senegal, in the region of Dakar and particular communities within Dakar (see the blue squares in Figure 9).

The mapping scheme tried to make clearer how decentralised cooperation could encompass the imbrications between levels, stakeholders and their potential knowledge and capacities in climate external governance as a soft tool complementary to traditional governance. While the process of decentralisation is usually justified by its localised approach or *closeness* to citizens' needs, that does not mean that other levels are omitted. LRGs and other local actors would only be able to satisfy existing challenges on the ground in a more efficient manner if a good degree of coherence is achieved among levels of governance (Aray, 2018, p. 972). In sum, this mapping exercise is useful to demonstrate the applicability of decentralised cooperation as an interesting tool that complements traditional cooperation and hard instruments of external governance.

## 5. Conclusion

In this thesis I analysed the potential benefits of the combination of multi-level governance and decentralised cooperation approaches applied to EU's external climate governance. The research proceeded through a review of existing literature on both approaches, followed by nine interviews with experts from relevant fields for the research. Climate adaptation figures in this dissertation as the context where the theoretical framework is applied. Let us draw the discussion to a close during this concluding section by summarising the main points that have arisen during the thesis. The interview data allowed me to reach a better understanding of the research questions raised at the beginning of this study and this research constitutes my humble contribution to the assessment of all the information gathered during the process.

As it has been disclosed from the beginning, climate impacts are unfairly distributed around the world. The burden of climate change is indeed felt asymmetrically among countries, sectors and individuals. Not only have the most affected countries usually contributed far less to climate change, but they are also the least prepared to face the challenges (European Commission, 2019b, p. 16). For this reason, adaptation should be about people, about putting justice and equity at its core to understand local capacities and vulnerabilities; so as *to leave no one behind*. The EU is working hard on becoming a global climate leader, and a crucial task lies in contributing to the challenge of climate adaptation beyond its administrative borders. Through different initiatives on Climate External Policy such as the European Green Deal or the Global Covenant of Mayors, or on Climate Diplomacy through the EEAS' and DG DEVCO's work abroad, the EU is moving towards this collaborative *modus operandi*. However, soft tools of governance such as cooperation with non-EU territories might not seem as obvious as other ways of action. Further research should be done on the benefits of soft governance tools on EU's external climate change actions to reach the most vulnerable; and how these tools might also alleviate related problems that would happen within EU's borders otherwise.

The importance of soft tools of governance is emphasised since the beginning of this dissertation. *MLG was suggested to find synergies with decentralised cooperation – understood as a soft tool of external climate governance (RsQ1)*. These synergies seemed evident from the literature review, but their application to climate adaptation, and more



precisely to EU's external climate (adaptation) governance was one hypothesis that needed to be solved during the interviews due to the lack of literature thereof. Experts from the fields of climate adaptation, decentralised cooperation, MLG and EU's external climate governance agreed on the existence of these synergies and underline the complexity of the framework. Indeed, they all affirmed that the world is increasingly moving towards such a way of understanding climate governance. While complexity will remain at the core of the discussion, the connections between multi-level, multi-actor and decentralised cooperation approaches are recognised. These complex relationships would however create spaces for capacity-building, for context-specific flexible, dynamic and horizontal exchanges, that would enable coherent and more coordinated efforts towards sustainable solutions.

Once the framework – i.e. the synergies among the two main theoretical approaches – has been supported by the experts interviewed, *the dynamic potential of MLG and decentralised cooperation for EU's external climate governance was assessed (RsQ2). Uncertainty and long time-frames challenges* have been also evaluated to obtain a detailed picture of the potentialities and challenges ahead. Substantially, the analysis underlines that uncertainty was one of the main scientific, political and social challenges. The proposed framework would adequately reduce uncertainty and would also allow for a better comprehension of the complexities of climate change and adaptation. While scientific data creates better ways to prevent future climate events, a large part of the adaptation process concerns the involvement of the whole society in every step towards a resilient world. After all, there is no *one fits all* solution and societies are affected in different ways by climate impacts. A territorial approach is thus crucial to overcome problems at local levels, where vulnerable people and sectors need to have a word and capacity-building should be promoted. The burden that lies on the most vulnerable population must be shared and this framework complements existing governance structures to contribute towards this end.

In close relation with uncertainty, long time-frames block knowledge to reach different specialised publics and society in general. Scientists readily accept the impossibility of absolute certainty and thus work on long time-frames and suggest precautionary recommendations. However, policy-makers, businesses and other set of actors keep waiting for clear observational data before investing. For this reason, applied research is important

and it needs to be accompanied by a translation of technical and scientific knowledge to other disciplines to educate society on climate issues as much as possible. Clear barriers are the disconnection from the general public, and the difficult coordination among specialised levels and actors involved in climate governance. Knitting stories that bring people to act collectively and multi-stakeholder alliances go all along are thus crucial. Non-state actors are increasingly complementing the important work of traditional actors in climate adaptation, resulting in improving coherence of actions across levels and sectors, as well as with the specific impacts and needs of the respective territories. Soft ways of governance such as cooperation prove to be useful to achieve this coherence from global goals to local realities and to contribute to climate action in non-EU territories. In particular, MLG and decentralised cooperation are key components of the external governance *toolbox* since the inclusion of regional and local actors is pivotal to localise adaptation actions, but it also increases legitimacy and effectiveness to the governance structure.

The theoretical framework defends the existing interconnections among levels, actors, disciplines and climate risks, so that linkages cannot be broken when dealing with a global challenge such as climate change. Yet the answer should not be mixing all the risks together, but to structure the existing connections in ways that can actually contribute to context-specific needs. Hence, on the one hand, climate impacts do not exist in a vacuum but they usually exacerbate existing vulnerabilities. On the other hand, every actor has different interests, ways of working or to see climate issues, time-frames, methods, etc. Nevertheless, certain questions remain the same. Adequate adaptation and the *landing* of global objectives is in the interests of all. For this reason, MLG, multi-actor networks and cooperation – where local actors are empowered – are beneficial to create fair and inclusive solutions.

MLG and the decentralisation and share of responsibilities has been favoured by the EU since its creation, thus it is not surprising that the proposed framework is becoming increasingly evident in EU's climate actions. 'We are not starting from Scratch' (European Commission, 2020c) but we are moving towards complex and dynamic spaces where hybrid bottom-up and top-down approaches need to be reconciled with traditional and non-traditional governance actors. The EU owns the attributes needed to take on global climate leadership but non-state actors need to enter the governance structure if we are to minimise future unavoidable

climate impacts properly. The framework proposed allows for this complementarity to existing tools in a flexible way that allows for closeness to local realities, capacity-building and thus sustainability at its core. Yet this framework is not only important to research or for the fate of one project, but it is a start to grasp new possible ways of governance that bring us closer to a more resilient world.

## 6. Bibliography

- Aberbach, J.D., Rockman, B.A., 2002. Conducting and Coding Elite Interviews. *PS* 35, 673–676.
- Al Gore, 1992. *Earth in the Balance*. Houghton Mifflin, Boston, USA.
- Alliance pour Refonder la Gouvernance en Afrique (ARGA), 2015. *Répondre au Changement Climatique en Afrique: Une approche par la gouvernance des territoires*. ARGA, Dakar.
- Alves, F., Filho, W.L., Azeiteiro, U. (Eds.), 2018. *Theory and Practice of Climate Adaptation*. Springer, Cham, CH.
- Amara, R., Diop, M., Diop, C., Ouddane, B., 2019. The Senegalese Coastal and Marine Environment, in: *World Seas: An Environmental Evaluation*. Elsevier, pp. 855–873.
- Aray, H., 2018. More on decentralization and economic growth\*. *Papers in Regional Science* 97, 971–993.
- Archer, D., Dodman, D., 2015. Making capacity building critical: Power and justice in building urban climate resilience in Indonesia and Thailand. *Urban Clim* 14, 68–78.
- Arriagada, R., Aldunce, P., Blanco, G., Ibarra, C., Moraga, P., Nahuelhual, L., O’Ryan, R., Urquiza, A., Gallardo, L., 2018. Climate change governance in the anthropocene: emergence of polycentrism in Chile. *Elem. Sci. Anth.* 6, 68–79.
- Benz, A., Eberlein, B., 1999. The Europeanization of regional policies: patterns of multi-level governance. *J. Eur. Public Policy* 6, 329–348.
- Biedenkopf, K., Dupont, C., 2013. A Toolbox Approach to the EU’s External Climate Governance, in: *Global Power Shift (Comparative Analysis and Perspectives)*. Springer, Berlin, Heidelberg, pp. 181–199.
- Blatter, J., Haverland, M., 2012. *Designing Case Studies: Explanatory Approaches in Small-N Research*. Palgrave Macmillan, London, UK.
- Börzel, T.A., Risse, T., 2000. Who is afraid of a European federation? How to constitutionalise a multi-level governance system, in: *What Kind of Constitution for What Kind of Polity? Responses to Joschka Fischer*. European University Institute, Florence, IT.
- Bößner, S., van Asselt, H., 2017. *Understanding Climate Change Governance*.
- Brondizio, E.S., O’Brien, K., Bai, X., Biermann, F., Steffen, W., Berkhout, F., Cudennec, C., Lemos, M.C., Wolfe, A., Palma-Oliveira, J., Chen, C.-T.A., 2016. Re-conceptualizing the Anthropocene: A call for collaboration 39, 318–327.

- Burck, J., Hagen, U., Höhne, N., Nascimento, L., Bals, C., 2019. Climate Change Performance Index: Results 2020. Germanwatch, Bonn.
- Burris, S., 2008. Changes in Governance: A Cross-Disciplinary Review of Current Scholarship. *Akron L. Rev.* 41, 1–66.
- Clay, N., 2017. Integrating livelihoods approaches with research on development and climate change adaptation. *Prog Dev Stud* 18, 1–17.
- Climate Technology Centre & Network (CTCN), 2019. Climate Change Strategies 2020. Witan Media Ltd, Painswick, UK.
- Collins, M., Knutti, R., Arblaster, J., Dufresne, J.-L., Fichet, T., Friedlingstein, P., Gao, X., Gutowski Jr., W.J., Johns, T., Krinner, G., Shongwe, M., Tebaldi, C., Weaver, A.J., Wehner, M., 2013. Chapter 12: Long-term Climate Change: Projections, Commitments and Irreversibility, in: *Climate Change 2013 - The Physical Science Basis: Contribution of Working Group I to the Fifth Assessment Report of the Intergovernmental Panel on Climate Change*. Cambridge University Press, Cambridge, pp. 1029–1136.
- Conzelmann, T., Smith, R., 2008. Multi-level governance in the European Union, in: *Taking Stock and Looking Ahead*. Nomos, Baden-Baden, DE.
- Cotton, M., Stevens, E., 2019. Mapping Discourse on Climate Change Adaptation in the United Kingdom. *Wea. Climate Soc.* 11, 17–32.
- Di Gregorio, M., Fattorelli, L., Paavola, J., Locatelli, B., Pramova, E., Nurrochmat, D.R., May, P.H., Sari, I.M., Kusumadewi, S., Brockhaus, M., 2019. Multi-level Governance and Power in Climate Change Policy Networks. *Global Environmental Change* 54, 64–77.
- Enderlein, H., Wälti, S., Zürn, M. (Eds.), 2010. *Handbook on Multi-level Governance*. Edward Elgar, Cheltenham, UK.
- England, M.I., Dougill, A.J., Stringer, L.C., Vincent, K.E., Pardoe, J., Kalaba, F.K., Mkwambisi, D.D., Namaganda, E., Afionis, S., 2018. Climate change adaptation and cross-sectoral policy coherence in southern Africa. *Reg Environ Change* 18, 2059–2071.
- European Commission, 2020a. Cooperation with non-EU countries & regions [WWW Document]. URL [https://ec.europa.eu/clima/policies/international/cooperation\\_en](https://ec.europa.eu/clima/policies/international/cooperation_en) (accessed 5.2.20).
- European Commission, 2020b. Commission launches online public consultation on new EU strategy on adaptation to climate change [WWW Document]. *Clim. Action*. URL

- [https://ec.europa.eu/clima/news/commission-launches-online-public-consultation-new-eu-strategy-adaptation-climate-change\\_en](https://ec.europa.eu/clima/news/commission-launches-online-public-consultation-new-eu-strategy-adaptation-climate-change_en) (accessed 7.18.20).
- European Commission, 2020c. European Climate Pact [WWW Document]. Clim. Action. URL [https://ec.europa.eu/clima/policies/eu-climate-action/pact\\_en](https://ec.europa.eu/clima/policies/eu-climate-action/pact_en) (accessed 7.20.20).
- European Commission, 2020d. European Climate Change Programme [WWW Document]. Clim. Action. URL [https://ec.europa.eu/clima/policies/eccp\\_en](https://ec.europa.eu/clima/policies/eccp_en) (accessed 7.21.20).
- European Commission, 2019a. Special Eurobarometer 490. Report on Climate Change. European Commission, Brussels.
- European Commission, 2019b. Communication from the Commission to the European Parliament, the European Council, the Council, the European Economic and Social Committee and the Committee of the Regions. The European Green Deal (Communication). European Commission, Brussels.
- European Commission, 2018. Environment and Climate Change Mainstreaming in EU Development Cooperation: Briefing note for the OECD DAC peer-learning visit. European Commission, Brussels, BE.
- European Commission, 2013. Communication from the Commission to the European Parliament, the Council, the European Economic and Social Committee and the Committee of the Regions. An EU Strategy on adaptation to climate change. European Commission, Brussels.
- European Commission, 2008. Communication from the Commission to the Council, the European Parliament and the European Economic and Social Committee and Committee of the Regions. Local authorities: actors for development. European Commission, Brussels.
- European Commission, European Environment Agency (EEA), n.d. Adaptation Support Tool [WWW Document]. Clim.-ADAPT. URL <https://climate-adapt.eea.europa.eu/knowledge/tools/adaptation-support-tool> (accessed 5.8.20).
- European Union, 2017. Decentralised Cooperation: The human face of international development [WWW Document]. Capacity4dev. URL <https://europa.eu/capacity4dev/articles/decentralised-cooperation-human-face-international-development> (accessed 7.18.20).
- Fernández de Losada Passols, A., 2017. Shaping a new generation of decentralised cooperation. For enhanced effectiveness and accountability. Brussels.

- Fernández de Losada Passols, A., Calvete Moreno, A., 2018. Decentralised cooperation to achieve the 2030 Agenda: Towards a new generation of multi-stakeholder partnerships. Conference of Peripheral Maritime Regions (CPMR) & PLATFORMA, Brussels, BE.
- Galarraga, I., Sainz de Murieta, E., França, J., 2017. Chapter 8: Climate policy at the sub-national level, in: Trends in Climate Change Legislation. Edward Elgar, Northampton, pp. 143–174.
- Gaventa, J., 2019. How the European Green Deal will succeed or fail. E3G, Berlin, Germany.
- Global Covenant of Mayors (GCoM), 2020. This is a powerful and historic response to climate change [WWW Document]. Glob. Covenant Mayors Clim. Energy. URL <https://www.globalcovenantofmayors.org/> (accessed 7.20.20).
- Gupta, J., Grubb, M., 2000. Climate Change and European Leadership. Kluwer Academic Publishers, Dordrecht, The Netherlands.
- Hardin, G., 1968. The Tragedy of the Commons. AAAS 162, 1243–1248.
- Hooghe, L., Marks, G., 2003. Unraveling the Central State, but How? Types of Multi-level Governance. American Political Science Review 97, 233–243.
- Hooghe, L., Marks, G., 2001. European Integration and Multilevel Governance. Rowman & Littlefield, Boulder, CO.
- IIED, 2015. Vulnerable communities: getting their needs and knowledge into climate policy.
- Ingram, M., Ingram, H., Lejano, R., 2019. Environmental Action in the Anthropocene: The Power of Narrative Networks. J. Environ. Pol. Plan. 21, 492–503.
- International Budget Partnership (IBP), International Institute for Environment and Development (IIED), n.d. Getting Money to Where It Matters: Ensuring Funds for Climate Action Reach Those Who Need It Most. People, Planet and Public Finance.
- IPCC, 2018. Global Warming of 1.5°C. An IPCC Special Report on the impacts of global warming of 1.5°C above pre-industrial levels related global greenhouse gas emission pathways, in the context of strengthening the global response to the threat of climate change, sustainable development, and efforts to eradicate poverty. Cambridge University Press, Cambridge, UK.
- IPCC, 2014a. Climate Change 2014: Impacts, Adaptation, and Vulnerability. Part A: Global and Sectoral Aspects. Working Group II Contribution to the Fifth Assessment Report of the

- Intergovernmental Panel on Climate Change. Cambridge University Press, New York, NY.
- IPCC, 2014b. Climate Change 2014: Synthesis Report. Contribution of Working Groups I, II and III to the Fifth Assessment Report of the Intergovernmental Panel on Climate Change. IPCC, Geneva, Switzerland.
- Jänicke, M., Quitzow, R., 2017. Multi-level Reinforcement in European Climate and Energy Governance: Mobilizing economic interests at the sub-national levels. *Env. Pol. Gov.* 27, 122–136.
- Jordan, A., Huiteima, D., van Asselt, H., 2010. Climate change policy in the European Union: an introduction, in: Jordan, A., Huiteima, D., van Asselt, H., Rayner, T., Berkhout, F. (Eds.), *Climate Change Policy in the European Union: Confronting the Dilemmas of Mitigation and Adaptation?* Cambridge University Press, Cambridge, UK, pp. 3–26.
- Jordan, A., Huiteima, D., van Asselt, H., Forster, J. (Eds.), 2018. *Governing Climate Change: Polycentricity in Action?* Cambridge University Press, Cambridge, UK.
- Keohane, R.O., Victor, D.G., 2011. The Regime Complex for Climate Change. *Perspect. Politics* 9, 7–23.
- Knieling, J., Klindworth, K., 2016. Climate adaptation governance in cities and regions: framework conditions, theoretical concepts and research questions, in: *Climate Adaptation Governance in Cities and Regions: Theoretical Fundamentals and Practical Evidence*. Wiley Blackwell, Chichester, UK; Hoboken, NJ, pp. 1–20.
- Lenhart, J., 2015. *Urban Climate Governance: the Role of Local Authorities* (PhD Thesis). Wageningen University, Wageningen, NL.
- Longstaff, P.H., Armstrong, N.J., Perrin, K., Parker, W.M., Hidek, M.A., 2010. Building resilient communities: A preliminary framework for assessment. *Homel Secur Aff* 6, 1–23.
- Marks, G., 1993. Structural Policy and Multilevel Governance in the EC, in: *The State of the European Community*. Boulder, CO.
- Marks, G., Hooghe, L., 2004. Contrasting Visions of Multi-Level Governance, in: *Multi-Level Governance*. Oxford University Press, Oxford, UK, pp. 15–30.
- Mehta, L., Srivastava, S., Adam, H.N., Alankar, Bose, S., Ghosh, U., Kumar, V.V., 2019. Climate change and uncertainty from “above” and “below”: perspectives from India. *Reg Environ Change* 19, 1533–1547.



- Moser, S.C., 2010. Now more than ever: The need for more societally relevant research on vulnerability and adaptation to climate change. *Appl. Geogr.* 30, 464–474.
- Niang, I., Dansokho, M., Faye, S., Gueye, K., Ndiaye, P., 2010. Impacts of climate change on the Senegalese coastal zones: Examples of the Cap Vert peninsula and Saloum estuary. *Glob. Planet. Change, Quaternary and Global Change: Review and Issues Special issue in memory of Hugues FAURE* 72, 294–301.
- Niang, I., Ruppel, O.C., Abdrabo, M.A., Essel, A., Lennard, C., Padgham, J., Urquhart, P., 2014. Chapter 22: Africa, in: Dube, P., Leary, N. (Eds.), *Climate Change 2014: Impacts, Adaptation, and Vulnerability. Part B: Regional Aspects. Contribution of Working Group II to the Fifth Assessment Report of the Intergovernmental Panel on Climate Change*. Cambridge University Press, Cambridge, UK and New York, NY, USA, pp. 1199–1265.
- OECD, 2018. *Reshaping Decentralised Development Co-operation: The Key Role of Cities and Regions for the 2030 Agenda*. OECD Publishing, Paris, FR.
- ONU Habitat, 2020. *Recommandations d'Actions pour la Résilience et la Durabilité DAKAR*. ONU Habitat, Dakar, Senegal.
- Ostrom, E., 2010. Polycentric systems for coping with collective action and global environmental change. *Global Environmental Change* 20, 550–557.
- Parker, C.F., Karlsson, C., 2010. Climate Change and the European Union's Leadership Moment: An Inconvenient Truth?\*. *JCMS* 48, 923–943.
- Peters, G., Pierre, J., 2004. Multi-level Governance and Democracy: A Faustian Bargain?, in: *Multi-Level Governance*. Oxford University Press, Oxford, UK.
- Piper, C., 2020. Bushfires: Is the 2019/2020 bushfire season a portent for the future? *Interaction* 48, 17–23.
- Platforma, 2020. About decentralised cooperation [WWW Document]. Platforma. URL <https://platforma-dev.eu/about-decentralised-cooperation/> (accessed 3.24.20).
- Regions4, 2020. Regions4 Climate [WWW Document]. Regions4. URL <https://www.regions4.org/> (accessed 7.20.20).
- Rennstich, J.K., 2017. Multilevel Governance as a Global Governance Challenge: Assumptions, Methods, Shortcomings, and Future Directions, in: *Oxford Research Encyclopedia of Politics*. Oxford University Press, Oxford, UK.

- Savorskaya, E.V., 2016. European Union in Global Climate Change: before and after Paris. *Comparative Politics Russia* 7, 71–84.
- Scharpf, F.W., 1997. Introduction: the problem-solving capacity of multi-level governance. *J. Eur. Public Policy* 4, 520–538.
- Scott, C., 2009. Governing Without Law or Governing Without Government? New-ish Governance and the Legitimacy of the EU. *Eur. Law J.* 15, 160–173.
- Scott, J., 2011. The Multi-Level Governance of Climate Change. *CCLR* 5, 25–33.
- Spanish Institute for Strategic Studies (SISS), 2018. Strategic Dossiers 193 B. Climate change and its impact on defence. Spanish Ministry of Defence, Madrid.
- Stephenson, P., 2013. Twenty years of multi-level governance: 'Where Does It Come From? What Is It? Where Is It Going? *J. Eur. Public Policy* 20, 817–837.
- Tedesco, M., Moon, T., Andersen, J.K., Box, J.E., Cappelen, J., Fausto, R.S., Fettweis, X., Loomis, B., Mankoff, K.D., Mote, T., Smeets, C.J.P.P., van As, D., van de Wal, R.S.W., 2019. Greenland Ice Sheet. Arctic Program, Miami, FL.
- UNDP, 2010. Down to Earth: Territorial Approach to Climate Change.
- UNFCCC, 2015. Paris Agreement. Presented at the 21st Conference of the Parties (COP21), United Nations, Paris.
- United Nations, 1992. A/CONF.151/26 (Vol. 1) Report of the United Nations Conference on Environment and Development. UN, Rio de Janeiro.
- United Nations Development Programme (UNDP), 2019. Chapter 5: Climate change and inequalities in the Anthropocene, in: Human Development Report 2019. UNDP, New York, NY, pp. 171–192.
- UNSDG, 2015. Transforming our World: The 2030 Agenda for Sustainable Development. A/RES/70/1. United Nations Sustainable Development Group, New York, NY.
- Vermeer, E., 2019. A concise overview: How EU member states' national and regional programmes support local governments' development activities in partner countries. Platforma and VGN International, Brussels.
- Vinke-de Kruijf, J., Pahl-Wostl, C., 2016. A multi-level perspective on learning about climate change adaptation through international cooperation. *Environ. Sci. Policy* 66, 242–249.
- WB, W.B., 2019. The Cost of Coastal Zone Degradation in West Africa: Benin, Côte d'Ivoire, Senegal and Togo. World Bank, Washington DC.

- WB, W.B., 2018. WACA: West Africa Coastal Areas Management Program. From Shared Coastal Vision to Sustainable Reality. World Bank, Washington DC.
- Wurzel, R., Connelly, J., 2011. Introduction: European Union Political Leadership in International Climate Change Politics, in: Wurzel, R., Connelly, J. (Eds.), *The European Union as a Leader in International Climate Change Politics*. Routledge, New York, pp. 3–20.
- Wurzel, R., Liefferink, D., Torney, D., 2019. Pioneers, leaders and followers in multilevel and polycentric climate governance. *Environ. Politics* 28, 1–21.
- Yin, R.K., 2018. *Case Study Research and Applications: Design and Methods*, 6th ed. SAGE, London, UK.
- Ziervogel, G., Satyal, P., Basu, R., Mensah, A., Singh, C., Hegga, S., Abu, T.Z., 2019. Vertical integration for climate change adaptation in the water sector: lessons from decentralisation in Africa and India 19, 2729–2743.

# Annex I: Statement of Consent for participation in interviews

## STATEMENT OF CONSENT

for participation in Public Administration and Organisation Science graduation research

### **EU's external climate governance: the role of decentralised cooperation and multi-level governance in climate adaptation.**

With my signature, I, \_\_\_\_\_ (participant), confirm the following:

1. I have been given sufficient information about this research project. The purpose of my participation in this project has been explained to me and is clear.
2. I have been made aware by the researcher, Andrea P. Briones, that my participation is entirely voluntary. There is no explicit or implicit coercion whatsoever to participate.
3. I have been made aware by the researcher that I can terminate my participation at any time.
4. I have been given the explicit guarantees that the researcher will securely store the data and information provided.
5. This consent form is valid for this research, and all the data stored will be deleted at the end of the research.

Furthermore, regarding the handling of my personal data (*please check one*):

<input type="checkbox"/>	I declare that the researcher may not identify me by name or function in a report or publication using information obtained from me. The only personal data she might use is gender and field of expertise for methodology validation purposes.
<input type="checkbox"/>	I declare that the researcher may identify me by name or function in a report or publication using information obtained from me. I also allow her to use personal data like gender and field of expertise for methodology validation purposes.

Name:

Signature:

Date:

---

The undersigned, responsible for the research, hereby declares that the person named above has been informed about the aforementioned research.

Name: Andrea P. Briones

Position: Master's Student at UU and Research Assistant at BC3

Signature:

Date:

## Annex 2: Interview guidelines

The questions asked to the interviewees were fine-tuned to better adapt to the expert's field of expertise while keeping sight of the rest of the disciplines involved in this study. This method involves a certain degree of guidance and informed questions, to make experts express their point of view while imposing certain contextual limits. Hence, using the following as a guide, the interviewees were asked similar open-ended questions on the three core subjects to be addressed, which increases the synchronic reliability of the data obtained.

### **Beginning the interview (contextualisation)**

1. Greeting the respondents verbally – e.g. hello, good morning – and thank them to have agreed to take the interview.
2. Self-introduction
  - 2.1. Introduce my academic background and why I am doing this research.
  - 2.2. Contextualise – without giving too much details – the purpose of the research, in order to make the theoretical framework clear for the interviewees, since questions will be connected to it.
  - 2.3. Explain the threefold process of the interview: i.e. how to proceed with the interview. While the whole interview will be imbued with the perspective, opinion and experiences of a particular discipline, questions will revolve around the three disciplines at the core of this study: (i) climate adaptation, (ii) MLG/EU's external governance and (iii) decentralized cooperation.
  - 2.4. Inquire whether recording the interviews is acceptable e.g. 'would it be possible to record the interview?'
3. Ask if the person has any questions. If he/she does not, then start with the interview.

### **Obtaining information about climate adaptation**

4. Give a definition of climate adaptation to MLG, EU's external governance and cooperation experts.

5. Explain that you would first of all like to know more details about climate adaptation in order to be able to have an informed contextualisation for the theoretical framework later.
6. Ask questions about how to cope with uncertainty.  
*It is important to distinguish how different actors see uncertainty, to reach a common level of understanding to act on a coordinated way.*
7. Start a debate on the possibility and the difficulties to work on different time-frames to collaborate among actors.

### **Obtaining information about multi-level & multi-actor governance approaches**

*I made sure all the experts were familiar and they have worked in global multi-level networks.*

8. Give a definition of MLG to climate adaptation and cooperation experts.
9. Explain that you would like to turn to MLG to obtain information on the potential benefits and challenges of working at different levels and with different actors. Open a discussion on this.
10. Ask whether, in their opinion, this approach would reduce uncertainty and the challenges raised when talking about experts working on different time-frames.
11. Ask also about the perceived role of the EU in this complex international climate governance structure and whether the EU – a pioneer in MLG within its borders – uses or is increasingly using this same approach for its external actions.

### **Obtaining information on decentralised cooperation (applied to climate MLG governance)**

*I made sure all the experts were familiar and they have worked in cooperation projects.*

12. Give a definition of decentralised cooperation for climate adaptation, MLG and EU's external governance experts.
13. In a context of climate external governance, international cooperation plays an important role. How decentralised cooperation could complement existing efforts in state-centred cooperation?
14. Consult which are the main added values of decentralised cooperation according to the different experts.

15. Ask about their opinion on whether decentralised cooperation – i.e. a type of cooperation that begins at local and regional governments, but reaches the international and national levels and a wide variety of actors – would result in a more efficient, coherent and complementary climate governance.
16. Inquire about how the EU could apply/is increasingly moving towards the proposed framework in its external climate governance (EEAS workers' responses will be essential for this question).

### **Concluding the interview**

17. Make sure you leave 5 minutes to recapitulate what has been discussed.
18. Ask if something has not been mentioned in the conclusions needs to be added.
19. Finish the interview thanking again the interviews for all their help and time.