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*From meaning to action: 'possible worlds' and the collaborative implementation of Integrated Water Management in Colombia*

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# **From meaning to action: ‘Possible worlds’ and the collaborative implementation of Integrated Water Management in Colombia**

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## **Abstract**

The paper addresses the research question of how narratives help us to understand collaboration. It uses a combination of thematic and structural narrative analysis of narrative interviews to former participants in the debates about two initiatives within a large flooding-risk reduction project in Colombia in 2014. It illustrates the way a structural analysis can benefit from a previous thematic one, but also how the structural narrative analysis sharpens the understanding of meaning. The combination of tools supports the understanding of narratives and sense making as vehicles for collaboration in networks, through the way such collaboration impacts the agreement on the problems.

**Keywords:** Narratives, Colombia, Integrated Water Management, collaboration, networks, thematic narrative analysis, structural narrative analysis

## **1. Introduction**

This paper is an effort to provide an answer to the research question of how narratives help us interpret action. In this case, collaboration in the implementation of an Integrated Water Management policy in Colombia. Their hypothesis is that collaboration is easier to achieve when the actors collaborating make sense of the problems in similar or complementary ways. Common or complementary narratives lead to more collaboration, different and contradicting narratives make collaboration harder.

The paper builds on the results of earlier analyses that found agreement on the problem (problem structure, (Hoppe, 2010; Valdivieso, 2017a) significantly linked to collaborative implementation results of six IWRM projects in Colombia. Within the relatively most successful of those projects in terms of its completion, the Cauca River Corridor project. However, two initiatives are easily recognized by the actors in terms of having very different fates: the unanimously supported Connectivity Corridors and the highly contested Detention Reservoirs.

The paper is divided into seven sections. After this introduction, section 2 introduces the key concepts guiding the analysis: Narratives, possible worlds and problem structure. Section 3 describes the two methods used to make sense of the actors' sense-making: thematic narrative analysis and structural narrative analysis.

Section 4 explains the two cases -connectivity corridors and detention reservoirs, the key actors and their roles. Then in section 5 the thematic analysis is carried out, to be followed in section 6 by the structural narrative analysis. The discussion and some initial reflections on both limitations and promises of this approach are shared in section 7.

## 2. Analytical framework: narratives and collaboration

The main idea in this paper is that a path can be traced between the existence of certain narratives in organizations that are part of networks and the ease of collaboration, on issues related to those narratives, between those organizations. Narratives influence inter-organizational collaboration by increasing problem structure (Hisschemöller & Hoppe, 1995; Hoppe, 2010) among those actors with similar or complementary narratives. The proposition builds upon both the collaboration and the narratives literatures.

### **The conditions for collaboration**

Networks entered the public administration/public policy literatures as ways of organizing concerted action while not depending on hierarchy (O'Toole, 1997; Scharpf, 1994). The 'selling argument' has been the existence of a 'collaborative advantage', allowing for better results when governance networks are recognized, or even mandated and managed for dealing with collective problems (Klijn & Koppenjan, 2015). That is the starting point of the collaborative governance literature.

Some conditions have been found, however, that must be met to realize the collaborative advantage. There is some consensus on the literature about a number of them: trust (Ansell, 2007; Faerman, McCaffrey, & Slyke, 2001; Imperial, 2005); leadership (Faerman et al., 2001; Huxham & Vangen, 2000); interdependence (Ansell, 2007; Faerman et al., 2001; Imperial, 2005); an number of actors (Faerman et al., 2001; Pressman & Wildavsky, 1984).

A shared understanding of the problem is indeed present in the collaborative governance literature (Ansell, 2007; Huxham & Vangen, 2004). Although often understood as agreement on the large goals of the interventions -e.g (Van Meter & Van Horn, 1975), although with exemptions like Klijn and Koppenjan's 'perceptions' that also incorporate concerns about means (Klijn & Koppenjan, 2015, pp. 46-49).

The conceptualization of that shared understanding in terms of problem structure (Nutt, 2002; Simon, 1973; Thompson, 2003) and specifically collective problem structure (Hisschemöller & Hoppe, 1995; Hoppe, 2010) draws attention to the relevance of the means/valid knowledge dimension of problems for collaborations, beyond the often wider consensus on goals.

Previous research on six pilot projects implementing Colombia's new Integrated Water Management Policy (Valdivieso, 2016) found that, among the five conditions listed above, a configuration including trust and problem structure had the best results in terms of implementation pace (Ragin, 2008; Rihoux & Ragin, 2009).

## Narratives

The power of narratives upon decision-making was demonstrated by Hajer (Hajer, Hoppe, Jennings, Fischer, & Forester, 1993) through the way narratives about "valid science" ended up binding the British government to take action to prevent acid rain after a project with the participation of the Royal Society -the paramount of the positivist science that it considered "valid"- came up with results supporting the need for it (Hajer et al., 1993, p. 59). Other analyses have confirmed their influence in different contexts (Bridgman & Barry, 2002; Leong & Lejano, 2016).

In Hajer's conceptualization of *discourse coalitions*, the story lines (narratives), and the actors that use them mix with the practices that conform to those story lines, *all around a discourse* (Hajer et al., 1993, pp. 45-47). So narratives are not "tales about action", but they shape action as well.

R. Lejano, Ingram, and Ingram (2013) built upon the work of Jerome Bruner to explain *how* narratives can make networks 'communities that narrate themselves to existence'. They "describe networks not only in terms of structure -as classical network analysis does- but in terms of substance". In other words, narratives are the glue keeping the network together.

Narratives forge links "between the exceptional and the ordinary" (Bruner, 1990, p. 47), in a way that ensures that the occurrence of perceptual conflicts will be minimal. First, people put their stories together in a form that new events (all events) will accommodate to a narrative long-before conceived (Bruner, 1990, pp. 47-50).

But what if something new is not so easy to accommodate? Here comes the element of narratives that might turn out to be more interesting for network analysis. "When we are puzzled by something, we renegotiate its meaning in a manner that is concordant with what those around us believe". This is what one could expect to happen in networks like teams or organizations. The act of recall is "loaded" and indeed "a reconstruction designed to justify" (Bruner, 1990, p. 58). One of the most important features of narratives is how they influence what will be considered "valid knowledge".

From a constructivist starting point, Bruner looked at narratives as providers of something that concepts more familiar in the collaboration literature -shared beliefs, shared understanding of the problem and common goals (Ansell, 2007; Huxham & Vangen, 2004; Van Meter & Van Horn, 1975) can't: the possibility of ensuring a non-problematic interpretation of *new* information. Through the creation of what he called *folk psychology* -and sometimes just "common sense"- individuals in a group develop a sense of what actions should be expected in a given situation and how some information should be interpreted to correspond to the canonical representations of the social world, "or if it

cannot be so altered, it is either forgotten or highlighted in its exceptionality”. (Bruner, 1990, p. 56).

For Bruner, narratives are not mainly ‘an act of language by which a succession of events of human interest are integrated”, but better “the primary way of organizing memory for human beings”. Hermeneutically, narratives can be understood as the ways the narrator *makes sense* of information as it is recalled (Wagenaar, 2014).

Narratives create *possible worlds* for action among those who share them, facilitating collaboration among them -and limiting it with those who don’t share the narratives.

Building upon both the collaboration literature and the works of the narrative-networks approach and Bruner’s approach to narratives, this paper aims at identifying shared and complementary narratives in the stories of the actors about the detention reservoirs and the connectivity corridors cases. Those narratives can be identified, it is argued, not just in terms of themes but also with regard to the intensity of their meanings.

### 3. Methods

The analysis is divided into a thematic narrative analysis and a structural analysis.

In terms of *data collection*, it included four narrative interviews with participants in the connectivity corridors and the detention reservoirs debates. Two of the interviewees -the Asocaña representative and the head of the Dutch consultants’ team- discussed both of the debates. The other two interviewees both represented CVC, each one for one of the cases.

Documents produced by the organizations represented by the interviewees were also analysed: a power point presentation of the CVC team (regional environmental agency), a proposal by Asocaña (sugar cane growers’ association) on a related topic also discussed in the Cauca River Corridor project -wetland demarcation- and three reports by the Dutch consultants’ team led by the Arcadis firm, also with participation from Deltares and other organizations (Dutch consultants). Those interviews were conducted in September 2016 and March 2017.

For *data analysis*, the first step was a professional transcription of the interviews, with each transcript checked against the audiotapes for accuracy. After an initial reading aimed at understanding the general content of the interviews, a second reading of the transcripts took place in order to identify the themes and, then, a third reading took place in order to identify the clauses. With the goal of keeping them user-friendly both for the thematic and the structural analysis, the stories were *not* divided into numbered lines (Riessman, 2008; Robichaux & Clark, 2006) but kept in the form of ‘scenes’ that facilitated theme identification while also supporting clause-type recognition.

*Thematic narrative analysis* (Feldman et al., 2004; Riessman, 2008 but also R. P. Lejano and Leong (2012)). This method was used to identify common, but also complementary narratives between actors. Complementary narratives were defined as those that, not being identical to those of another actor, can easily lead to agreements on a specific

problem -for instance, narratives prioritizing ‘the feasible’ and ‘small wins’ in the connectivity corridors case.

Unlike in Feldman, Sköldberg, Brown, and Horner (2004), there was no attempt to identify theoretical opposites to the themes pictured positively in the narratives, but the comparison was made with the existing alternatives, for which the clarification of meanings brought by the abstract and evaluation clauses analysis was supportive.

Thematic narrative analysis has been used in public administration and public policy research (Bridgman & Barry, 2002; Ching, 2010; Feldman et al., 2004; Ngoasong, 2014), as well as for understanding networks (Zølner, Rasmussen, & Hansen, 2007).

The thematic analysis limited itself to identifying sets of themes, common or complementary, between the different stories as narrated by the interviewees. It was the researcher’s task to identify the themes. The themes were identified in both the narrative interviews and the documents produced by the actors that were analysed, according to the codes that emerged in the open coding.

The second step was the *structural narrative analysis* (Riessman, 2008) of the responses of the four key actors, using Labov’s (1972) categories of abstract, orientation, complicating action, evaluation, resolution and coda. Structural analysis of the stories often leads to a more precise identification of the ways the narrators make sense of them (Riessman, 2008, pp. 131-139). For Bruner as well, the meaning of the elements of the narrative is given by their place in the overall configuration of the sequence (Bruner, 1990, pp. 43-44).

In these cases, attention was paid to the presence of all the clauses in the stories, but also to the content of the abstracts and the evaluations in particular, with the idea that they condensate the essence of the way the actors make sense of their stories.

The expectation is that, in a coherent narrative, the main themes identified in the narrative analysis will be somehow recognizable in the structural analysis, especially in the abstract and the evaluation. The structural analysis, and specially the identification of the abstracts and evaluations, should allow for a more in-depth understanding of the *meaning* of the themes for the actors.

**Table 1. Narrative elements in the structural narrative analysis**

<b>Narrative elements</b>	<b>Definitions</b>	<b>Examples from interviews</b>
Abstract (AB)	Summarizes point of the narrative	This other debate was longer, deeper, more technical, more agitated
Orientation (OR)	Provides details in time, place, situation, actors	CVC was born as a development organization back in 1954
Complicating action (CA)	Describes sequence of actions, crisis, problem	We had frequent socialization workshops where we would share the

		new proposals in the project
Evaluation (EV)	Narrator's commentary on complicating action	So in a way this plan goes back to what the original Cauca River regulation project was
Resolution (RE)	Resolves plot	It was the time when the director decided to take water reservoirs out of the list of the measures under consideration
Coda	Ends narrative: returns listener to present	That was a very brief resume of what detention reservoirs were and why some actors opposed them

**Source: The author, adaptation from Riessman (2008)**

#### 4. The Cauca River Corridor Project: connectivity corridors are welcome; water reservoirs are not

The Cauca River Corridor project had a clear aim: to reduce the expected impact of heavy rains in term of flooding in the Rio Cauca Valley, in South-Western Colombia. In previous analysis, the levels of both trust and problem structure between the actors in this project had been identified as high (Valdivieso, 2017b).

However, the levels of problem structure were different for two of the initiatives in the project: the connectivity corridors that should help protect a series of species while also contributing to regulate the influx of water to the river, and the detention reservoirs aimed at absorbing part of the excess water in situations that should occur every 30 years.

The area of interest of the project was the Upper River Cauca Valley, a plain with soil formed by the degradation of lake and river sedimentation, that includes the river's protective layer, wetlands and some segments of forest. It starts in the *La Salvajina* dam and stretches for 425 kilometers (if measured along the riverbed).

The population of corridor in the department of Valle del Cauca can be calculated in 3.7 million, including 2.4 million people in the city of Cali. It accounts for some 40 per cent of the combined area of the departments of Cauca, Risaralda and Valle del Cauca, but over 78 per cent of their combined GDP. So it is easy to understand the importance of protecting this area in both human and economic terms.

Although there were thirteen important organizational actors in the implementation of the project, including the Ministry of the Environment and three universities, the essential

actors regarding decision making in these two cases are three: the regional environmental agency (CVC), the sugar-cane growers association (Asocaña) and the Dutch consulting consortium hired by the *Rijksdienst voor Ondernemende Nederland* to contribute to the project.

The CVC, being the environmental agency in the region, was legally responsible for the project and the adoption of the measures that were prioritized. And Asocaña was the main representative of the private sector in whose land, and with whose cooperation, most of those measures had to be implemented. The Arcadis-led Dutch team, on the other hand, had no decision capacity being just consultants to CVC, but they could influence the prioritization of alternatives and the decisions of their client.

### *Detention reservoirs*

The *detention reservoirs* were proposed to be used in the event of large floods, expected to happen once every 25 years or, with climate change, perhaps every 10 years. They would be located in specific places by the river, and they had to be ready for intentional flooding, canalizing water to them, in order to prevent the flooding of neighbouring areas.

The reservoirs were proposed by the regional *Universidad del Valle* (Univalle), which presented the idea to the CVC. The Univalle document with the proposal cites the idea as inspired by the Dutch ‘Room for the River’ approach, but also explains the experience of the Parma River in Italy (Valle, 2014).

The detention reservoirs were initially supported by the environmental agency (CVC), and also by the Dutch consulting consortium hired to advise the project. But the proposal had a very bad reaction from the sugar cane growers’ associations, Asocaña and Procaña, in early 2014. The opposition was fierce, and even led to Asocaña hiring an engineering firm to work as its consultant to evaluate not only that one, but all proposals made within the project.

Cane growers also sent dozens of letters to CVC’s director general protesting the idea that, “just by being announced” reduced the value of their properties -because it was interpreted like meaning their properties could become “lagoons” to help canalize floods. CVC excluded the idea from the final version of the project in late 2014. This calmed the cane growers’ concerns and therefore paved the way for the project’s completion, which happened in mid-2015.

### *Connectivity corridors*

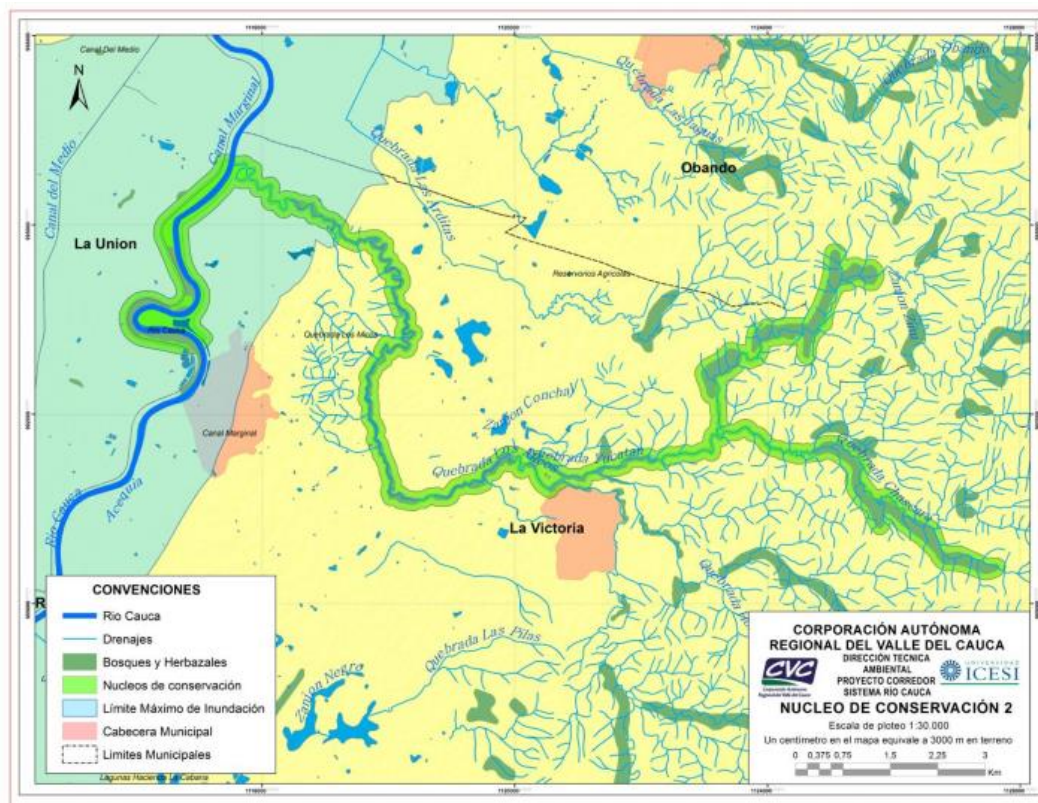
The connectivity corridors, on the other hand, were proposed by the ICESI university as a mean to regulate floods by creating space with minimum, and very specific cultivations, where animals could circulate between the non-so-distant mountains and the river. There needed to be some specific kind of trees along the corridor to provide shadow and shelter to the birds and other species. And, an important point, they had to be connected to the watersheds near the main river course. Thus, in order to protect the birds and other animals, native trees had and watersheds to be preserved as well.



As the name suggests, these were “corridors” stretching for tens of kilometres between the riverbed and the mountains. Implementing them demanded the separation of land in the cane plantations for the purpose, on a permanent fashion. This would, of course, reduce the profitability of the cane plantations, although not in an unbearable way since only a part of the area of a farm had to be devoted to the corridor, but some lines of trees along a few hundred meters of width.

The detention reservoirs needed large spaces in a farm to store water in the event of flooding, while the connectivity corridors demanded smaller areas along each one of the farms in the corridor. Yet it is also true that the corridors were deemed to be permanent, while the reservoirs were expected to be used in extreme events that are expected to occur only once in three decades.

**Figure 1. A connectivity corridor**



The light green is the area of the corridor, communicating the smaller water sources upstream with the river, and creating a safe passage for animals through the sugar cane plantations towards the river and back.

**Source:** CVC (2015)

## 5. Thematic analysis: Floods, benefit-cost and agreement

A thematic narrative analysis of the stories about the detention reservoirs and the connectivity corridors quickly shows different priorities for the three key organizations.

Analysing first the whole, and taking the number of quotations about the 'what is more relevant' theme as guide, the CVC placed a great emphasis on floods and flood control, as it could be expected, but also on Governance, planning for the long run and knowledge, being knowledge reflected mainly in having the type of information that was needed for planning, and often in having the detail required in the information.

For the Dutch consultants, the priorities were the inclusion of the different parties in decision making, working on agreements and looking for win-win situations, dominating among a bigger number of themes considered 'relevant'. They were, of course, clearly interested in flood control.

For the sugar-cane growers the world seemed to be simpler, since there are only four key general themes: knowledge -and within knowledge, what is or not 'technical', money and the profitability of land, land rights and the norms.

### *Connectivity corridors*

These observations become more significant when focusing on the specific cases. We'll start by reviewing what happened in the connectivity corridors case. One excerpt from the story can be useful to illustrate this point. CVC is addressed here as 'the Corporation'.

#AC 3:110

This connectivity corridors idea has been used by the corporation for a long time, it is not ICESI University that invented it or that because of this study they said that it had to be done in a given way, it's been one of which the corporation has been talking for a long time, and where we have had the opportunity to work with wetlands, or with the Cauca River's riparian zone or in other agreements or processes with the Corporation, they have always insisted on the importance of having connectivity corridors.

For the CVC, on the other hand, the story was not fundamentally about knowledge, or agreement, or humans. According to the number of times a code was used, it was mainly a story on conservation by itself. About what is happening to nature in the context of increased economic activity -well beyond sugar cane production, including mining- and about what is needed to preserve some biodiversity. It is largely a story about restoration -since conservation is considered increasingly out of reach in several areas of the country - and about 'what is feasible', acting without great ambitions and achieving whatever can be achieved.

A small segment of the story conveys the message:

#CS 2:294

Then the idea was: What we have with the highest plant cover, let's try to strengthen it more so that it keeps the services it's already providing and then we start from having the structured corridors goal closer (so) that, that we can start working on the functions....

The vision of the Arcadis-led Dutch consultants is closer in this case to the perspectives of Asocaña than to those of CVC. The story is much about the need to convince and to gain support from the landowners for an idea that contributes to additional goals, *apart from flood control in the Cauca River*. There is a Dutch expression for this, that could be translated as 'doing work with work'. It was also about building agreement, and there was a clear consciousness about the loss of profit that every measure affecting their land brings to the sugar cane growers. But according to the number of quotation of themes, it was by a great distance about the costs of the measure.

A short illustration from the story:

#DC 1:80

Well, in the case of the agricultural producers, the problem is that with each intervention they lose space for cultivating. Then it's not easy to convince them.

The three stories are indeed very different from each other. But the 'worlds' they describe are not incompatible. For Asocaña the proposal was well-known already. For CVC it was an exercise of realism. For the Dutch consultants, it was an exercise of patience and gaining support, a vision that, as mentioned above, was closer to that of Asocaña, but was not contradicting, and in fact was complementary to, that of CVC. The 'feasibility', low-ambitions approach by CVC resonated perfectly with Asocaña's positive attitude towards the initiative and with the 'explain' and 'build from small wins' approach of the Dutch consultants.

#### *Detention reservoirs*

Starting this time with the story from the CVC side, the thematic narrative analysis tells us that it is a story about flood control, very clearly, but where also knowledge is important -because the proposal was *not correctly understood*- and about culture, and about (lack of) trust in the State. A measure aimed at being implemented in the long run was plainly rejected almost from the beginning due to the opposition of the landowners with which 'the Corporation' was trying to build a relationship of Governance.

#MS 3:7

Then we realized that the interpretation of the reservoirs was mistaken, very likely because, retrospectively analysing what happened, when we made the maps with the reservoirs, the area to be occupied during a flooding was painted blue. But that is a temporary matter, associated to some compensation measures or incentives. But we came to the conclusion that the landowners understood that those places were going to become a lake, so it goes without saying, they rejected the proposal.

For the landowners, it was *not* about understanding, but it was indeed about knowledge, about what is technical, about uncertainty about the effects of a proposal and about looking at what is known instead of trying to implement other, less known ideas. And it was also a story about their rights over their land and measures that could affect those rights. It was also about the need for agreement in order to implement any measure.

A passage from the story explains the importance of 'the technical' in the discussion. Explaining what happened when the cane-producer association suggested to the CVC team to drop the detention reservoirs proposal, the story goes like:

#AC 3:90

Then they said ‘no’. We insisted again with technical arguments, and they told us again that they wanted to keep the possibility, they tried to explain in technical terms what was it about, what detention reservoirs were...

What about the Dutch consultants? In this case again, and looking at the frequency with which a theme was brought up in the story, they saw the problem very much in the same light that CVC: as mainly a communication problem, where a map of the detention reservoirs was drawn showing ‘blue lagoons’. The knowledge dimension does not stop in communication, anyway, but it includes also the technical: the flood risk will not be lowered enough without the detention reservoirs. It was also an inclusion problem: the likelihood of successful implementation depends very much on how they are included. And finally, it was a compensation problem: at the end of the day, the landowners had to be compensated for their losses, but not necessarily by the State, but by the landowners not affected due to the reservoirs.

As the leader of the Arcadis-led Dutch consultancy team put it:

#DC 1:87

Anyway...I don’t think we can solve or overcome, the, the risk of flooding in the Valley without using these detention reservoirs. But other names can be used, or a communications strategy be established, to make sure that everyone understands well what the goal is with those areas...

The thematic analysis shows a key role for knowledge in all the detention reservoirs stories. But it is interesting how the long-run vision, culture, Governance or trust in the State are only present in the CVC story, while awareness of the implications of the measure upon the profitability of the farms or the need for compensation were common to Asocaña and the Dutch consultants but not to CVC. In this case, both the consultants to CVC and the sugar cane growers made sense of the events in a very different way that CVC did.

**Table 2. Main themes in the stories: Connectivity corridors and detention reservoirs**

Main themes	CVC	Asocaña	Consultants
Connectivity corridors	Restoration, feasibility, knowledge, land use/ownership, the field	Knowledge, money, land use/ownership, the field, flood control	‘Do work with work’, inclusion, agreement, money, win-win
Detention reservoirs	Knowledge, culture, trust in the State, long run, Governance	Knowledge, uncertainty, benefit-cost, land use/ownership, agreement	Knowledge, communication, the technical, money, cost-benefit, compensation

**Source:** Elaborated by the author

## 6. Structural analysis: A 'non problem' and a 'battle'

The structural analysis to be shown below focused on identifying Labov's clauses in the different stories, and a second step, on looking for meaning in the abstract and the evaluative clauses when they were present.

In the connectivity corridors discussion, two of three narrations are 'fully fledged' stories, while the Arcadis-led Dutch consultants' story lacks an abstract. But although the Asocaña story *does* have an abstract, the content in the abstract shares the message that it is, perhaps, not important. Therefore there is only one in the three abstracts that shares some message in a clear way.

The detention reservoirs stories have a different situation: two of the three are 'fully fledged', also with a clear meaning. The one that is not fully fledged is also meaning the abstract. In this case, it is the CVC story the one missing the abstract.

What are these stories about, if we focus on their abstracts and evaluation clauses to identify meanings? In the connectivity corridors case, they are about a 'save what you can' situation (CVC), about a 'non problem'(Asocaña) and about...not clear what it is (Dutch consultants).

In the detention reservoirs case, on the other hand, one of the stories is about a 'not viable' proposal (Dutch consultants), one about 'a battle' (Asocaña), and one about...not sure (CVC).

### *Connectivity corridors*

Let's analyse in more depth the connectivity corridors abstracts and evaluation clauses. Beginning with the CVC story, this one has a powerful abstract. When asked to remember how did that debate start and tell 'all he can about connectivity corridors' the CVC representative starts his story:

(AB) Well, they start...It is grave, right?

After that he proceeds telling about his academic background (Biology), about his interest in conservation, and about how conservation is beginning almost impossible in several regions in Colombia, where humans have intervened Nature so much that restoration is the only viable option. There's less and less space for conservation.

What about the evaluation clauses? There is only one evaluative segment in a long narration mostly devoted to explain how conservation should be done. And the heart of that section is a reasoning about capabilities.

(EV) We cannot expect that the Corporation will do the restoration, or that the Ministry will do it, or anyone, without preventive actions by the landowners. Because it is one thing to have the permission to do the things, assuming there are norms allowing you to do them, and it is another thing to do the restoration exercise

In the CVC connectivity corridors story, both the abstract and the evaluation clause send the message that something grave is happening and that the Corporation cannot stop it by itself.

Let's now look at the Asocaña story. The abstract conveys a very different message. Asked to remember 'all he can' about the connectivity corridors proposal, the narrator starts this way:

(AB) It was many years ago, I'll try to remember. The process in general, I don't have much detail when it started because my memory is not so good

The message, if any, is that the event is not very important for the narrator. Specially if we compare it to the abstract by the same narrator about the detention reservoirs, that had been debated at the same time than the connectivity corridors were -two years before the interview took place.

What do the evaluation clauses tell us in the Asocaña story? In these cases there are two evaluation clauses. In the first of them, the narrator is recalling how the connectivity corridors initiative was introduced, how it was difficult for people in his team to understand what the purpose of the intervention was due to their professional background, and makes a strange association to one of the implications of establishing connectivity corridors:

(EV) but we did not see what the relevance of the microorganisms theme was

The second evaluation clause reinforces that impression of a 'non important' subject:

(EV) It was difficult, but this connectivity corridor was not a theme that's in my mind as one of tough debate, not this one, it is more thinking of the implementation in the field that a longer process seems likely

This is why the Asocaña connectivity corridors story could be called a 'non problem' story.

Finally, the Arcadis-led Dutch consultants' story. This is the connectivity corridors' story where the abstract is missing, and if the abstract condensates the way the narrator makes meaning of the story, this absence might be telling.

There are five evaluation clauses in the story, however, thus jumping to the conclusion that it is not important for the narrator looks precipitated.

What is the content of those five evaluation moments? One is about the understandable difficulty to convince the sugar cane producers. Another one, about the fact that despite the scepticism of many, several of them were ready to join the corridors. The third one, on the lack of tools available for CVC to force those unwilling to participate. The fourth one on the importance of using 'windows of opportunity' to advance and convince others, and the fifth one on the choice between 'patience' -like the narrator has been suggesting- or 'a strong government'.

(EV) But that is something that requires time, then it is necessary to speak a lot, and speak again, and...repeat and repeat and at the end expect that the persons that we need to convince are convinced, to be able to implement the necessary interventions. Then it is a process that demands patience, or a strong government that can really do, that has the tools to enforce, enforce, new ideas, and that has the possibility to compensate

The message in all the evaluation clauses was consistent. The connectivity corridors were seen, from the Dutch consultants' perspective, as a measure that would depend mostly on the capacity to convince the sugar can producers. They -the landowners- had legitimate concerns about their profits, and CVC had no tools to handle the situation differently. It was clearly not a priority, but it also didn't look like 'a non problem'.

### *Detention reservoirs*

Let's start with CVC again. In this case there is no abstract for the story. It starts with the presentation of some orientation clauses.

As for the evaluation clauses, there are three of them, all developing the idea of a 'wrongly understood' proposal. One of three evaluation moments is reproduced below. It starts with the explanation of how a 'de facto' detention reservoir, organized by the landowners themselves, operated in the North Valley during the 2010-2011 floods:

(EV) Then it was a clear example that the proposal works, but it has to be presented in a different way, and above everything the incentives have to be clear

The detention reservoirs' CVC story, looked at from the structural narrative analysis perspective, may be read as a 'misunderstood, but necessary, change'. The proposal 'works', it is 'technical', but the incentives must be worked upon, and the communication must be improved.

How does this compare to the Asocaña story? Well, this time the Asocaña story is more compelling, it is the story of 'a battle'. The abstract starts by comparing this story to the one on the connectivity corridors, from the cane growers' perspective:

(AB) This other debate was longer, deeper, more technical, more agitated.

There are nine evaluation clauses in this case, addressing the idea that the proposal was 'imported' from the Netherlands, a 'foreign idea', not cost-effective due to a small contribution to reducing the flood, and the presentation as 'the great battle, the great debate that took place in this project'.

The content of one of those evaluations follows:

(EV) We analysed the proposals technically and I can tell you that the study that the Doctor did, with all his engineers team, said that the regulation that could be achieved with the detention reservoirs was irrelevant and therefore it didn't make sense for a project from the economic viewpoint, even less so when it's not clear who's going to pay the compensation, who is going to build the reservoirs, the works, where the draining will be, ta ta ta. Nobody knew whether the landowner would have to pay for those lagoons, if the national government was going to do them, etcetera. Then it was for that reason that we insisted in several occasions before the team lead by doctor Clemencia Sandoval to withdraw that strategy, and it was the only one that we asked to be withdrawn

In the Asocaña case, both the abstract and the evaluations share a message of rejection of the idea of the detention reservoirs, *beyond* the lack of incentives, due to uncertainty about several dimensions of the decision and the expectation of a small contribution to the

regulation problem. The benefit-cost dimension of the problem was very relevant for Asocaña.

Finally, the Dutch consultants. The abstract conveys a concrete, lapidary message:

(AB) Well, what I remember is that, from the beginning of our project, the Dutch participation, well at least our consortium, Maria Clemencia told me that the detention reservoirs were not a feasible solution

There are four evaluation clauses in this case, all of them building on the idea that the reservoirs had had a communications problem. Two of them add other elements: One the importance of the way the landowners are included in the identification of the areas - perhaps avoiding the suggestion of reservoirs in the places where higher resistance could be met- and the idea that reducing the likelihood of floods required these reservoirs anyway.

One of those evaluations follows:

(EV) But anyway...I don't think the risk of flooding can be solved, or lowered, without using those detention reservoirs. But other names can be used, or a communications strategy can be used or improved to make sure that everybody understands well what the aim is with these areas

For the Arcadis-led Dutch consulting team, the abstract of the detention reservoirs' story shows a proposal that's already dead when they meet it. The evaluations complement that message with perspective about the role of 'communication' for explaining the death.

**Table 3. What the stories mean, focusing on abstracts and evaluations**

	<b>Consultants</b>	<b>CVC</b>	<b>Asocaña</b>
<b>Connectivity corridors</b>	'We've got to be patient'	'Save what you can'	'A non problem'
<b>Detention reservoirs</b>	'Died of bad communication'	'A misunderstood, but necessary change'	'A battle against nonsense'

**Source:** Elaborated by the author

## 7. Discussion and reflections

The combination of thematic and structural narrative analysis leads to a sharpened understanding of the narratives of the actors and the reasons for certain degrees of collective problem structure between them.

The structural narrative analysis, especially if focused on the abstracts and the evaluations, permits a much clearer identification of what the essence of a narrative is than what the thematic analysis allows. It is much easier to appreciate the meaning,



however, when the thematic analysis has preceded it and has identified more comprehensively the themes in stories.

Taking the example of CVC's connectivity corridors story, the thematic analysis had identified a series of themes through open coding: restoration, the importance of the feasible, knowledge, awareness of the landowners' concerns about land use and ownership, the importance of getting to 'the field'. Yet when the six Labov's clauses are looked for, the abstract "They exist...it is grave, right?" conveys a much more powerful meaning and sensation of urgency that what had been identified looking at themes. Combined with the evaluative statements, it becomes the beginning of a story about urgency and realism to try to save 'all that can be saved' in terms of biodiversity in these corridors, desisting from unrealistic pretensions that can prevent any gain from being achieved.

But the structural analysis findings are perceived as more robust since they are large coincident with the broader base of themes of the thematic analysis: feasibility and restoration, two of main themes in terms of numbers of times that they were coded, are represented in that abstract.

In the case of Asocaña, the meaning of a 'non problem' for the connectivity corridors becomes much more clear when attention is focused in the abstract and the evaluative clauses as part of the structural narrative analysis. The (not) a big problem theme had been identified in the thematic analysis, but a narrator that warns that he 'doesn't remember much'-as opposed to his vivid memories about detention reservoirs- is itself an alert. Combined afterwards with the statement that this was 'not a tough debate', identified as an evaluation, the meaning of the stories is appreciated with more clarity. But it is the combination of methods what creates the strength. The structural analysis on its own might leave the impression of arbitrariness in the identification of the clauses.

By sharpening the understanding of the essence of narratives whose elements had already been identified by the thematic analysis, the structural analysis leaves us in better position to identify common and complementary narratives and, therefore, those that are not as close.

Going back to the detention reservoirs debate, it seems unlikely that the narratives about bad communication that are shared by CVC and the Dutch consultants will lead to a proposal liked by Asocaña, that perceives a fundamental problem of weak technical support in the proposal. But the same analysis of also makes it simple to spot why there was no fundamental problem for the collaboration around the connectivity corridors: while both CVC and the Dutch consultants shared a low-expectations approach to the idea, for Asocaña it was simply not important. But this non-importance is in turn better understood when noticing that benefit-cost considerations were not part of Asocaña's story of the connectivity corridors, like they were part of the detention reservoirs' story.

In short, the anticipation that combining thematic and structural narrative analysis allows for the identification of common and complementary narratives is supported in these two cases. The leading role was that of the structural analysis, specifically the technique introduced here of focusing on the meaning conveyed by the abstracts and the evaluation clauses, as the elements concentrating the way the story makes sense for the narrator. It made possible to see clearly in Table 3 how there was no collision possible between the actors in the connectivity corridors. At the same time, it made visible that any new attempt

of presenting the detention reservoirs with only changes regarding 'communication' would fail, given the Asocaña perception that they are an 'imported, not cost-effective idea'.

While the narratives of the three actors, as identified from their stories, are complementary for the connectivity corridors, two of them (CVC and the Dutch consultants) are largely common for the detention reservoirs, while the Asocaña narrative is clearly distant.

The connectivity corridors fit nicely in the *possible worlds* of the three actors, either because they were urgent (CVC), complementary to other efforts (Dutch consultants) or not a problem (Asocaña). On the other hand, the detention reservoirs fit very well in the possible worlds of CVC (necessary) and the Dutch consultants (very much so), but not in the possible world of Asocaña, where it collided with both its conception of what's technical, that included being cost-efficient, and its concern with land rights. It is for this reason that, unlike the connectivity corridors for which no special opposition is found at the organization's level, detention reservoirs was the only option that Asocaña asked CVC to take out of the toolbox of the new 50-year plan.

Methodologically, the contribution of this paper may be in the combination of both theme and structure analysis in a given sequence -first theme, then structure- and then in the focus, within structure, on the abstract and the evaluation clauses as the main indicators of *meaning*. Although it is not possible to assume a meaning for the lack of an abstract, when it was present its content -that in these cases was always matching that of the evaluation clauses- brought more confidence on the meaning attributed to the evaluations.

It must be acknowledged that, during the analysis of the data, it became clear that a linear relationship between the narratives as identified in these stories and the actions of the actors in the periods discussed cannot be established for a simple reason: the narratives reflect the way the actors made sense or their experiences after those experiences, not before them or during them. In the CVC and Dutch consultants' detention reservoirs stories, for instance, it becomes clear from the reflections on communication how this meaning-making took place after the facts. Document analysis, depending on the temporality of the documents, can help verify the consistency of the narrative, but hardly make assumptions on how much the narrative, that is by definition ulterior, influence the decision making.

But acknowledging that narratives will only tell us how the narrators make sense of the events when they happened already, even if this can happen in almost *real time*, still supports the statement that narratives can help estimate what the likely actions of the narrators will be at least on the *next* occasion when they face situations that they can connect to those narratives.

Put another way: narratives of the *last* event associated by the narrator to a theme can help estimate what the initial actions will be the *next* time that something apparently fitting those narratives shows up, until events of a different nature trigger a change in the narratives. Collaboration in networks happens this way, one interaction at a time, even if those interactions are separated by very short periods of time.

## References:

- Ansell, C. G., Alison. (2007). Collaborative governance in theory and practice. *Journal of Public Administration Research and Theory*(18), 543-571.
- Bridgman, T., & Barry, D. (2002). Regulation is evil: An application of narrative policy analysis to regulatory debate in New Zealand. *Policy Sciences*, 35(2), 141-161. doi:10.1023/a:1016139804995
- Bruner, J. S. (1990). *Acts of meaning* (Vol. 3): Harvard University Press.
- CVC. (2015). Cauca River Project presentation to the National Department of Planning
- Ching, L. (2010). Eliminating ‘Yuck’: A Simple Exposition of Media and Social Change in Water Reuse Policies. *International Journal of Water Resources Development*, 26(1), 111-124. doi:10.1080/07900620903392174
- Faerman, S. R., McCaffrey, D. P., & Slyke, D. M. V. (2001). Understanding Interorganizational Cooperation: Public-Private Collaboration in Regulating Financial Market Innovation. *Organization Science*, 12(3), 372-388. Retrieved from
- Feldman, M. S., Sköldbberg, K., Brown, R. N., & Horner, D. (2004). Making Sense of Stories: A Rhetorical Approach to Narrative Analysis. *Journal of Public Administration Research and Theory*, 14(2), 147-170. doi:10.1093/jopart/muh010
- Hajer, M. A., Hoppe, R., Jennings, B., Fischer, F., & Forester, J. (1993). *The argumentative turn in policy analysis and planning*: Duke University Press.
- Hisschemöller, M., & Hoppe, R. (1995). Coping with intractable controversies: The case for problem structuring in policy design and analysis. *Knowledge and Policy*, 8(4), 40-60. doi:10.1007/bf02832229
- Hoppe, R. (2010). *The Governance of Problems*. Bristol, UK: The Policy Press.
- Huxham, C., & Vangen, S. (2000). Leadership in the shaping and implementation of collaboration agendas: How things happen in a (not quite) joined-up world. *Academy of Management journal*, 43(6), 1159-1175.
- Huxham, C., & Vangen, S. (2004). Doing things collaboratively: realizing the advantage or succumbing to inertia? *IEEE Engineering Management Review*, 32(4), 11-20.
- Imperial, M. T. (2005). Using collaboration as a governance strategy lessons from six watershed management programs. *Administration & Society*, 37(3), 281-320.
- Klijin, E. H., & Koppenjan, J. (2015). *Governance networks in the public sector*: Routledge.
- Lejano, R., Ingram, M., & Ingram, H. (2013). *The power of narrative in environmental networks*: MIT Press.
- Lejano, R. P., & Leong, C. (2012). A Hermeneutic Approach to Explaining and Understanding Public Controversies. *Journal of Public Administration Research and Theory*, 22(4), 793-814. doi:10.1093/jopart/mus001
- Leong, C., & Lejano, R. (2016). Thick narratives and the persistence of institutions: using the Q methodology to analyse IWRM reforms around the Yellow River. *Policy Sciences*, 49(4), 445-465. doi:10.1007/s11077-016-9253-1
- Ngoasong, M. Z. (2014). How international oil and gas companies respond to local content policies in petroleum-producing developing countries: A narrative enquiry. *Energy Policy*, 73, 471-479.

- Nutt, P. C. (2002). Selecting decision rules for crucial choices: An investigation of the Thompson framework. *The Journal of Applied Behavioral Science*, 38(1), 99-131.
- O'Toole, L. J. (1997). Implementing Public Innovations in Network Settings. Retrieved from Item Resolution URL <http://purl.utwente.nl/publications/2485>
- Pressman, J. L., & Wildavsky, A. (1984). Implementation (3rd edn). Berkeley, CA.
- Ragin, C. C. (2008). *Redesigning social inquiry : fuzzy sets and beyond*. Chicago [etc.] :: University of Chicago Press.
- Riessman, C. K. (2008). *Narrative methods for the human sciences*: Sage.
- Rihoux, B., & Ragin, C. C. (2009). *Configurational comparative methods: Qualitative comparative analysis (QCA) and related techniques*: Sage.
- Robichaux, C. M., & Clark, A. P. (2006). Practice of expert critical care nurses in situations of prognostic conflict at the end of life. *American Journal of Critical Care*, 15(5), 480-491.
- Scharpf, F. W. (1994). Games real actors could play positive and negative coordination in embedded negotiations. *Journal of theoretical politics*, 6(1), 27-53.
- Simon, H. A. (1973). The structure of ill structured problems. *Artificial Intelligence*, 4(3-4), 181-201.
- Thompson, J. D. (2003). *Organizations in action : social science bases of administrative theory*. New Brunswick, NJ :: Transaction Publishers.
- Valdivieso, G. E. (2016). *Frames, decision rules and concerted action: within-and-between systems challenges to Integrated Water Resources Management in Colombia*. Paper presented at the Netherlands Institute of Government's Annual Work Conference in Antwerp, 24 November 2016.
- Valdivieso, G. E. (2017a). Managing wickedness in projects: lessons from six projects implementing Integrated Water Management in Colombia's Integrated Water Management Policy. Paper presented to the Annual Conference of the International Research Society on Public Management (IRSPM). Budapest, 21 April 2017.
- Valdivieso, G. E. (2017b). *Managing wickedness in projects: lessons from six projects implementing Integrated Water Management in Colombia's Integrated Water Management Policy*. Paper presented to the Annual Conference of the International Research Society on Public Management (IRSPM). Budapest, 21 April 2017.
- Valle, U. d.-A. (2014). *Planteamiento de alternativas estructurales para la gestión de inundaciones en el Valle Alto del Rio Cauca* Retrieved from
- Van Meter, D. S., & Van Horn, C. E. (1975). The policy implementation process: A conceptual framework. *Administration & Society*, 6(4), 445-488.
- Wagenaar, H. (2014). *Meaning in action: Interpretation and dialogue in policy analysis*: Routledge.
- Zølner, M., Rasmussen, I. Ø., & Hansen, A. D. (2007). Qualitative interviews: studying network narratives *Methods in democratic network governance* (pp. 125-147): Springer.