



The influence of institutional pressures on urban governance models:

A case study in a smart cross-border region in Brazil and Argentina.

Rosiane A. Palacios, R., Palacios
Graduate, Management Program on
Pontifical Catholic University of Rio
Grande do Sul
rosiane.palacios@edu.pucrs.br

Edimara M. Luciano, E.M.,
Luciano
Graduate, Management program on
Pontifical Catholic University of Rio
Grande do Sul
eluciano@pucrs.br

Gabriela V. Pereira, G. V.,
Pereira
Center for E-Governance, University
for Continuing Education Krems
gabriela.viela-pereira@donau-
uni.ac.at

ABSTRACT

Smart cities and regions have a strong focus on providing citizens and residents with a better quality of life. Relatedly, urban governance is seen as a key element in the development and management of cities and regions. In border regions, where the social, economic, and cultural dynamic is often distinct, developing cities and making them smart presents challenges that can be addressed by binational governance. This study aims to understand how binational governance works in a border region that is seeking to become smart. A qualitative and exploratory study was conducted as a single case on the Brazil-Argentina border program La Frontera. In-depth interviews and document analysis were carried out and subjected to content analysis. The research findings shed light on the internal and external actors, the political and institutional environment, and the factors influencing the binational governance establishment and functioning. A history of disputes between the countries still shapes the dynamic of the border, and the formulation of laws and public policies. Moreover, institutions and actors can influence the focus of governance, and organizations that seek to ensure cooperation and integration do not necessarily guarantee that their principles are practiced.

CCS CONCEPTS

• Applied computing; • Computing in government; • E-government;

KEYWORDS

Smart cross-border regions, Urban governance, Institutions, Latin America

ACM Reference Format:

Rosiane A. Palacios, R., Palacios, Edimara M. Luciano, E.M., Luciano, and Gabriela V. Pereira, G. V., Pereira. 2022. The influence of institutional pressures on urban governance models:: A case study in a smart cross-border region in Brazil and Argentina.. In *15th International Conference*

Permission to make digital or hard copies of all or part of this work for personal or classroom use is granted without fee provided that copies are not made or distributed for profit or commercial advantage and that copies bear this notice and the full citation on the first page. Copyrights for components of this work owned by others than the author(s) must be honored. Abstracting with credit is permitted. To copy otherwise, or republish, to post on servers or to redistribute to lists, requires prior specific permission and/or a fee. Request permissions from permissions@acm.org.

ICEGOV 2022, October 04–07, 2022, Guimarães, Portugal

© 2022 Copyright held by the owner/author(s). Publication rights licensed to ACM.

ACM ISBN 978-1-4503-9635-6/22/10...\$15.00

<https://doi.org/10.1145/3560107.3560180>

on *Theory and Practice of Electronic Governance (ICEGOV 2022)*, October 04–07, 2022, Guimarães, Portugal. ACM, New York, NY, USA, 9 pages.
<https://doi.org/10.1145/3560107.3560180>

1 INTRODUCTION

The discussion about urban problems and solutions for city issues gives rise to the smart cities (SC) concept [10]. Beyond the use of digital technologies, smart cities are focused on quality of life for citizens by increasing human and social capital and sustainable economic growth [5]. Smart regions and smart cross-borders have a similar focus, in the sense that cities located in border regions adopt SC solutions aiming to engage in international cooperation and generate more development for both countries [27] by exchanging experiences and best practices to generate better living conditions. In addition to replicating success stories and obtaining funds for national or international projects, local governments can benefit by participating in a network, acquiring operational capacities, and generating synergies [16].

Depending on their characteristics, such as geographical location, the number of inhabitants, and levels of development, cities' issues vary considerably. Therefore, thinking about cities within their context is of utmost importance. Latin American countries, for instance, have traditionally neglected cities located in border regions [15]. Their current political-geographic limits are mostly related to issues defined during the colonial period [12], as well as cultural, economic, political, and legal characteristics [14]. In border cities, urban problems are slightly different, provided cultural, economic, and migratory interactions among citizens are imbricated in the urban issues. Moreover, decisions and planning are often made according to the agenda and projects of the state capital cities.

Borders might be more sensitively thought out and transformed by their inhabitants, involving sub-national administrations and paradiplomacy [25], but, conversely, there is still an inclination towards centralization. This inclination might be a result of isomorphic mimetic pressures [9], tending to a model city that reflects award-winning national or international initiatives. The dialogue on regional development and integration between neighboring countries still tends to occur institutionally and is linked to international relations through embassies, opening space for normative isomorphic pressures that come from government and intergovernmental organizations. Often, this situation hinders the development of initiatives led by local border actors who seek to turn the region smart. International relations are established through treaties and

agreements among countries, but negotiations can formally or informally occur at local levels, which may facilitate international exchange while respecting countries' sovereignty [4]. Governments of municipalities usually experience difficulties such as technical-scientific issues and the scarcity of resources. Funding agencies, as exogenous providers of resources, might exert coercive pressures on initiatives especially when the guarantees of municipal or state governments are involved.

Municipalities along the borders have good opportunities to deal with local issues due to their proximity to citizens and a better knowledge of the territory, and all this demands good governance mechanisms working properly to coordinate the efforts of all actors. Governance is seen as one of the most important dimensions of SC. Latin American border cities might benefit by establishing urban governance that sets common goals favoring the community's local needs, and by binational or cross-border governance, where institutions and subnational governments act combinedly.

Governance bodies can be compounded by different actors that form the institutional field [9, 30], and these actors exert pressure on the way initiatives are being planned or executed. Structures, rules, norms, and routines become guidelines for social behavior and the way initiatives are carried forward [20], affecting the models of urban governance adopted, namely managerial, corporatist, pro-growth, and welfare [22]. Based on that, this research aims to investigate how isomorphic pressures drive urban governance models in smart border regions governance. A case study on the Brazil-Argentina border program La Frontera (LF) was performed. This binational governance-based program was established in 2019 and involves actors from the public and private sectors of three municipalities in Argentina and nine in Brazil. Even though the borders in Argentina and Brazil are quite dynamic [4], there are still very few cross-border governance initiatives in South America [15], and this context provides significant opportunities for this research. Most studies on SC governance focus on using ICT for government solutions rather than the political relations and strategies for governing cities [24], being the latter the object of this study. The following sections present the theoretical framework of urban governance and institutional theory, followed by methodological procedures, analysis, discussions, and conclusions.

2 URBAN GOVERNANCE AND INSTITUTIONAL THEORY

Governance originates from studies on Agency Theory, based on the segregation of the ownership function, objective control and management, and the thinking about how to make organizations more efficient [3]. The concept of governance has many ramifications. Currently, the focus of governance is on the attention of civil society, institutions and public organizations, and other stakeholders considered essential for resolving society's issues. Fundamentally, governance guides the economy to meet society's objectives [21]. In the framework of SC initiatives and projects proposed by Chourabi, governance appears as one of the success factors for SC [6] and is applied to guide critical areas and factors in promoting projects that generate quality of life for people. It suggests the possibility of strategically thinking about governance in a territorial way.

Urban governance concerns the articulation of different actors and institutions that make up networks of socio-territorial power. The aim is to make decisions using governance to arrange collective actions and unite the desires of the different groups within society [8]. These processes are based on an innovative, shared, and collaborative logic [18]. In addition to territorial governance, another term that appears in studies on governance is urban governance, which can be defined as establishing common goals, seeking to achieve them in favor of the community based on local needs, and following the regional political system [20]. Different formats and dynamics are presented in urban governance, and its objectives, styles, instruments, and other attributes are considered to group them into four models [22] (Table 1).

Among the goals of urban governance are efficiency, distribution, growth, and redistribution. In some of the four models presented, the presence of the state is predominant. In others, predominance is society's actors [22]. Unlike other approaches to urban policy, urban governance makes no distinction between the pursuit of collective goals and the centrality and actors' order of importance actors [20].

The second wave of Institutional Theory, called New Institutionalism, was chosen for this study. Meyer and Rowan [13] and DiMaggio and Powell [9], who pioneer this wave, suggest that various organizational structures come about due to rationalized norms within institutions and that the construction of such norms in society plays a role in the expansion and complexity of those structures. Institutional theory conceives institutions in a "prescriptive way, being concerned with how an organization can become an institution; that is, by gaining legitimacy before the society and becoming permanent, surviving in the business environment" (p.2) [17]. DiMaggio and Powell [9] concentrate on the mechanisms and the cognitive processes (the cognitive pillar) that affect organizations and how they adapt to the environment [7].

Coercive isomorphisms represent the product of pressures from institutions through factors like expectations of the societies they are part of, or culture [9]. The pressures can also be perceived as impositions, stimuli, or a call to participate in alliances. Institutions that exert pressure are, at some levels, also dependent on other institutions. On certain occasions, organizations change as a response to government regulations. Normative isomorphisms describe the pressure of professional associations to which the employees of an organization belong [9]. The increasing professionalization of employees in organizations has resulted in the entanglement of employees with the organizations where they work. This type of pressure also occurs due to the interchange between employees in institutions and the similarity of their education/training, making institutions increasingly like each other. Mimetic isomorphism results from an imitation process by incorporating successful practices from other organizations [9].

One of the points that new institutionalism explain is why organizations tend to become similar over time [9]. The literature recommends considering organizations as members of an organizational field. It proposes the existence of a paradox where, rationally, decision-makers gradually make organizations identical as they seek to modify them. In this context, strategic thinking results from

Table 1: Characteristics of the four models of urban governance

Characteristics	Managerial	Corporatist	Pro-Growth	Welfare
Political objectives	Efficiency	Distribution	Growth	Redistribution
Policy style	Pragmatic	Ideological	Pragmatic	Ideological
Political exchange	Consensus	Conflict	Consensus	Conflict
Public-private exchange	Competitive	Concerted	Instrumental	Conflict
City-citizen relationship	Exclusive	Inclusive	Exclusive	Inclusive
Primary contingency	Professionals	Civic leaders	Businesses	The state
Key instruments	Contracts	Deliberations	Partnerships	Networks
Pattern of subordination	Positive	Negative	Positive	Negative
Key evaluative criterion	Efficiency	Participation	Growth	Equity

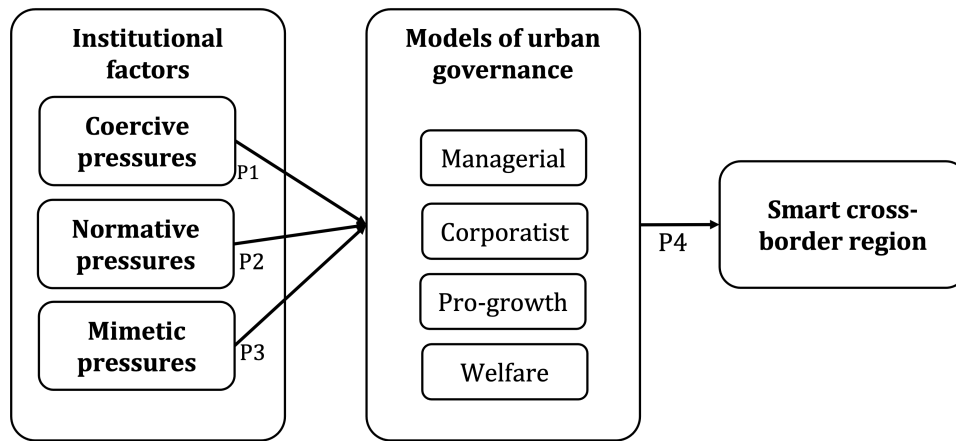


Figure 1: – Conceptual model

the social immersion of the individuals who built the organizations and who are susceptible to coercive, normative, and cognitive patterns about the organizational situation [7].

In coercive pressures, highly bureaucratic processes also influence organizations. Beyond normative isomorphism, the professionals are also exposed to interchangeable coercive and mimetic isomorphic pressures [9]. Because organizations’ employees participate in professional associations, their ideas tend to become homogeneous [28]. In mimetic isomorphism, institutions act to be accepted by other institutions by obtaining legitimacy. In this way, legitimacy is seen as “the generalized perception and presumption that the actions of an entity are desirable, adequate or appropriate within a socially constructed system of norms, values, beliefs, and definitions” (p. 574) [29]. When organizations become legitimate, they use it to expand other organizations’ support for them and ensure their survival [13]. DiMaggio and Powell [9], pointed out that nation-states and the professions are modelers of institutional arrangements, constituting the great rationalizers of institutions. In this case, it is possible to infer those isomorphic pressures also affect cities. Institutions’ own rules are potent resources, and those who can establish or influence them hold a particular form of power [26].

Governance concentrates the efforts and resources necessary for the intended actions. The existence of binational governance

models that establish common goals can support the development on the border. Through the composition of binational governance, the interaction between society, citizens, governments, institutions, and other actors involved in the institutional field that permeates governance can become effective. It is essential to point out that the decisions in network governance can be decisive for the success of the actions intended for the region. Such decisions are influenced by pressures and agenda impositions, which is why, in this study, Institutional Theory is applied.

3 CONCEPTUAL MODEL

A conceptual model was developed (Figure 1) based on the governance modes defined by Pierre [22] and the isomorphic pressures by DiMaggio and Powell [9], as well as considering the model structure defined by Pereira et al. [19].

Managerial urban governance focuses on the effectiveness of actions and the administrative aspect to the detriment of politics. In this model, coercive and mimetic pressures may have more governance influence. Corporatist urban governance is linked to distributive politics and looks more like an arena for political discourse. It seems there is a lack of tools to ensure social justice in the city and political support, so, in this case, mimetic isomorphism and normative isomorphism can be stronger in governance. Pro-growth urban governance presents the interaction of private capital institutions

in the city's issues by bringing out the economic factor rather than its distribution. Welfare Urban Governance is considered the most complex governance model because its main objective is to obtain resources from institutions outside the city, and there is greater interaction with the national state and not with private companies [22]. As such, this type can experience all three types of isomorphic pressures. As seen, the three isomorphic pressures can have an influence on the diverse governance models.

Four were created by analyzing how the isomorphic pressures that occur in the institution's routines influence the organizational field:

P1: coercive isomorphism drives the model of urban governance in smart cross-border regions;

P2: normative isomorphism drives the model of urban governance in smart cross-border regions;

P3: mimetic isomorphism drives the model of urban governance in smart cross-border regions;

P4: the model of urban governance drives the smart cross-border regions.

In coercive isomorphism, there are pressures from state, federal, and international governments, laws, society, and political actors in the institutional field of governance. Normative pressure encompasses organizations, people working in a particular field, formal education, and exchanges of actors between institutions that are linked to governance. The mimetic can occur through copying examples of governance structures from national or foreign border regions, institutions, public, private, and third sector actors, and through the search for legitimacy vis-à-vis other institutions.

4 RESEARCH METHODS

This qualitative research involves a single case study on a binational governance organization called La Frontera, which organized itself into an actors' group on a border region between Brazil and Argentina that seeks to introduce SC initiatives and become a smart cross-border region. The case study approach contributes to the exploration of topics involving culture, power, values, and local aspects related to binational governance. La Frontera was chosen because the region is a territorial border, a feature that facilitates cooperation for the development of the region. Both the countries sharing the border have been developing independent SC initiatives and, more recently, seeking to integrate their efforts. La Frontera constitutes a significant case to be studied due to its attempt to integrate and coordinate efforts previously done isolated by the municipalities. Moreover, it involves two countries that historically alternate collaboration and disputes and that present several significant cultural and political organization differences. These characteristics make the results interesting for other border regions that want to understand the inherent aspects to govern a border network organization, its partners and initiatives, as well as barriers and facilitators during the process. The unit of analysis was the action of the binational governance.

Primary and secondary data were collected in 2020, namely narrative interviews and document analysis, respectively. Interviews in Spanish and Portuguese were conducted with 23 actors who directly or indirectly are part of the binational governance case. They are identified in the data analysis from I1 to I23. The main LF Brazilian

members and all the LF Argentinian ones were interviewed. Twelve respondents are from the public sector and eleven are from the private one. Public sector actors are city mayors (2), city councilors (1), state government officers (2), political agents (1), civil servants (1), and university personnel (5). Actors from the private sector are small entrepreneurs (5), personnel from SMBS, a Brazilian agency focusing on supporting micro and small businesses (3), and trade association representatives (3).

Eight documents related to the case were analyzed, namely: publications and reports from the LF Project, official websites, official documents from the municipalities about the network, electronic publications from local newspapers, and documents from SMBS. Data analysis was carried out with the support of NVivo software and according to Bardin's recommendations [2].

5 DATA ANALYSIS AND DISCUSSION

La Frontera was established in 2019 (D3) at an event where territorial development projects planned for the region were introduced to the community and regional authorities. The network comprises actors from the public and private sectors of three municipalities in the Province of Misiones (MS) in Argentina and nine Brazilian municipalities, one located in the state of Santa Catarina (SC) and eight in the state of Paraná (PR). The region is made up of border cities, the border strip, some conurbations, and twin cities. Considering both the Brazilian and Argentinian citizens, the region has approximately 192 thousand inhabitants. Some of the municipalities have notably intense social, political, and economic relationships. In an urban area of approximately 1.5 km² (D3), three of these municipalities are divided by streets (international, state, and municipal boundaries), forming a dry border conurbation. La Frontera seeks to operationalize the region's integration and development through actions targeting economy, migration, education, innovation, and tourism, focusing on the governance, economy, and smart living SC dimensions [1].

The idea of LF originated among the members of a leadership training program provided by the entrepreneurship-focused Brazilian organization SMBS. Currently, the members of LF are individuals working in the public and private sectors, trade associations, and higher education institutions, living in different cities in the territory (D7, I1, I10). Several development projects and SC initiatives in the region were previously mapped, such as the Intermunicipal Border Consortium (CIF) and the Cooperative Borders project, aiming to be included in LF discussions. The main motivator to look for local actors was to obtain decision-making power and representativeness.

Therefore, participants were initially invited based on their capacity to promote territorial governance through the action of multiple actors, networks, and institutions such as the state, civil society, companies, and citizens. The interaction of multiple stakeholders is an element that is often present in SC and smart cross-border region initiatives [1, 18, 26], which is also seen in the actions of LF. Through debate between the one who participated in previous SMBS training and political representatives of the region (mayors and councilors), it was decided that LF should be a group of people who meet on a voluntary basis and have a social mission and a social statute, presenting the following principles: free and

voluntary membership; democratic management; autonomy and independence; a focus on education, training and information sharing; inter-cooperation, and a focus on community. Once SMBS had established the leadership program and carried out a diagnosis of the region, it was decided that LF should establish thematic axes. Three were chosen: education, communication and culture, and economy, which guide decision-making and strategic planning. There are more Brazilian than Argentinian players and this reality is explained by:

- (i) the number of cities from each country in the region;
- (ii) the tradition in applying smart cities initiatives;
- (iii) the presence of some institutions and;
- (iv) the geographic characteristics (proximity to the border strip).

Fourteen different institutions were found to be related to LF, among them Brazilian and Argentinian universities, state and federal level political agents, consulates representatives, and local business associations. These institutions play direct or indirect roles.

When classifying the type of isomorphism experienced by LF, the normative isomorphic pressure is notably stronger. That pressure is mainly exerted by SMBS, which has been a key player since the earliest effort at regional development and which organized various editions of the leadership program to train local leaders. In addition to training, LF currently has SMBS consultants among its actors. The fact that the training program offered to LF members is based on SMBS principles and values means that the trained members play similar roles to those proposed by SMBS, which is intensified because a few participants are SMBS staff. Considering the relationship between LF and the other regional institutions, SMBS is seen as the most influential institution since has provided the leadership program, invited the members, and has been behind many of the past and present actions and projects undertaken in the institutional field of the region. This normative pressure by SMBS at the same time gives organicity to LF, but also excessively drives their priorities and initiatives, as I10 mentions: "They are leaders, they want to be protagonists. La Frontera is based on territorial economic development, because SMBS is the driver, it could be through health, for example, but, because SMBS was leading, it was the economy". Since a similar mechanism from Argentina is not part of the network, the relationship is unbalanced. SMBS uses the fact of being a federal government institution to exert pressure on Brazilian cities, which are the majority in LF, to control LF itself as one of many other projects. This dualistic role poses several challenges to LF governance.

Governance originates with actors formed by SMBS. This organization initially chose the actors who attended the course based on previous development actions in partnership with city representatives. Even now, personnel from this organization are part of the binational governance, including holding positions. The thematic axes addressed by governance actions are aligned with SMBS themes (small and medium-sized enterprise entrepreneurship and entrepreneurial education). The technical visits made by the governance actors were funded and organized by this organization. All these interactions and directions show the normative isomorphism that the organization exercises in binational governance.

Since the 1990s, SMBS has been directly or indirectly involved in many development initiatives throughout the region, so, it is

natural that the actions proposed by LF are more easily legitimized if this organization is involved. The literature points out that the search for legitimacy motivates isomorphic practices adoption. The role of SMBS in the governance structure is to provide technical support, however, it keeps direct influence on almost all aspects of LF.

Even though each initiative has its own actions, values and ideologies can be mixed. In part, the actors end up building their identity based on this combination of values and experiences of institutions that are part of the network, so it tends to become homogeneous [27]. There is also an issue regarding the members' dependence on SMBS: LF intends to offer training courses for LF political candidates so that they can seek elected political office. In this way, LF actors would have more power and influence, and the public sphere could become more like LF. In this way, the region's institutional field could become even more homogeneous. It seems that there are multiple channels of normative isomorphism: in this case, we have a major institution that influences the region and influences smaller institutions which, in turn, influence the whole region by educating, promoting the entrepreneurship agenda, and exchanging actors. The same institution provided the leadership training, chose the actors, addressed the key issues, and applied resources through its own projects.

Mimetic Isomorphism appears subtly, for example, when members of LF and other related SMBS projects visited Europe to get to know the so-called cross-border Euroregion's to learn about good practices in border regions. The actors visited the borders between Germany, Switzerland, Austria and France, Portugal, and Spain (I1, I10, I15, I1). The group visited a binational hospital, a binational sports gym, the Basel-Mulhouse-Freiburg Airport, the Upper Rhine Metropolitan Tri-national Region, the Basel Region, and the Association of European Border Regions – ARFE, among others. The technical visits are mentioned by 18 of the 23 interviewees.

In Latin America, they made technical visits to the border between Argentina and Chile to learn about the experiences of local entrepreneurs (I6). They went to Peru and Ecuador to learn about promoting tourism and textile clothing production (I2) and to the Parlasul (MERCOSUR Parliament) located in Montevideo-UY, among other places, seeking to learn about good cross-border practices. Concerning their experiences during these trips, the interviewees say: "you are in Portugal, and soon you are in Spain, and you do not even notice, because everything is close together. I think it should work the same here" (I18). Regarding a European initiative replicated in the region (which ended up not producing results due to legislative issues in Brazil and Argentina), I9 mentioned: "we tried to copy it, right? From the experience of Portugal and Spain with a cross-border card". I15 even compares the EU and MERCOSUR as a reason to change the reality of the border through mimicry by saying: "While the Mercosur structure is not as refined as the European Union, we dream about that. It may be utopian because the legislation is not similar in Mercosur. However, we are always seeking inspiration in actions mainly aimed at integration." I5 mentioned something similar: "The Maringa's mayor [Maringa is a city in the region] mentioned they have a management committee for the municipality. We are trying to copy it and implement it here."

This isomorphism pressure is also apparent in the continuity of the LF's actions when the actors express their vision for the future. The mimicry seems to be linked mainly to the desire to create initiatives that may turn cities like the ones on the EU borders. What does not change is that the members also conducted technical visits to Latin American locations. However, the EU cities appear very attractive, like a model to be followed. Because of the colonization process, many actors and institutions of the Global South tend to imagine that everything European is more advanced and, therefore, better [13, 22].

The institutional values were built based on constant colonialist values [31]. Emerging countries, in particular, tend to be more isomorphic, copying initiatives from developed countries to receive legitimacy [9]. By adding elements of coloniality, mimicry can be further enhanced in Latin American countries, for example. Note that the actors see the EU borders as the example to be followed even though they visited some interesting initiatives in Latin American countries that present a similar context. Reproducing successful initiatives is not a bad thing. However, what Quijano [23] calls the coloniality of knowledge and power that permeates the practices and experiences in the global south may happen. This form of isomorphism is also apparent in the continuity of the LF actions.

Coercive isomorphic pressures were not identified in the field. It would be apparent if LF needed to adapt the border countries' legislation to a common MERCOSUR legislation. It turns out that the differences in legislation between Brazil and Argentina, together with the scarcity of effective integration mechanisms, end up being one of the most critical obstacles for LF. The difference in bureaucratic procedures and institutional rites in the two countries prevents the border region from having more border integration. Without the legislation integration, borders are a space of tension for both countries, which damages the ideas and ideals of collaboration and working as one. The local institutions and actors that try to transform the territory together face difficulties due to the countries they belong to. This scenario disregards the opportunity for integration between the neighboring countries perpetuating the protectionist orientation of guaranteeing sovereignty and power [11].

Regarding the urban governance model, LF was classified as a pro-growth. The LF policy style is pragmatic since development actions for the region are usually designed with clear and practical objectives, and several small goals are listed. The actors' actions are also perceived as pragmatic as they focus on practical issues and specific actions that they consider necessary to take the following steps of strategic planning. The primary focus is making business, which is always thought of to accomplish binational integration, and the development of micro and small businesses, which is the focus of SMBS.

Table 2 summarizes how case issues are aligned with each characteristic of the urban governance model identified.

Partnerships are fundamental instruments through which LF makes its actions viable. Interestingly, there are arrangements to ensure that ongoing projects can flow uninterruptedly, demanding that the articulation happens in a continuous flow in the current governance format. The simple replacement of a politically influential individual in Argentina or Brazil may jeopardize the performance of specific LF initiatives. LF members use their social

capital to operationalize actions and projects aiming to develop the territory. Strengthening ties with MERCOSUR is one of the goals most cited by the members due to cooperative actions and in part to issues of international visibility when seeking resources. There is, for example, no common fund to support the LF's actions, so the members seek investment from the Fund for Structural Convergence of MERCOSUR. Positively, some local authorities have dialogued with LF and often participate in its initiatives, being sensitive to its actions. Political power plays an influential decisive role in enabling initiatives. Due to legal issues, several SC and smart cross-border region initiatives would not happen without political articulation as they need approval or funding from government agencies. Without the participation of the public sector, the efforts that have been made to improve the region's smartness level as a smart cross-border region could not be fruitful.

The nature of the political exchange between internal and external actors is generally consensual, and the exchange between public and private sectors occurs interactively. However, most actors are from the private sector. At some level, a public-private exchange occurs since the governance actors are from different sectors. There is an understanding that it is necessary to participate from different spheres for development actions to take place. Although this is not the SC pillar itself, the joint work of the public and private spheres is interesting for achieving the development goals for the region to become a smart cross-border region. The local state-citizen relationship is not very expressive; the community is not yet part of the action planning. It only benefits from them, which can configure weak governance in the long term. It is worth noting that citizen participation in smart cities provides diversity and representativeness for public issues [10] and can guide the establishment of the most socially adherent goals for governance [21]. Even though LF aims to be inclusive and transparent, it is composed of a small group of actors that do not include citizens of the border cities. The format that governance has taken may generate economic prosperity for the region and success in the activities of the institutions involved, but it also neglects democracy and transparency. When only a privileged group of actors define the development actions, citizens' needs may go unattended [22].

Considering the model of urban governance as pro-growth, the institutions that exert isomorphic pressure are corporatists, and their values and activities are aligned with economic growth. The institution also exerts pressure on the other institutions that make up the institutional field of governance. The type of urban governance could be different if other institutions could exert more significant isomorphic pressure or if multiple institutions exerted pressure at different levels. In addition to exerting normative pressure, SMBS chose all participants for the governance structure practically alone, which framed the governance and brought an additional way to generate isomorphism. After establishing pro-growth as the governance model, they continued exerting this pressure by approving every new governance member. In the definition of the agenda and the implementation of the projects, isomorphic normative pressure appears together with mimetic pressure. In the case of actions, another element must be considered: the Latin American context. Based on it, the conceptual model was confirmed.

It was possible to find full or partial support in the data for the four propositions. Proposition 1 was supported since the coercive

Table 2: Characteristics of the models of urban governance in the studied case

Characteristics	Pro-Growth	Case issues
Political objectives	Growth	Aims at the region economic development through more market intelligence
Policy style	Pragmatic	Defined by making agreements and using social capital
Political exchange	Consensus	There are only occasional exchanges with political actors, mainly seeking for partnerships, permissions, and resources
Public-private exchange	Instrumental	This is what makes governance actions possible. However, it occurs in a very occasional way
City-citizen relationship	Exclusive	City-citizen relationship are limited and not structured. Usually, citizens are only informed of governance activities
Primary contingency	Businesses	Focused on actions for the development of small and medium businesses and entrepreneurial education activities
Key instruments	Partnerships	Partnerships among public actors, public agencies, universities, and private companies
Pattern of subordination	Positive	Seeks to mobilize private and public resources in an aligned way
Key evaluative criterion	Growth	Indicators of economic growth and new regional business

isomorphism exerted by both Brazilian and Argentinian legislation is stronger than the cross-border governance integration. This pressure limits the model of urban governance chosen for pro-growth due to the other models demand policies, rules, and sanctions specific to the governance structure. This limitation reduces the probability of this border region being a smart cross-border region by offering resistance from both sides to develop integration actions that could allow the discussion of adopting another urban governance model. However, the coercive pressures from both countries are ambiguous, on different levels or directions. Considering it, P1 was partially supported.

Proposition 2 is characterized as the strongest isomorphic pressure, having SMBS as the institution that guides governance both directly and indirectly - as it exerts pressure on other institutions that make up the institutional field.

Proposition 3 occurs in two scenarios: first, through the imitation of foreign (European, mostly) examples of development; second, the Latin American superstructures were forged on colonial pillars; and Latin American institutions tend to copy foreignness from the Global North without appropriately adapting to their reality. However, due to the strongest normative pressure, mimetic pressures can be enforced or not depending on the agenda of the main institutional actor.

Among the characteristics of pro-growth governance, only the city-citizen relationship does not figure in the model because, unfortunately, there is no exchange with the region's citizens. Proposition 4 is supported since the isomorphic pressures received by the institutions that frame the governance define the agenda and the urban governance model to be practiced, which will subsequently direct the type of smart cross-border regions. However, only the pro-growth model was verified in the data collection, provided the field coercive and normative pressures drive the model to be pro-growth, which makes P4 partially supported.

6 FINAL REMARKS

This research reached its main goal by performing a case study in the Brazil-Argentina border program La Frontera. It concludes that coercive, normative, and mimetic isomorphic pressures influence

the selection of the urban governance model, even if unintentionally. Moreover, the urban governance model frames all actions and strategies developed in a smart cross-border region. The governance domain was chosen because the practices to overcome cross-border challenges could not be tackled without the participation of the various private and public actors and social institutions.

Despite working with fourteen different organizations and institutions, only SMBS exerted solid normative pressure on the smart cross-border region. Its history of activities and training programs is intertwined with the governance and the region's development. SMBS exerted both normative isomorphism and a kind of symbolic power in LF and in some institutions that comprise the initiative. Seeking to transform the region by supporting technical missions abroad, also contributed to mimetic isomorphism. Questions about the effects of coloniality should be considered in Latin America because they are related to how institutions think about themselves and how they interact. It is not a single institution but the superstructure that impacts the institutions, and it is directly linked to mimetic isomorphism. Coloniality drives the impression Latin American countries and institutions to have about themselves, so they question if they are able to create and maintain smart cities and smart cross-border initiatives, or if they only have the possibility of adopting locally what other countries (generally in the global north) are applying. Regarding coercive isomorphism, it appeared paradoxically. This pressure limits the model of urban governance chosen due to the other models demand specific legislation for the governance structure. This limitation hinders the construction of a smart cross-border region, which, therefore, was an intriguing result, provided the chosen governance model prevents them to achieve their desired goal. This paradox is very complex because if the countries do not collaborate on legislation issues, they will hinder development actions and the achievement of network goals. As data showed, the actors turn to the SMBS staff whenever an issue arises. If they continue doing that, they may never reach autonomy. They might lose the reason for being a governance structure to drive the region's development. By seeking legitimacy and support in another institution, the governance may remain forever in an

under-construction status, which does not support their high-level goals.

Thinking about smart cities and smart cross-regions concepts, dimensions, and high-level objectives, the region actors could have targeted more attributes than economic development. This focus may not be enough, especially considering citizens more than businesses and business associations, which are the most influenced actors on LF. Putting all the efforts into economic development compromises reaching the goal of being a smart cross-border. The economic focus was decided conjointly by SMBS and LF actors. Isomorphic pressures will determine what kind of public-private exchange, the policies adopted, the city-citizen relationship (or the lack of it) developed, and all the other governance characteristics. It shows the crucial importance of deciding the urban governance model for the one more aligned to the region's context, network goal, and, more than that, citizen needs. Considering these variables is the starting point to developing a genuine smart cross-border region, focused on the cities' needs and capacities of their population, not only the businesses themselves. One of the solutions that would minimize the isomorphic pressures that tilt the actions is the participation of multiple stakeholders with emphasis on citizens on both sides of the border. The multiple actors know the different scenarios of the border's urban issues. In this way, some institutions' isomorphic pressures and agendas' imposition can be filtered and adapted. Furthermore, other possibilities of urban governance can be practiced by building the region's collective intelligence.

As research limits, it is necessary to consider the context where the data were collected. Further research could involve case studies on other governance models and identify which specific capabilities are necessary to develop smart cross-border regions.

Further research could look at the capabilities needed for the continuous development of smart border regions to overcome the dependency on actors' social capital, as evidenced by this research. Considering these actors can have non-continuous participation in the network, the social capital can be lost, and so the articulation is damaged, as the capacity to consolidate actions and increase the maturity of the network governance. Considering mimetic isomorphism was not the strongest pressure in this research, it is important to understand how it can occur in other border regions, mainly when mirroring global north initiatives. Isomorphic pressure impacts were controversial in this research, which is a stimulus to study the pressures exerted by border integration and cooperation institutions due to dissonant pressures among countries on the border can generate ambiguous pressures in the field. Considering just the pro-growth urban governance model was identified in the field, further research can focus on cases that present the managerial, corporatist, or welfare model.

ACKNOWLEDGMENTS

This study was financed in part by the Coordenação de Aperfeiçoamento de Pessoal de Nível Superior - Brasil (CAPES) - Finance Code 001. Part of this work was funded by the European Commission within the ERASMUS+ Programme in the context of the project CAP4CITY (www.cap4city.eu) under grant agreement no. 598273-EPP1-2018-1-AT-EPPKA2-CBHE-JP. The authors would like to cordially thank all the experts who participated in the study.

REFERENCES

- [1] Alia Weston and J. Miguel Imas. 2018. Resisting Colonization in Business and Management Studies: From Postcolonialism to Decolonization. In *The SAGE Handbook of Qualitative Business and Management Research Methods* (p. 119–137). London: Sage Publications.
- [2] Alketa Peci. 2006. A nova teoria institucional em estudos organizacionais: uma abordagem crítica. *Cadernos EBAPÉ*, 4(1), 1–12.
- [3] Álvaro Palomo-Navarro and Julio Navío-Marco. 2018. Smart city networks' governance: The Spanish smart city network case study. *Telecommunications Policy*, 42(10), 872–880. <https://doi.org/10.1016/j.telpol.2017.10.002>
- [4] Andrea Caragliu, Chiara del Bo and Peter Nijkamp. 2011. Smart cities in Europe. *Journal of Urban Technology*, 18(2), 65–82. <https://doi.org/10.1080/10630732.2011.601117>
- [5] Anibal Quijano. 2005. Colonialidade do poder, Eurocentrismo e América Latina. In C. L. de C. S. CLACSO (Org.), *A colonialidade do saber: eurocentrismo e ciências sociais Perspectivas latino-americanas* (p. 117–142). http://bibliotecavirtual.clacso.org.ar/clacso/sur-sur/20100624103322/12_Quijano.pdf
- [6] Bernardo Oliveira Buta and Marco Antonio Carvalho Teixeira. 2020. Governança pública em três dimensões: conceitual, mensural e democrática. *Organizações & Sociedade*, 27(94), 370–395. <https://doi.org/10.1590/1984-9270941>
- [7] Brainard Guy Peters and Jon Pierre. 2012. Urban Governance. *The Oxford Handbook of Urban Politics*, (April 2018), 1–19. <https://doi.org/10.1093/oxfordhb/9780195367867.013.0005>
- [8] Brainard Guy Peters. 2013. O que é governança? *Revista do TCU*, 28–33.
- [9] Caroline Krüger, Nino Rafael Medeiros Krüger, Cláudia Souza Passador and Adriana Cristina Ferreira Caldana. 2020. Caminhos para o aprimoramento da gestão de políticas públicas em áreas de fronteira: uma análise multinível. *Boletim regional, urbano e ambiental do IPEA*, jan-jun, 67–80. <https://doi.org/10.38116/brua22art6>
- [10] Fernanda Mello Sant'Anna. 2013. O papel da integração fronteiriça para a integração regional na América Latina. *Revista Geonorte*, 7(1), 520–536.
- [11] Gabriela Viale Pereira, Edimara M. Luciano, Marie M. Macadar and Vanessa Marques Daniel. 2013. Information Technology Governance practices adoption through an institutional perspective: The perception of Brazilian and American CIOs. *Proceedings of the Annual Hawaii International Conference on System Sciences*, 4446–4455. <https://doi.org/10.1109/HICSS.2013.276>
- [12] Gabriela Viale Pereira, Maria Alexandra Cunha, Thomas J. Lampoltshammer, Peter Parycek and Maurício Gregianin Testa. 2017. Increasing collaboration and participation in smart city governance: a cross-case analysis of smart city initiatives. *Information Technology for Development*, 23(3), 526–553. <https://doi.org/10.1080/02681102.2017.1353946>
- [13] Hafeedh Chourabi, Taewoo Nam, Shawn Walker, J. Ramon Gil-Garcia, Sehl Mellouli, Karine Nahon, Theresa A. Pardo and Hans Jochen Scholl. 2012. Understanding smart cities: An integrative framework. *Proceedings of the Annual Hawaii International Conference on System Sciences*, 2289–2297. <https://doi.org/10.1109/HICSS.2012.615>
- [14] Heleniza Ávila Campos. 2017. O papel estratégico de cidades gêmeas no controle de mercadorias em regiões de fronteira no contexto do MERCOSUL: Uruguaiiana (BR) e Paso de los Libres (AR) / The strategic role of twin cities in controlling goods in border regions in the MERCOSUR context: *Redes*, 22(1), 56. <https://doi.org/10.17058/redes.v22i1.8667>
- [15] João Marcelo Crubellate, Paulo Sérgio Grave and Ariston Azevedo Mendes. 2004. A questão institucional e suas implicações para o pensamento estratégico. *Revista de Administração Contemporânea*, 8(spe), 37–60. <https://doi.org/10.1590/s1415-65552004000500004>
- [16] John W. Meyer and Brian Rowan. 1977. Institutionalized Organizations: Formal Structure as Myth and Ceremony. *American Journal of Sociology*, 83(2), 340–363. <https://doi.org/10.1086/226550>
- [17] Jon Pierre. 2011. The Politics of Urban Governance. In *Urban Policy and Research* (1o ed, Vol. 30). <https://doi.org/10.1080/08111146.2012.702076>
- [18] Laurence Bardin. 2016. *Análise de Conteúdo*. São Paulo: Edições 70. São Paulo: Edições 70, p. 279.
- [19] Luiz Ricardo de Souza. 2019. Instituições, redes e governança: o caso do sistema catarinense de inovação. Universidade Federal de Santa Catarina.
- [20] Mark C. Suchman. 1995. Managing legitimacy: strategic and institutional approaches. *Academy of Management Review*, 20, 571–610. <https://doi.org/10.2308/accr.2009.84.5.1495>
- [21] Nahuel Oddone, Horacio Rodríguez Vázquez and Martin J. Quiroga Barrera Oro. 2018. Paradiplomacia local y transfronteriza como un instrumento de gobernanza ambiental en el Mercosur y la Unión Europea: una descripción comparada. *Civitas - Revista de Ciências Sociais*, 18(2), 332. <https://doi.org/10.15448/1984-7289.2018.2.29690>
- [22] Patricia H. Thornton and William Ocasio. 2012. Institutional Logics. In *The SAGE Handbook of Organizational Institutionalism* (p. 99–128). <https://doi.org/10.4135/9781849200387.n4>
- [23] Paul J. DiMaggio and Walter W. Powell. 1983. The Iron Cage Revisited: Institutional Isomorphism and Collective Rationality in Organizational Fields. *American*

- Sociological Review, 48(2), 147–160.
- [24] Ralf Martin Soe. 2018. Smart cities: From silos to cross-border approach. *International Journal of E-Planning Research*, 7(2), 70–88. <https://doi.org/10.4018/IJEPR.2018040105>
- [25] Robert G. Hollands. 2008. Will the real smart city please stand up? Intelligent, progressive or entrepreneurial? *City*, 12(3), 303–320. <https://doi.org/10.1080/13604810802479126>
- [26] Robert Wilhelm Siegfried Ruhlandt. 2018. The governance of smart cities: A systematic literature review. *Cities*, 81(October 2017), 1–23. <https://doi.org/10.1016/j.cities.2018.02.014>
- [27] Sol Lanteri and Juan Luis Martirén. 2020. Colonización. In: *Palabras clave para el estudio de las fronteras Org. Benedetti, Alejandro Gabriel* (1o ed, p. 127–136). Ciudad Autónoma de Buenos Aires: Teseo Press.
- [28] Valdir Roque Dallabrida. 2015. Territory planning and management: The theory debate in Brazil and a prospect of practice according to theoretical contributions on territorial governance. *Revista Brasileira de Gestao e Desenvolvimento Regional*, 11(4), 51–77.
- [29] Vito Albino, Umberto Berardi and Rosa Maria Dangelico. 2015. Smart cities: Definitions, dimensions, performance, and initiatives. *Journal of Urban Technology*, 22(1), 3–21. <https://doi.org/10.1080/10630732.2014.942092>
- [30] W. Richard Scott. 1987. The Adolescence of Institutional Theory. *Administrative Science Quarterly*, 32(4), 493–511.
- [31] Walter D. Mignolo. 2017. Colonialidade: O Lado Mais Escuro Da Modernidade. *Revista Brasileira de Ciências Sociais*, 32(94), 01. <https://doi.org/10.17666/329402/2017>