

BUILDING UP LOCAL GOVERNMENTS' FINANCIAL RESILIENCE DURING PANDEMIC: EFFECTS OF (NON)TRANSFORMATIVE COPING CAPACITIES ON PUBLIC VALUE

André Feliciano Lino (University of Essex) - andre.lino@essex.ac.uk
Ricardo Rocha de Azevedo (FEARP-USP) - ricardo.azevedo@ufu.br
Thiago V F Soares (USP) - soares.thiago@usp.br
Rayane de Lima Silva (USP) - rayanelimacont@outlook.com

Resumo:

It has been recognised that local governments need to build up their financial resilience to cope with shocks (e.g., Covid-19), i.e., to develop internal capabilities to anticipate and cope with such frequent disruptions that end up affecting their finances. However, local governments usually rely extensively on non-transformative coping capacities, with heavy exploitation of buffering capacities that possibly prevent the organisation to increase or optimise their service delivery outcomes. Despite non-transformative coping capacities may bring positive short-term impacts to the public organisation's financial resilience, the over-reliance on buffering can generate higher levels of vulnerability over time, affecting the quality of services and enabling the gradual development of issues that impacts local governments' ability to achieve publicly desired outcomes on the long run. Through documentary analysis and interviews with two Brazilian local governments, we analyse how local governments' responses to the crisis that impact their finances ends up affecting public value. As the pandemic amplified awareness on trade-offs among multiple and competing values in society, it challenged public managers to balance values and manage risks considering both organizational (i.e., financial resilience) and citizens (i.e., public value) outcomes. Our results point out that the non-transformative coping capacities deployed to deal with the Covid-19 crisis may benefit local governments' financial resilience at the expense of public value. The preliminary findings also support a discussion that transformative coping capacities should be privileged to maintain or create collectively valued public services.

Palavras-chave: financial resilience; financial vulnerability; public value; earmarking

Área temática: Contabilidade Aplicada ao Setor Público e ao Terceiro Setor



BUILDING UP LOCAL GOVERNMENTS' FINANCIAL RESILIENCE DURING PANDEMIC: EFFECTS OF (NON)TRANSFORMATIVE COPING CAPACITIES ON PUBLIC VALUE

Abstract

It has been recognised that local governments need to build up their financial resilience to cope with shocks (e.g., Covid-19), i.e., to develop internal capabilities to anticipate and cope with such frequent disruptions that end up affecting their finances. However, local governments usually rely extensively on non-transformative coping capacities, with heavy exploitation of buffering capacities that possibly prevent the organisation to increase or optimise their service delivery outcomes. Despite non-transformative coping capacities may bring positive short-term impacts to the public organisation's financial resilience, the over-reliance on buffering can generate higher levels of vulnerability over time, affecting the quality of services and enabling the gradual development of issues that impacts local governments' ability to achieve publicly desired outcomes on the long run. Through documentary analysis and interviews with two Brazilian local governments, we analyse how local governments' responses to the crisis that impact their finances ends up affecting public value. As the pandemic amplified awareness on trade-offs among multiple and competing values in society, it challenged public managers to balance values and manage risks considering both organizational (i.e., financial resilience) and citizens (i.e., public value) outcomes. Our results point out that the non-transformative coping capacities deployed to deal with the Covid-19 crisis may benefit local governments' financial resilience at the expense of public value. The preliminary findings also support a discussion that transformative coping capacities should be privileged to maintain or create collectively valued public services.

Keyworks: financial resilience; financial vulnerability; public value; earmarking.

Área temática: Contabilidade Aplicada ao Setor Público e ao Terceiro Setor

1. INTRODUCTION

Covid-19 crisis (the pandemic) is one of the most recent examples of sudden shocks that are becoming part of the routine for local governments (LGs) (STECCOLINI; SALITERER; JONES, 2017). It has been recognised that LGs need to develop internal capabilities to anticipate and cope with disruptions that affect their finances (Barbera et al., 2017), i.e., financial resilience. To do so, LGs usually rely extensively on non-transformative coping capacities (AHRENS; FERRY, 2021; PADOVANI et al., 2021), with heavy exploitation of buffering capacities that possibly prevent the organisation to bounce forward (BARBERA et al., 2017), i.e., to increase their service delivery outcomes. Despite non-transformative coping capacities may bring positive short-term impacts to the public organisation's financial resilience, the over-reliance on buffering can generate higher levels of vulnerability over time (BARBERA et al., 2017), which may affect the quality of services provision and enabling the gradual development of issues that impacts LGs' ability to achieve publicly desired outcomes on the long run.

As "public value is produced when people's lives are improved as a result of the services a public organisation provides" (HÖGLUND et al., 2021, p. 1611), looking at the underresearched impacts of non-transformative coping capacities on the citizens served by LGs provides an opportunity to answer calls from the literature urging researchers to explore the impacts of accounting and calculative practices in the creation, maintenance, or destruction of



public value (STECCOLINI, 2019; BRACCI et al., 2021). For instance, public organisations seem to give more weight to their (financial) resilience as opposed to the overall system resilience - which includes the most vulnerable citizens (BOVAIRD; QUIRCK, 2017) – and this focus may end up limiting public value creation. As income inequality is generally higher in emerging economies than in the most unequal European and developed countries (OECD, 2018), we argue that measures towards financial resilience should be responsive to this context.

Through documentary analysis and interviews on two Brazilian LGs that faced financial and non-financial impacts during pandemic, we observe how LGs' responses to the impacts in their finances may end up affecting public value. As pandemic amplified awareness of trade-offs among multiple and competing values in society such as in the debate of health versus the economy (BRACCI et al., 2021), it challenged public managers to balance values and manage risks considering both organizational (i.e., financial resilience) and citizens (i.e., public value) outcomes (BRACCI, et al., 2021; BOVAIRD; QUIRCK, 2017).

Our preliminary results show that non-transformative coping capacities deployed to deal with the pandemic may benefit LGs' financial resilience at the expense of public value. Our findings also support the discussion that transformative coping capacities should be privileged to maintain or create collectively valued public services. We contribute to the literature by highlighting the (temporal) relationship between financial resilience and public value. Moreover, we highlight how the pandemic was taken as an opportunity to establish a new expenditure pattern in some specific government functions – which has also long-term effects due to public sector incrementalism.

2. LGS FINANCIAL RESILIENCE AND RESPONSES TO CRISIS: WHERE IS PUBLIC VALUE?

Since Hood (1991) identified lambda-type values – i.e., the public administration's capacity to continue its operation even in worst-case scenarios and quickly adapt to crisis – as one of the core values in public management, the idea of governmental resilience debuted in the academic literature. Barbera et al. (2017, p. 670) coined the term governmental financial resilience, i.e., "governments' ability to anticipate, absorb and react to shocks affecting their finances over time". It can be described as a dynamic combination of inter-related dimensions, such as (i) external pressures stemming from environmental conditions, (ii) (perceived) vulnerability, (iii) anticipatory capacities, and (iv) coping capacities of governments (STECCOLINI et al, 2017; BARBERA et al., 2017). Barbera's et al. (2017) model allowed academics to bring back the focus to lambda-type values and to analyse in depth the skills and organizational capacities that are required to cope with the crisis – a longstanding call from the literature (BOIN; LODGE, 2016).

There is no one one-size-fits-all approach to resilience – since it depends on external and internal factors such as public sector organizations' latent capacities and on how they perceive their vulnerability in the face of a crisis (SHAW, 2012; VAN DER VEGT et al., 2015; STECCOLINI et al., 2017; BARBERA et al., 2021). Therefore, financial resilience is not a property or a pattern from a public sector organization, but a capacity that can be built. Anticipatory capacities are one of the main categories of internal capacities for facing shocks, alongside coping capacities. Anticipatory capacities are the availability of tools and resources that facilitate the identification and management of shocks before they arise. Coping capacities are related to actions and skills that management can deploy to deal with shocks and can take three forms – buffering, adapting, and transforming (BARBERA et al., 2017). First, buffering, i.e., absorbing the impact of crisis without changing structures or functions, protecting the basic structure already in function within LGs, focusing on budget balance, and prioritizing spending cuts. Second, adapting capacities relate to the ability to adapt, which is concerned with

implementing changes in the structure, but preserving its principles, culture, and values. Third, transforming capacities take radical measures to deal with the shock, changing organizational structure, principles, positions, and functions.

ONGRESSO

Responses to the crisis are contextual-dependent (CEPIKU; MUSSARI; GIORDANO, 2016), but follow mainly two approaches (BARBERA et al., 2021). Depending on the dynamic deployment of capabilities and their interaction with the external environment the governments may simply react to crisis without major changes to the organization – *non-transformative* capacities, bouncing back to an original state – or respond to the crisis by developing new capabilities and transforming the way organizations operate – *transformative* capacities, bouncing forward to another situation (AHRENS; FERRY, 2020; BARBERA et al., 2021). Thus, resilience is not just related to absorbing shocks, but learning from them (GIUSTINIANO et al., 2018). Public sector organizations should not just absorb shocks to return to the pre-shock state (bounce back) to achieve financial resilience; more than that they need to adapt and transform to bounce forward (MARTIN; SUNLEY, 2015; BARBERA et al., 2017).

Although different forms of coping capacities exist, the usual (re)action of governments to pressures that affected their finances (decreasing revenues or increasing demand for expenses) has focused on buffering and bouncing back - increasing taxes or fees for the use of services, and relying on budgetary cutbacks (SCORSONE; PLERHOPLES, 2010). The extant literature has already discussed how financial resilience relies on strategies like cutback management to cope with crisis (KONING, 2015; AHRENS; FERRY, 2020). Scholars also observed similar responses during pandemic (e.g., BALL, 2021; JOSE et al., 2021; KLIMANOV et al., 2021; PADOVANI et al., 2020; UPADHAYA et al., 2020). In some extreme cases, willing to reduce costs, LGs have stopped providing certain services, for instance, in the Netherlands and the UK (KONING, 2015; AHRENS; FERRY, 2020). Vize (2019) shows that buffering responses in the UK lead to the non-provision of non-statutory services such as home repair services for the elderly and vulnerable people. Specifically, in the UK, even statutory services (e.g., child and adult social care) have raised concerns (AHRENS; FERRY, 2020). Although the literature recognizes that coping capacities to crisis range from non-transformative to transformative strategies, most of the empirically grounded responses correspond to the first group (see case studies compiled by Steccolini et al., 2017).

However, resorting to non-transformative capacities when coping with crisis – especially when this means stop providing some essential services – present a major pitfall. Vulnerable citizens are the most affected by crisis due to their lower incomes, greater exposition to danger, and higher percentual loss of their "wealth" when the shock occurs (HALLEGATTE et al., 2017). They face difficulties to access financial systems and governmental support to recover from the pressure they've been through (HALLEGATTE et al., 2017). Therefore, they are the ones who most need governmental support and access to public services to cope with the impacts of crisis on their daily lives (SANTOS; LEITEMMAN, 2016) and crises' periods highlight the relevance of public sector to reestablish issues of social relevance creating and maintaining public value (STECCOLINI, 2019). When governments resort to non-transformative capacities, they affect vulnerable citizens twice: first, citizens are hit by crisis, and then they are impacted by the lack of access to public services.

The government has a special role as a guarantor of public value (BRYSON et al., 2014), meaning that there are specific government policies that create value aligned to the public interest (JACOBS, 2014). Höglund et al. (2021, p.1611), argues that "public value is produced when people's lives are improved as a result of the services a public organisation provides". Therefore, in time of crisis, governments efforts must seek social satisfaction and wellbeing through continuity and improvement in public services leading to the creation of public value. This leads to the necessity to balance different public value drivers scattered through society.



Over-reliance on non-transformative capacities to cope with crisis may balance the budget, but create a social imbalance, since they generate higher levels of vulnerability over time (BARBERA et al., 2017) – which may create snowball affecting services and its outcomes on the long run. Therefore, public organisations may not give more weight to their (financial) resilience as opposed to the overall system resilience – which includes the most vulnerable citizens (BOVAIRD; QUIRCK, 2017) – as this focus may end up destroying or limiting the creation of public value.

Therefore, public value should be incorporated in discussions related to financial resilience, since organisational responses to crisis are affected but will also affect LGs' external environment. Discussions on resilience and public value provides a step forward toward increasing government accountability, improving collective decision-making, and continuous learning about what is valuable and doable through government action (STECCOLINI, 2019).

3. METHODOLOGY

Based on documentary data (official documents, budgetary data, legislation, newspaper articles) and interviews, our paper analyse how LGs' financial response to the crisis ends up affecting public value. We intentionally (PATTON, 2015) selected two LGs in Brazil (São Paulo and Manaus) that (i) faced non-financial impacts during the pandemic crisis (e.g., São Paulo with the greater number of cases and deaths, Manaus with the most dramatic scenario – as described in the following section); (ii) showed lack of perceived vulnerabilities prior to the shock. Table 1 highlights characteristics of the selected LGs.

Table 1. Characteristics of LGs analysed		
	Manaus (AM)*	São Paulo (SP)*
Annual budget 2020; % grants	BRL 7,727 billion; 53.3%	BRL 69,029 billion; 24.5%
Cash and cash equivalents (2019)	BRL 889.7 million	BRL 13.228 billion
Cash <i>ratio</i> $(2019)^4$	6.93	2.34
Budgetary surplus ³	Positive	Positive
Budgetary volatility ³	Low	Low
GDP per capita (2019)	BRL 38,880.73	BRL 62,341.21
HDI ¹ (relative position in the state)	0,774 (Top 1)	0,805 (Top 15)
Population 2020 (thousands)	2,209	12,330

aT C

11,401 km²; Tropical (Am) 1,521 km²; Subtropical (Cfa) Geography (area and climate²) Source: Authors. Notes: Grants include federal and state transferences to municipalities. (1) Human development index. (2) Climate by Köppen and Geiger classification. (3) Budgetary surplus is the average budgetary surplus for 2011-2020 (the last ten years, see Aquino and Cardoso, 2017), and the volatility is the standard deviation for the same period. (4) Cash and equivalents ÷ short-term liabilities.

3.1. Data collection

We collected governmental responses to the crisis through official documents (e.g., technical reports and legislation), newspaper articles and official news (available on LGs websites). We also collected evidence of the impacts of such responses to the citizens living on these LGs – as a way to understand how the responses impacted public value. A total of 590 documents from 2020 to 2022 were collected – the period in which the pandemic spread in Brazil. Table 2 describes the amount and type of documents collected.

Another source comprises LGs finances and budgetary information – a bi-monthly data concerning revenues and expenses, from 2019 to 2022. We also collected data from basic LGs information survey of the same period (i.e., 2019 to 2022).



Table 2. Documents conected by type and local government							
	Manaus (AM)	São Paulo (SP)					
Gov. Responses							
Newspapers articles	15	25					
Academic papers	3	-					
Official news	234	250					
Official documents	14	10					
Impacts Pop.							
Newspapers articles	8	24					
Academic papers	3	-					
Official news	-	-					
Others ¹	3	-					

Table 2. Documents collected by type and local government

Source: Authors; (1) Other documents includes YouTube videos and documentaries about the pandemic.

We also conducted interviews. We reach potential participants via e-mail and relied on pre-established connections with accountants and auditors working in both LGs. Starting from initial participants, we increased the number via snowballing technique (PATTON, 2015). We realized 13 semi-structured interviews (Table 3).

Tuble 5. Inter viev	details	0		
Interview	Case	Occupation	Date of interview	Duration
1	Sao Paulo	Internal auditor	Jun/2022	00 h 44 m
2	Manaus	Internal auditor	Jun/2022	00 h 58 m
3	Sao Paulo	External auditor	Jun/2022	00 h 44 m
4	Sao Paulo	Accountant	Jul/2022	00 h 59 m
5	Manaus	Social Care secretary	Jul/2022	01 h 07 m
6	Manaus	Health secretary	Jul/2022	01 h 03 m
7	Sao Paulo	Government coordination	Aug/2022	00 h 54 m
8	Sao Paulo	Internal auditor	Aug/2022	00 h 27 m
9	Manaus	Health secretariat	Oct/2022	00 h 28 m
10	Manaus	External auditor	Oct/2022	00 h 56 m
11	Manaus	External auditor	Nov/2022	00 h 51 m
12	Manaus	Health secretariat	Nov/2022	01 h 04 m
13	São Paulo	Finance secretariat	Jun/2023	01 h 00 m

Table 3. Interview details

Notes: total interviewees per local government: Manaus (7); and São Paulo (5).

The interviews were conducted with civil servants linked to the financial departments of the governments (e.g., accountants and auditors), and civil servants working on departments that deliver public services (e.g., managers of health, social care). The variation in participant features supports triangulation (FLICK, 2014). All interviews were conducted remotely, via videoconference between June 2022 to June 2023. The interviews were recorded (with permission), and lasted an average of 51 minutes, totalizing more than 11 hours.

When interviewing staff linked to financial departments, we focused on the financial responses from managers and accountants, and the views of auditors, on how LGs responded to the pandemic. While interviewing managers of departments delivering public services (e.g., social care and health), we focused on how they were impacted by the financial responses promoted by other actors within their organization – and how this would ultimately impact the services they provide and public value.

3.2. Data Analysis

We proceed a thematic analysis (WILLIG, 2014) applying two types of coding (deductive and inductive) to the different set of data we collected on documents and interviews. Regarding data about the governmental (financial) responses to the pandemic, we proceed a deductive coding – called provisional coding (SALDAÑA, 2016). Our provisional coding was



based on the extant literature on financial resilience, specifically focusing on Barbera's et al. (2017) categorization of coping capacities adopted by governments during crisis. It makes possible to simultaneously analyse (i.e., code) and collect the relevant data.

We then proceed an inductive coding to observe the effects of governmental responses to the crisis on public services and (vulnerable) populations. Starting with paragraph-by-paragraph team-based open coding we then proceeded a second cycle of focused coding to identify major (and more salient) themes coming from the dataset (SALDAÑA, 2016; CASCIO et al., 2019). Initially, each case study was analysed by one researcher, following, all researchers analysed the data collected and compared their initial coding in a shared spreadsheet. After consensus about the initial coding, a second round of focused coding followed the same pattern. It "requires decisions about which initial codes make the most analytic sense" (CHARMAZ, 2014, p. 138), i.e., we discussed further until major categories or themes that proved useful to the research endeavour were extracted from the data.

Finally, we proceeded a descriptive analysis of the budget and financial data – to link overarching themes with financial figures during the period of pandemic, to explain patterns in relation to the responses pre-categorised.

4. THE CHRONOLOGY OF THE CRISIS ON SÃO PAULO AND MANAUS

The World Health Organization declared Covid-19 as a global pandemic on 11th of March 2020. In Brazil, the first infection had already been registered on February 26, and it quickly spread, having caused nearly 700,000 deaths and 37 million infections by early 2023 – around 17% of the country's population. The first case was confirmed in São Paulo on February 26 and in Manaus on March 13. The first deaths occurring about three weeks later.

Based on a narrative of "more Brazil, less Brasilia (capital city of Brazil)" (ABRUCIO; GRIN; SEGATTO, 2021, p.65), the central government decentralized and transferred the responsibility of pandemic control actions to LGs, adopting financial support as its main action (CARDOSO et al., 2022), renouncing coordination of pandemic control actions in the country.

Both Manaus and São Paulo declared a state of emergency on March 16, 2020. This allowed LGs to be more flexible in public procurement for the purchase of goods and services aimed at dealing with the emergency. Other actions included the implementation of teleworking regimes for civil servants, and the suspension of holidays for public servants in the areas of health, urban security, social assistance, and funeral services. The emergency decrees also imposed restrictions on access to public buildings, which had an impact on public service delivery in general, as emergency services began to be provided remotely (by phone or electronically), without prior time for adequate technological preparation of services. The extraordinary period caused the interruption of essential services that depended on face-to-face encounters, e.g., school, bus circulation, park, and various cultural events.

Although support for vulnerable community members was necessary, the LG's social care infrastructure was not fully utilised, and the social care support centres (20 in Manaus and 54 in São Paulo) were closed. Despite the extensive "Community Health Agent" infrastructure in both LGs, they were only used late in supporting the population, due to the absence of a national plan for their use and the fact that they did not even receive personal protective equipment or guidance to act (LOTTA et al., 2021), one consequence of the central government's lack of coordination (ABRUCIO et al., 2021; CARDOSO et al., 2022).

With the advance of the first wave of Covid-19 in 2020, both LGs began to build temporary hospitals, using their own resources and financial support received from the subnational and central governments. The search for personal protective equipment, oxygen, and respirators increased, as did the prices of used inputs. At the same time, part of the



population that lived in informal jobs was affected by the closures and had their source of income reduced. It was necessary to resort to NGO's aid and donations, in the first instance, as government aid took time to be put into practice. In the specific case of Manaus, an innovative action was to organize governance and transparency mechanisms for receiving donations, both in money and equipment and inputs.

After two waves of Covid-19 and the increase in cases, the first dose of the vaccine began to be applied, in January 2021. Since then, the number of deaths increasingly began to fall (ORELLANA et al., 2021), and restriction measures such as obligatory mask use began to be relaxed, favouring the continuation of economic activities and public services.

4.1. Manaus context

Manaus, the pandemic resulted in the collapse of the health system around January 2021. In this period, the average of deaths grew 183% and in 12 days there were 2,128 patients hospitalized without enough oxygen to them. Recent data show that Manaus recorded 14,547 deaths since the pandemic began, and there is still discussion about the under-reporting. In this scenario, beyond health issues other great challenges were found. Manaus plays an important economic role in the state, since it concentrates large industries of various productive sectors in a free trade area called "Manaus Free Trade Zone" (MFTZ), but most of the companies faced numerous difficulties such as decreased demand and lack of labor. The cascading impact mainly affects those below the production chain, as the vulnerable population with scarce economic resources.

At the beginning of the pandemic (in March 2020), Manaus was in a financially comfortable situation, with a ratio of 6.93 between cash and short-term obligations, which means a surplus of 593%. Additionally, the city received financial support from the central government, between June and September 2020, in the amount of BRL 255 million, to be used in actions related to mitigating the impacts of the pandemic.

Still in March 2020, the health structure in Manaus had 3,547 hospital beds, which means 2 beds per 1,000 inhabitants. Although there were no municipal hospitals, there were 254 primary health care units for its 2.182 million inhabitants. Furthermore, 1,519 community health workers provided direct healthcare to the community, mainly through home visits. Lastly, the social assistance structure had 20 social support centers that help vulnerable families.

One month later (in April 2020), Manaus already had 1,206 cases – which demonstrates the speed of contagion. This context led to the adoption of emergency measures, i.e., restriction of public services offered, suspension of classes followed by adoption of distance learning, mandatory use of masks and the construction of a temporary hospital.

As part of emergency actions, nurses and doctors were hired to work in health actions. In a co-production initiative, Manaus organized the receipt of donations. Following a transparency initiative, Manaus made available monitoring tools on its website, detailing all resources received, and opening hotlines for complaints and ombudsman, creating governance mechanisms. This organisation had a positive effect, and Manaus received support from various third sector entities, private companies, individuals, and even from the government of France, which donated BRL 2.8 million in 2020. Masks, hand sanitisers, hygiene materials, hospital protectors and gloves, and even health equipment were received, indicating the engagement achieved. In addition to the public sector's performance, society itself organized to support vulnerable people, as shown by UNICEF's actions in the municipality.

The economic and social impact was high. Around 85% of private companies in Manaus were totally or partially paralysed during the pandemic, and 54% of respondents had laid off employees by May 2020. A similar scenario unfolded throughout the entire rest of 2020.



In January 2021, the Manaus healthcare system collapsed, mainly due to the lack of oxygen for hospitalized patients. At this point, Manaus no longer had temporary hospital. The health collapse had a national impact, and organisations from various parts of the country and even from other countries began to send oxygen to Manaus, in a dramatic event that the whole country watched live as people died without oxygen. In the same month, vaccines began to be applied initially to healthcare professionals, being gradually applied to the population. Although some resistance, the situation began to change, and even with the number of infected people continuing to increase, the death rate gradually began to reverse.

4.2. São Paulo context

São Paulo has the largest population in Brazil (higher than countries such as Portugal, Sweden, and Paraguay). Although being positioned in the first place in terms of income, with one of the highest per capita GDP indices in the country, it has wide income inequality – as per its Gini index. São Paulo was in a financially comfortable situation in March 2020, with a ratio of 2.34 between cash and short-term obligations, i.e., 134% surplus of available funds. Additionally, it received financial support from the central government between June and September 2020 in the amount of BRL 1.372 billion.

In March 2020, São Paulo's healthcare structure had 29,312 hospital beds, indicating a ratio of 419 inhabitants per bed. There were 20 municipal hospitals and 468 basic healthcare units for its 12.3 million inhabitants. Furthermore, 8,051 community health workers provide direct health care to the community, mostly through home visits. Finally, the social care structure had 54 social support centres, which receive vulnerable families for assistance.

Given the wide circulation of people in the city, São Paulo was the first LG to confirm a Covid-19 case in Brazil (26th February 2020). It was also the first to confirm community transmission. In 20 days, 100 cases were already confirmed, and the first death was announced. In less than two months, there were already 100 deaths confirmed. With the vertiginous spread of Covid-19, São Paulo had to adopt several measures. In the health reorganisation, four temporary hospitals were built between April and May 2020, and eight new municipal hospitals were inaugurated, in addition to training health professionals to provide care in the new context. It should be noted that some of these initiatives were already under development, which indicates that pre-existing conditions directly affect vulnerability.

Restrictive measures began to be adopted as part of the so called "São Paulo Plan" organized by the State government. The plan was organized into five phases, varying in relation to the degree of contamination. For instance, in the red phase (phase 1), only essential services could be performed, and in the blue phase (phase 5), all activities were allowed, submitted to specific health and safety protocols. Among the restrictive measures, it can be mentioned the closure of parks, teleworking for public servants, limitation of in-person delivery for public services, including for the attendance of funerals and burials of the dead.

The vaccination of São Paulo citizens started in January 2021. Several measures have been adopted by São Paulo regarding the economic and social aspects. These include prioritizing mothers and the elderly in healthcare services, emergency credit lines for loans to small businesses and individuals and expanding the accreditation of Civil Society Organizations (CSOs) to provide health and social assistance services, such as care for the elderly. Maintaining full payment of salaries and outsourced contracts with the city, even during service shutdowns or suspensions, was a relevant action, guaranteeing the maintenance of 108,000 jobs with full salaries and preventing the closure of CSOs during the pandemic. Additionally, the city hall prioritized and contracted small businesses to produce masks and personal protective equipment that was distributed to the population and public servants who work in healthcare services, as well as producing lunch and dinner for people in situations of vulnerability. Among the actions,



there was also the payment of emergency basic income, a program aimed at financially supporting families in need.

5. THE RESPONSES TO THE CRISIS: THE ROLE OF (NON)TRANSFORMATIVE COPING CAPACITIES

Here, we conceptualise non-transformative responses as those that does not change core functions of LGs such as buffering (focusing on budget balance, prioritizing spending cuts including downsizing and incrementing revenues through taxes increases or selling assets) and adapting capacities (BARBERA et al., 2017; 2021). Those non-transformative capacities to cope with crises are reactive and LGs aim to *bounce back* to the pre-crisis state. Transformative capacities, however, are defined by *bouncing forward* to a new state – by anticipating ways of managing vulnerabilities and enhancing or developing new capabilities (BARBERA et al., 2021). Moreover, the type and the higher perception of a shock impacting the institutional, economic, and social environment of a LG will also affect their bouncing back and bouncing forward strategies (BARBERA et al., 2021).

The shock being analysed, gained attention in Brazil in early March 2020, following the World Health Organisation's declaration of Covid-19 as a global pandemic (11^{th} March 2020) and the first confirmed case in the country (26^{th} February). Pandemic clearly affected the whole range of environmental conditions in which LGs operates. The social environment was highly affected by the virus spread, the anxiety and shared feeling of powerlessness, social distancing, and increased vulnerability for communities. Soon it was noted that the economic environment was also affected due to the economic downturn resulting from social distancing and lockdowns. Finally, the institutional environment also changed with increasing use of technology and new regulations being set to support responses during the period of crisis. Also important, the perception of the impact of the crisis changed over time: initially, as we will discuss, the LGs were not attentive to the destructive potential of the virus; over time sensemaking played a role and measures were taken aiming reducing negative consequences associated pandemic – but again, our discussion shows that most measures were constantly redesigned and usually focused on the short term, especially in Manaus.

5.1. Non-transformative responses to the Covid-19 shock: types and results

Due the nature of pandemic, our interviews point out to the feeling that LGs were unable to keep the vulnerabilities arising from the crisis under control – something the literature on financial resilience referred to as the exogenisation of vulnerability sources (Barbera, 2017). For instance, in Manaus, although a crisis committee being established including members of this government and the subnational government (upper tier), the interviewee 02 argues that "as you know the annual budget law for the 2020 budget was approved by the end of December 2019. The law is based on a regular-scenario forecasts; it was not foreseen, it was not supposed, that there would be a pandemic in the following year. When, suddenly, the pandemic appears the budget was not prepared to face it". Similarly, interviewee 03 argues that "like every other government in the world, [São Paulo] was surprised by the crisis" and interviewee 13 pointed out that Brazil was just finishing the worldwide famous Carnival party – and the climate was not of fear. According to Barbera et al., (2017), exogenisation leads to powerless and non-transformative actions such as buffering – and less attention is given to the development of other internal capabilities such as anticipatory capacities.

Indeed, we observed that both LGs relied extensively on non-transformative capacities to absorb the economic impact of the shock without changing core structures or functions in place before the pandemic. For instance, in Manaus, interviewee 02 stated that following the shock, in March 2020, "*the city hall had to make a quick rearrangement [on the budget] to*



adapt to this new reality, because it was expected that expenses, mainly in the area of health, would increase and revenues would fall due to the decrease, even the stoppage, of economic activity". According to the same interviewee, the first response to the shock was mainly a budgetary one:

"The mayor [of Manaus] met with head of departments and issued decrees to limit expenses. So, he did a job to reduce expenses, to reduce contracts [values] or percentages of contracts."– Interviewee 02

Initially, *Manaus* planned to reduce current expenditure in approximately R\$500 million – aiming to cover the forecasted impact of economic downturn due to the Covid-19 on their revenue collection. For instance, Manaus put in place spending freezes lasting four months – until July 2020 – related to civil servants' salaries, prohibition to hire new civil servants in this period, suspension of other benefits (i.e., allowances and gratifications), as well as renegotiation of contracts aiming to reduce 25% of their current expenditures– importantly, all those measures were not applicable to the departments of health and social care. Free public transport for the elderly was cancelled for one month as a measure to reduce costs and social mobility in Manaus.

As the pandemic unfold, the perceptions of its permanency and longevity changed. For instance, in May 2020 a new round of expenditure cutbacks happened in Manaus, as stated by its mayor: "what we want to do is adjust Manaus to its budget, which is falling". Adjustments to the initial plan were common during the crisis – although more evident in relation to internal organisation (e.g., emergency-telework, being postponed more than five times in 2020) and social protection (e.g., impediment/cancelation of large gathering events, postponed seven times; no charge for public parking lots, postponed more than five times), these adjustments were also frequent on budget related matters. Despite the financial aid from the central government, buffering and minor adaptative capacities were constantly adopted during the second semester of 2020 in Manaus, such as the downsize of 110 appointed positions (not tenured) and the rollout of an administrative reform involving displacement of departments – including the department for youth, sports, and leisure - and reduction in the structure of the department for environment and sustainability. A second round of renegotiation and suspension of contracts occurred. Major adaptative capacities deployed until December 2020 includes the construction of a building to allocate different departments from LG - freeing them from payments of rents. In December 2020, Manaus also sold assets (eight buildings), and according to the mayor these "properties are of no use in the short and medium term and some of them are valuable in the real estate market. So, this is a way to raise our cash". Table 4 presents that obtaining revenues through fixed asset disposals was a strategy adopted in Manaus.

São Paulo city was also anticipating revenue downturns due to the pandemic. During a press conference, in March 2020, São Paulo mayor said that a loss of revenues in around BRL 1.5 billion was expected due to the economic downturn. In late March, the (re)allocation of uncommitted resources from LG funds (exactly BRL 1.5 billion) was authorized for actions to fight the coronavirus. Those funds are related to urban development, environment, cultural activities, sports and leisure, tourism, parks and recreation, sanitation among other services. In late March, it was also implemented a 6-month suspension of debts payments to suppliers. Adapting services to non-face-to-face led to savings around BRL 2 million, but also served to reallocate more than 400 civil servants to other activities. From June to September 2020, São Paulo received financial support of R\$1.3 billion from the central government.

During the pandemic unfolding, buffering and adaptative measures were not adjusted in São Paulo. This is likely to happen because São Paulo city has been implementing austerity measures for several years – which facilitated navigating through the crisis, as mentioned:



"I think that São Paulo entered the crisis in a position of advantage, because personnel expenses were controlled, the debt was controlled, [...] and everything else – we arrived in a position of advantage in the pandemic and ended up benefiting from transfers from the federal government, renegotiation of contracts and increases, or at least maintenance, of the revenues... we entered and we left the pandemic in an advantageous position. The municipality of São Paulo is not suffering. That's the truth." – Interviewee 01

Even under a positive scenario, the several non-transformative measures taken in the early period of the pandemic favoured São Paulo in accumulating even more cash and equivalents. Interviewee 01 also pointed that "the renegotiation of some contracts, in addition to the freezing on civil servants' salaries on the one hand, combined with the increase in revenue collections, on the other hand, ends up making us to accumulate cash".

This evidence shows since the early days of the pandemic, both LGs focused mostly on budgetary balance and spending cuts – as a response to an exogenous vulnerability emerging from pandemic. Manaus readjusted its buffering strategies, while São Paulo seemingly did not have to take continuous rigid austerity measures during the pandemic development since its initial financial position (before the pandemic starts) was more comfortable.

But what are the results of such non-transformative coping capacities for the financial vulnerability of both LGs? Table 4 presents the variation of financial position for Manaus and São Paulo between 2019 (pre-Covid) and 2022 (post-Covid). As presented by our interviewees, São Paulo presents a high growth in cash generation under this period (78%, between 2019 and 2022), while Manaus consumed cash in the first year of the pandemic (2020) but present a growth in cash generation both in Manaus (74%, in 2021) during the second part of the crisis – resulting in a maintenance of cash during entire period (no variation between 2019 and 2022).

Table 4. Variat	abic 4. variation on specific financial aspects during the COVID-19 pandemic, per case											
Case	Cash (%)	Long-term debt (%)	Tax revenue (%)	Fixed assets' Disposal (%)	Revenue Transfers (% grants) ⁽ⁱⁱⁱ⁾	Capital expenditure (%)	Current expenditure (%)					
Manaus												
Δ 2019-2020	-13	33	-1	195	9	42	5					
Δ 2020-2021	74	-2	2	8	1	6	-5					
Δ 2021-2022	-34	-11	12	297	10	-27	18					
Δ 2019-2022	0	16	13	1,170	20	11	19					
São Paulo												
Δ 2019-2020	30	-4	-1	58	10	29	2					
Δ 2020-2021	24	-12	12	-60	-3	-36	2					
Δ 2021-2022	10	-55	3	-61	3	132	10					
Δ 2019-2022	78	-62	14	-75	9	93	14					

Table 4. Variation on specific financial aspects during the COVID-19 pandemic, per case

Notes: (i) Δ means variation. (ii) monetarily adjusted up to December/2022. (iii) Revenue transfers are compulsory and voluntary transfers received from other levels of government.

The increase in cash may demonstrate inconsistencies on the narratives, or overconservative forecasts (interviewee 13), followed by both LGs that suggested a decrease in revenue collection during the pandemic. From the beginning of the crisis, this narrative was used to legitimize non-transformative capacities – impacting services closure. Despite a minor retraction in tax revenue on the first year of the pandemic (2020), there was a growth in both tax revenue and revenue transfers (grants) in both cases when considering the entire period of analysis (2019 to 2020 – considering values adjusted for inflation). The cash was favoured by the mismatch in the variation between revenues and expenses favoured by inflationary pressure on the prices of products and services, which are always monetarily adjusted. While current



revenues remained in real growth, current expenditures consistently showed lower growth rate. As pointed out by interviewee 01, this context favoured cash generation:

The revenue did not decrease, perhaps even increased a bit. [...] Even though the economic activity suffered a setback, the price of services increased in some way, resulting in a higher municipal tax levied on the rendering of services. [...] There was also a tax amnesty program, which encouraged taxpayers to pay their debts in instalments. Therefore, there was a robust revenue in the municipality of São Paulo in the last 2 years [during the pandemic]. There was no decrease in revenue, and there was also a grant from the federal government due to the Covid pandemic. Interviewee 01

Central government has transferred BRL 255 million to Manaus and BRL 1.3 billion to São Paulo as an aid, which could be used to cope the pandemic and assist vulnerable population (CARDOSO et al., 2022). São Paulo and Manaus presented a decrease in long-term debt (see Table 4), which resulted from contracts renegotiation but also from the financial support received from the central government. Although Manaus presented an increase in long-term debt (average increase of 16%) in the period, a decrease in indebtedness was observed between 2020 and 2022 – point out to some degree of control over the debt. The decrease in indebtedness in São Paulo was significant, with an average decrease of 38%, being consistent over the entire period of pandemic. Overall, the results of non-transformative capacities deployed locally, and the financial support received from the central government put both LGs in a comfortable financial position.

5.2. Non-transformative responses and its effects on LGs' expenditures

As seen, LGs responses to the crisis led to maintenance and accumulation of cash and equivalents. However, the pandemic exacerbated pressures on vulnerable communities. As typically happening in high-magnitude crisis, governments finances may suffer pressures by shortage of revenues and increased demands for services. Here, we aim to analyse the expenses (and responses) related to services that limit public value creation to communities.

It is possible to note that current expenditures suffered during the more rigorous period of the crisis (see Table 4), but the cash accumulation context led to the expansion of spending on fixed assets and infrastructure investments in both LGs (capital expenditure). For Manaus, this was a beneficial context since, before the pandemic, the city was investing in public infrastructure – therefore, it was able to maintain and secure these investments during the crisis. When Manaus deployed non-transformative capacities, the mayor stated that "we are taking precautions and projecting a large budget cut, which will not affect our public works at all. These will continue smoothly, as the money is all preserved and effectively available to be used". Thus, from the government's perspective, maintaining investments in public infrastructure during the crisis period was a priority.

Noting the increase in capital expenditure, our interviewee (education department) brings another relevant point -i.e., the role of the regulatory context in Brazil:

Due to the renegotiation of contracts, there was a reduction in the cost of most of our contracts – reducing expenses from these continuous contracts, [...] we had a huge difficulty in meeting education expenses of 25%. Financially, as I said, there was a lot of cash accumulated, and we are obliged by law to have a 25% investment in education. Without having where to spend, and having to reach the minimum application target, the expenses migrated to restoration of schools. (Interviewee 04)

The above-mentioned scenario happens as in Brazil a minimum of 25% of the net current revenue – i.e., the current revenues received but net of some retentions made at the origin of revenue receipt - must be allocated to education as a legal requirement. The healthcare sector has also a minimum earmarked expenditure of 15% of net current revenues. Table 5



compares earmarked and non-earmarked expenditures, aiming to analyse how these expenditure characteristics affected spending variation during the pandemic period.

Casas	Earmarked expenses					Non-earmarked expenses				
Cases	Ν	Mean	Sd	Min	Max	Ν	Mean	Sd	Min	Max
Manaus										
Δ 2019-2020	13	1.22	0.51	0.64	2.32	51	3.77	9.19	0.00	53.82
Δ 2020-2021	13	0.89 ▼	0.20	0.52	1.22	57	1.23	2.05	0.00	14.30
Δ 2021-2022	13	1.14	0.32	0.79	2.05	53	2.17	4.46	0.00	27.61
Δ 2019-2022	13	1.14	0.32	0.57	1.86	46	6.06	15.82	0.02	79.65
São Paulo										
Δ 2019-2020	16	0.94▼	0.20	0.68	1.40	71	1.30	1.78	0.00	13.74
Δ 2020-2021	16	0.99▼	0.35	0.14	1.85	70	2.61	12.42	0.00	104.70
Δ 2021-2022	16	1.13	0.38	0.02	1.62	72	2.56	7.56	0.00	62.25
Δ 2019-2022	16	1.11	0.51	0.00	2.51	68	2.01	3.10	0.00	23.66
Both cases										
Δ 2019-2020	29	1.07	0.39	0.64	2.32	122	2.33	6.18	0.00	53.82
Δ 2020-2021	29	0.95▼	0.29	0.14	1.85	127	1.99	9.31	0.00	104.70
Δ 2021-2022	29	1.14	0.35	0.02	2.05	125	2.39	6.41	0.00	62.25
Δ 2019-2022	29	1.13	0.43	0.00	2.51	114	3.65	10.46	0.00	79.65

Table 5. Variation on earmarked and non-earmarked expenses during the COVID-19 pandemic, per case

Notes. (i) 'N' represents the number of expenditure classifiers by government functions analyzed in each group. For example, the education area has 10 government function expenditure classifiers. (ii) The numbers indicate the average variation (with standard deviation, min and max) of the expenditure variation in each period. Example: the number 1.22 indicates that there was a 22% increase in the period.

Earmarking is relevant in Brazil, creating high budgetary rigidity, and being one of the cases with the highest proportion of budgetary earmarking in the world (BASSI, 2019). In the federal budget of 2017, for instance, around 72% of revenues were earmarked for specific expenses (NAVARRO, 2017). The excess of earmarking was pointed out by the World Bank as one of the main reasons for the inefficiency of public spending in Brazil (WORLD BANK, 2017).

Different effects were observed during the pandemic period. The earmarks of revenues for specific expenses in certain areas (e.g., health and education) somewhat "protected" spending, preventing it from decreasing over the period (cumulative variation of 13%). It was also observed that other expenses without minimum legal earmarking increased much more (between 14.3% and 265%). While protecting against spending cuts, earmarking expenses establishes an informally "ceiling" – since expenses do not vary much above the established limits, as if it were an informal ceiling.

Table 6 presents the annual percentage of expenses in proportion to the net current revenue by classification of functions of government (columns 2019, 2020, 2021, and 2022). This table includes expenditures that are not earmarked such as social care, sanitation, culture, and sport and leisure. Table 6 presents the overall variation (column Δ) in allocation of budget for each function of government during the pandemic (2019 to 2022). Whether a function of government presents a cumulative increase in budgetary allocation (Δ) and a decrease in the percentage of expenses in proportion to the net current revenue, it means that the net current revenue is increasing to a higher rate when compared to the amount being allocated to the specific function of government. This behaviour signal that the specific function of government may be losing priority in budget allocation and execution – despite not reducing its funding in real terms (e.g., education). When an overall negative variation in budgetary allocation cooccurs with decreasing expenses in proportion to net current revenue, that specific function of government may lose priority while being less funded (e.g., culture in São Paulo).



Case	Manaus					São Paulo				
Even and itseas? from ation	2019	2020	2021	2022	Δ	2019	2020	2021	2022	Δ
Expenditures function	(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)
Health	22.0	24.7	18.2	18.0	20.5	24.3	25.7	22.6	21.2	27.1
Education	35.2	31.6	27.8	27.6	15.1	27.1	22.0	21.3	20.5	9.7
Social care	2.8	2.3	3.6	2.2	15.2	2.9	3.5	2.9	2.3	14.2
Sanitation	2.5	0.8	0.8	0.2	-89.9	0.9	1.1	0.8	1.7	169.1
Urbanism	33.6	36.6	17.4	22.6	-0.9	9.4	10.7	7.5	7.9	22.7
Culture	1.2	1.0	0.4	0.7	-19.0	1.5	1.1	1.0	0.8	-92.6
Sport and leisure	0.4	0.2	0.1	0.2	-34.2	0.5	0.3	0.3	0.7	130.7
Liabilities amortization	10.7	7.9	10.9	10.8	48.9	12.2	6.4	8.8	4.8	-43.0
Proportion of net current revenue	154.5	154.8	115.5	112.7	-	127.6	119.0	103.6	103.3	-

Table 6. Percentage of expenses in comparison to net current revenue during the pandemic, per case

Analysing expenses during the pandemic (2019–2022), by expense classification (i.e., function), one can see that the healthcare sector – function with the greatest need for spending during the period – showed a decrease in spending (proportionally to net revenues) in the final year of the pandemic (2021) and the first-year post-pandemic (2022) in both Manaus and São Paulo. However, the overall variation (Δ) on budgetary allocations to healthcare during pandemic was increasing (20.5% in Manaus; 27.1% in São Paulo), meaning that the net current revenue is increasing to a higher rate when compared to the amount being allocated to the healthcare sector during the period. Whenever the net current revenue grows at a higher rate than the amount being allocated to the healthcare budget, it means that the pressure to allocate budget to the healthcare was alleviated and there were excess revenues to be allocated to other governmental functions. This effect may also be explained by an imaginary "ceiling" effect, resulting from the existence of a minimum percentage (15%) to be achieved, which would be generating the opposite effect – i.e., despite ensuring minimum spending, it ends up limiting spending because the "target" has been reached.

There is also decrease in spending on activities associated with public services, e.g., education, sanitation, culture, and sport and leisure, which may be preliminary evidence of a limitation in public value creation when the strategies adopted for spending cuts are carried out in a linear manner, e.g., 10% cut in expenses (RAUDLA; DOUGLAS, 2022). The decrease in expenses is somewhat associated with the measures taken to restrict mobility between 2020 and 2021 during pandemic. Both LGs needed to adapt their service delivery in most areas while facing pressures to support vulnerable community members and small-scale businesses. The first response-to the pandemic was to discontinue any face-to-face interaction in public services (apart from health), including social assistance services for vulnerable families. This led to reactions focused at short-term during the beginning of the crisis, e.g., closure of public spaces, social care centres, schools being planned to last only a couple weeks or months. However, Table 6 also shows that overall spending did not return to the same level as the pre-pandemic period, establishing a new spending pattern. In Manaus, there is a consistent negative variation in services like culture, sanitation and sports and leisure, while São Paulo presents a negative variation only for culture. This may be explained due to the comfortable financial situation in São Paulo before (and built up during) the pandemic, as opposed to Manaus that has had more difficulties having to redesign their buffering capacities over the first year of the pandemic to maintain their level of cash and financial pressures. Therefore, is seems that some level of precrisis preparedness impacted the way in which services were affected by non-transformative capacities deployed to cope with the Covid-19 shock.

The accumulated reductions on public services are a relevant effect to be observed, given the widespread acceptance of the existence of an incrementalism effect in public sector



budgeting (ANESSI-PESSINA et al., 2012) in which expenses tend to always grow in proportion to the previous expense. In this context, a new spending pattern would be established from pandemic period. Two alternative explanations arise. First, public value creation is being limited as specific government functions access less resources to deliver their services. Second, linked to the renegotiation of contracts as a non-transformative response during the crisis, may point out that those services are being more efficient – i.e., LGs may maintain their capacity to deliver the same level of services relying on less funding.

For both LGs, the data shows an increasing expenditure on urbanism in 2020 – the first year of pandemic but also electoral year. Due to political cycles, it is usual to have more public infrastructure works taking place in the electoral year, since politicians aim to gain votes based on "visible" public works. In Manaus, expenditures on urbanism correspond to more than 30% of current net revenues during the pre-pandemic (2019) and the first year of the pandemic (2020) – reflecting the priority of the government. In São Paulo, there is an accumulate positive variation in urbanism, and the expenditures are accentuated in 2020, maybe reflecting the construction of temporary hospitals during the initial year of the pandemic.

5.3. Non-transformative responses and public value

In this section we describe some service-related actions occurring during the pandemic period that were affected by LGs non-transformative responses to cope with the crisis. Ultimately, those actions may have impacted the public value related to the services delivered to the communities in need.

A subset of service-related activities increases expenditures and were intrinsically linked to the sanitary and social-economic emergency arising with pandemic – e.g., aids for vulnerable community members and increasing expenditure on temporary hospitals. For instance, due to the closure of schools in Manaus, free meals were not served to students anymore. Therefore, Manaus approved a food aid for 86,000 vulnerable students for two months (April and May), affecting the budget about BRL 4 million, or 1% of the expected loss of revenues due to the economic downturn. Around BRL 1 million was also expected to be used in an aid for small businesses and garbage collectors during the same period. Homeless people and other people in situation vulnerability were also granted access to free meals and aid to support them buying their own supplies in Manaus. Over time, an ongoing revision of the initial plan was in place, as extending the payment of food aid for vulnerable students until December 2020 (initially planned to last until May 2020). In Manaus, increased expenses involved the creation of the "Manauara Relief Program" that paid BRL 200 to 40,000 low-income families for 6 months. Manaus also granted extension of the due date of its taxes in instalments and the package of tax measures that reduced from 3.5% to 2% the rate of tax on goods.

Similar strategies were taken in São Paulo – e.g., the case of the programme that distributed packed meals to the most vulnerable, which was instituted at the start of the pandemic (in 2020) and delivered up to 10,000 packed meals per day. However, a change in the delivery model reduced the number of beneficiaries and targeted homeless by the end of 2021 – indicating an ongoing revision of programmes in São Paulo, as well as what happened in Manaus. With the cuts, less than half (4,000 meals) continued to be distributed.

Regarding education, in both LGs, schools closure led to reorganisation of the way in which the service was provided – specially for children, as in Brazil fundamental/basic education provision is under responsibility of LGs. In Manaus, the classes were transmitted via television, and some digital platforms were used complimentary. A similar strategy was followed in São Paulo – however, due to accountability issues, the buy-out and subsequent delivery of tablets to be used by students was delayed.

As previously stated, in Manaus, maintaining the investments on public infrastructure during the pandemic was a priority. Road works and revitalization of public spaces never stopped during the period, since the mayor stated that the budget for such type of public infrastructure works was secure and would not be cut – as opposed to other areas. This might with prioritisation of expenditures but also with specific funding that were accessed during this period. For instance, in June 2020, Manaus signed a contract to receive BRL 300 million to invest in public infrastructure. In São Paulo, reserves were also accumulated over time – however, they were used during the pandemic to decrease public debt.

ONGRESSO

The cultural sector was highly affected due to the closure of cultural centres, bars, restaurants, and concert rooms. Due to the pandemic, activities were interrupted and several professionals (i.e., actors, musicians, singers, etc.), especially the most vulnerable and local artists, found themselves without a source of income. Following a late response by the central government, Manaus implemented aid for artists only in September 2020. In São Paulo, the Municipal Secretariat of Culture promoted online cultural activities as a measure to avoid the interruption of workshops, courses, shows and parades, for instance.

In terms of health services, both LGs increased their personnel – including doctors, nurses, and assistant nurses – but also health infrastructure. Indeed, in April 2020, Manaus hired more than 400 health professionals, and new health infrastructure were build-up to cope with the health-related issues of the pandemic crisis. In São Paulo, four temporary hospitals dedicated to deal with Covid-19 cases were organised within the first semester of the crisis (in public parks and football stadiums). Manaus also counted on one temporary hospital that was built in a school that was close. In both LGs, however, the temporary hospitals were soon inoperant. For instance, in Manaus the emergency hospital ended their activities in June 2020 – before the peak of the pandemic on the city, and in São Paulo the four temporary hospitals opened between April and May 2020 were closed until September 2020.

In sum, to mitigate the impacts of the pandemic on the population, the LGs adopted measures that were limited to the duration of the pandemic (i.e., adaptive strategies). The LGs have not reinvented themselves, nor changed processes, but were constantly changing their initial plans and extending deadlines for aids and other "emergency" actions. Of course, these types of non-transformative capacities may have negative impacts for public value.

For instance, one of the first measures taken by the city of São Paulo in 2020 affected approximately 12,000 students, largely the elderly and people in vulnerable situations. A literacy project that worked in the vulnerable communities and operated in partnership with social organisations, but the municipal education secretariat had its funding suspended. The teachers continued their activities virtually even with the suspension of payments, but the cuts were maintained and affected 400 teachers and other staff who depended on income from this project to survive – around BRL 1,100 per month. Another critical example is the fact that nurses, auxiliaries, surgeons, and doctors of other specialties of a major hospital in the São Paulo were laid off during the pandemic – in January 2021. Therefore, some health services such as exams and consultations were interrupted, health posts experienced structural problems and/or had an increase in the time for emergency care and medical specialists. Transport and social development also suffered cuts during the pandemic which affected benefits and services especially granted to the elderly. Initially, the law guaranteeing free public transport for the elderly between 60 and 65 years old was revoked.

6. DISCUSSION AND CONCLUSIONS

Focusing on Brazilian reality, as a case of an emerging economy, our paper analyses how LGs' responses to the crisis that impact their finances ends up affecting public value.



Relying on documentary analysis and interviews, we analysed two LGs that faced several financial and non-financial impacts during the pandemic – which affected LGs' social environment, economic environment, and institutional environment.

Our findings point out that both LGs relied extensively on non-transformative coping capacities to deal with the shock from pandemic – e.g., buffering and adapting (BARBERA et al., 2017). As a result, both LGs improved their financial position due to increases in cash and decreased debt. Although the privileged financial position built up during the pandemic, our results present that this hasn't necessarily improved the provision of public services. While the earmarked expenditures (e.g., healthcare and education) presented a low variation in the period analysed – a sign that even during the pandemic they may not have been prioritised – the non-earmarked expenditures presented a higher variation (both positive and negative). For instance, (non-earmarked) expenditures in the culture department showed a steady decline in the period under analysis for both cases. Finally, LGs' non-transformative responses to cope with the crisis seem to have impacts on service-related actions to mitigate the impacts of the pandemic on the population. In general, both LGs adopted measures that were limited to the duration of the pandemic (i.e., adaptive strategies) that do not change processes and the overarching efficiency and economic logics guiding public managers. As shown, these types of non-transformative capacities deployed may have negative impacts on public value.

Our paper brings two main contributions to the literature. First, we discuss the relationship between financial resilience and public values. Although the potential benefits of non-transformative coping capacities for the financial resilience and budgetary balance in LGs – there seems to be an optimum equilibrium, especially in times of social need. Buffering would behave like an inverted U-shaped curve, in which marginal gains of such strategy accumulate up to a certain point, and then what can happen is a destruction of public value – when the financial resource is not converted into services for the population. For instance, in the case of São Paulo, the accumulation of cash and equivalents before the pandemic was positive, in terms of preparedness to cope with the Covid-19 situation and facilitated the LG to navigate the crisis on its first year (2020). Throughout the pandemic, the cash accumulation was maintained and was used to reduce the LG's short and long-term debts. However, this shows a type of prioritization in the budgetary allocation that may not necessarily demonstrate the optimization of public value aligned with the needs imposed by the emergency.

Second, we highlight how the crisis was taken as an opportunity to establish a new spending pattern based on incrementalism. Relying on short-term buffer capacities, such as budgetary cutbacks during the crisis period, has long-term effects. According to the incrementalism literature, the next year's budget is heavily based on the previous year's budget. Any decrease in the spending pattern, given the prevailing context of incrementalism in the public sector, generates a new initial level of spending for specific government functions, which grows again in an incremental way departing from the newly established value. In other words, LGs took advantage of the pandemic period to make cuts and establish a new spending pattern, while revenues continued to grow. This new spending pattern tends to be difficult to change, causing certain public services to have reduced their financial capacity for execution compared to the pre-crisis period.

REFERENCES

ABRUCIO, F. L.; GRIN, E.; SEGATTO, C. I. Brazilian Federalism in the Pandemic. In: PETERS, B. G.; GRIN, E.; ABRUCIO, F. L. (Orgs.). American Federal Systems and COVID-19. Emerald Publishing Limited, 2021, p. 63-88.



AHRENS, T.; FERRY, L. Financial resilience of English LGs in the aftermath of COVID-19. Journal of Public Budgeting, Accounting and Financial Management, v.32, n.5, p.813–823, 2020.

AHRENS, T.; FERRY, L. Accounting and accountability practices in times of crisis: a Foucauldian perspective on the UK government's response to COVID-19 for England. Accounting, Auditing and Accountability Journal, v. 34, n. 6, p. 1332–1344, 2021.

ALMEIDA, 2021

ANESSI-PESSINA, E.; SICILIA, M.; STECCOLINI, I. Budgeting and Rebudgeting in LGs: Siamese Twins? **Public Administration Review**, v. 72, n. 6, p. 875–884, 2012.

AQUINO, A. C. B. de; CARDOSO, R. L. Financial Resilience in Brazilian Municipalities. In: STECCOLINI, I.; JONES, M.; SALITERER, I. (Eds.). Governmental Financial Resilience. Emerald, 2017. p. 53–71.

BALL, I. Burning the buffer: New Zealand's budgetary response to COVID-19. Journal of **Public Budgeting, Accounting and Financial Management**, v. 33, n. 1, p. 95-105, 2021.

BASSI, C. de M. Receitas vinculadas e despesas obrigatórias: explorando conceitos, métodos de atuação e determinantes à rigidez orçamentária. Nota Técnica IPEA n°56, 2019.

BARBERA, C.; JONES, M.; KORAC, S.; SALITERER, I.; STECCOLINI, I. Governmental financial resilience under austerity in Austria, England and Italy: How do LGs cope with financial shocks? **Public Administration**, v. 95, n. 3, p. 670-697, 2017.

BARBERA, C.; JONES, M.; KORAC, S.; SALITERER, I.; STECCOLINI, I. LG strategies in the face of shocks and crises: the role of anticipatory capacities and financial vulnerability. **International Review of Administrative Sciences**, v. 87, n. 1, p. 154-170, 2021.

BOIN, A.; LODGE, M. Designing Resilient Institutions for Transboundary Crisis Management: A Time for Public Administration. **Public Administration**, v.94, n.2, p.289-298, 2016.

BOVAIRD, T.; QUIRK, B. Reducing Public Risk and Improving Public Resilience: An Agenda for Risk Enablement Strategies. **Public Money & Management**, v. 39, p. 2019-2023, University of Birmingham, 2013.

BRACCI, E.; SALITERER, I.; SICILIA, M.; STECCOLINI, I. Accounting for (public) value(s): reconsidering publicness in accounting research and practice. Accounting, Auditing and Accountability Journal, v. 34, n. 7, p. 1513-1526, 2021.

BRYSON, J.; CROSBY, B.; BLOOMBERG, L. Public Value Governance: Moving Beyond Traditional Public Administration and the New Public Management. **Public Administration Review**, v. 74, n. 4, p. 445-456, 2014.

CARDOSO, R. L.; AZEVEDO, R. R. de; PIGATTO, J. A. M.; FAJARDO, B. de A. G.; CUNHA, A. S. M. da. Lessons from Brazil's unsuccessful fiscal decentralization policy to fight COVID-19. **Public Administration and Development**, p. 1-14, 2022.

CASCIO, M.A.; LEE, E.; VAUDRIN, N.; FREEDMAN, D.A. A team-based approach to open coding: Considerations for creating intercoder consensus. **Field Methods**, v.31, n.2, p.116-130, 2019.



CEPIKU, D.; MUSSARI, R.; GIORDANO, F. LGs managing austerity: approaches, determinants and impact. **Public Administration**, v. 94, n. 1, p. 223-243, 2016.

CHARMAZ, K. Constructing grounded theory. 2. ed. Sage Publications, 2014.

DE JONG, M.; HO, A. T. Emerging fiscal health and governance concerns resulting from COVID-19 challenges. Journal of Public Budgeting, Accounting & Financial Management, v. 33, n. 1, p. 1-11, 2021.

FLICK, U. The SAGE Handbook of Qualitative Data Analysis. SAGE Publications, 2014.

GIUSTINIANO, L.; CLEGG, S. R.; CUNHA, M. P.; REGO, A. **Theories of Organizational Resilience**. Edward Elgar Publishing; Massachusetts, United States, 2018.

HALLEGATTE, S.; VOGT-SCHILB, A.; BANGALORE, M.; ROZENBERG, J. Unbreakable: Building the Resilience of the Poor in the Face of Natural Disasters. **World Bank**, 2017.

HÖGLUND, L.; MÅRTENSSON, M.; THOMSON, K. Strategic management, management control practices and public value creation: the strategic triangle in the Swedish public sector. **Accounting, Auditing and Accountability Journal**, v. 34, n. 7, p. 1608-1634, 2021.

HOOD, C. A public management for all seasons? Public Administration, n. 69, p. 3-19, 1991.

JACOBS, L. R. The contested politics of public value. **Public Administration Review**, v. 74, n. 4, p. 480–494, 2014.

JOSE, J.; MISHRA, P.; PATHAK, R. Fiscal and monetary response to the COVID-19 pandemic in India. Journal of Public Budgeting, Accounting and Financial Management, v. 33, n. 1, p. 56–68, 2021.

JOYCE, P. G.; PRABOWO, A. S. Government responses to the coronavirus in the United States: Immediate remedial actions, rising debt levels and budgetary hangovers. Journal of **Public Budgeting, Accounting & Financial Management**, v. 32, n. 5, p. 745-758, 2020.

KLIMANOV, V. et al. Fiscal resilience of Russia's regions in the face of COVID-19. Journal of Public Budgeting, Accounting and Financial Management, v. 33, n. 1, p. 87-94, 2021.

KONING, F. M. Financial Resilience: Research on financial resilience at Dutch LG in times of austerity. Master's Thesis. Program: **Public Management**. Utrecht University, 2015.

LOTTA, G. et al. Community health workers reveal COVID-19 disaster in Brazil. **The Lancet**, v. 396, n. 10248, p. 365-366, 2020.

MARTIN, R.; SUNLEY, P. On the notion of regional economic resilience: conceptualization and explanation. Journal of Economic Geography, v. 15, n. 1, p. 1-42, 2015.

NAVARRO, C. M. B. Aspectos atuais da vinculação de receitas no âmbito da União. Instituto Legislativo Brasileiro. Disponível em: https://www2.senado.leg.br/bdsf/handle/id/542620. Acesso em 10 mai 2023. 2017.

OECD. Inequalities in emerging economies - Informing the policy dialogue on inclusive growth. SDD Working Paper n°. 100, 2018.

ORELLANA, J. D. Y.; MARRERO, L.; HORTA, B. L. Mortalidade por COVID-19 no Brasil em distintos grupos etários: Diferenciais entre taxas extremas de 2021 e 2022. Cadernos de Saúde Pública, v. 38, n. 7, p. 1-8, 2022.



PADOVANI, E. et al. Municipal financial vulnerability in pandemic crises: a framework for analysis. **Journal of Public Budgeting, Accounting and Financial Management**, v. 33, n. 4, p. 387-408, 2020.

PATTON, M. Qualitative Research & Evaluation Method: Integrating Theory and Practice. 4. ed. Sage Publications, 2015.

PUPPIM de OLIVEIRA, J. A.; BERMAN, E. M. Exposing the Unfinished Business of Building Public Administration in Late Democracies: Lessons from the COVID-19 Response in Brazil. **Public Administration Review**, v. 81, n. 6, p. 1183-1191, 2021.

RAUDLA, R.; DOUGLAS, J. W. Austerity and budget execution: Control versus flexibility execution. Journal of Public Budgeting, Accounting & Financial Management, v. 34, n. 2, p. 292-309, 2022.

SALDAÑA, J. The Coding Manual for Qualitative Researchers. 3ed. Sage Publications, 2016.

SANTOS, V.; LEITMANN, J. Investing in urban resilience: protecting and promoting development in a changing World. Washington, D.C.: World Bank Group, 2016.

SHAW, K. "Reframing" Resilience: Challenges for Planning Theory and Practice. **Planning Theory & Practice**, v. 13, p. 308-312, 2012.

SCORSONE, E. A.; PLERHOPLES, C. Fiscal stress and cutback management amongst state and LGs: What have we learned and what remains to be learned? **State and Local Government Review**, v. 42, n. 2, p. 176-187, 2010.

STECCOLINI, I.; MARTIN, J; SALITERER, I. Conclusion. In: **Governmental Financial Resilience** (Public Policy and Governance, Vol. 27). Emerald Publishing Limited, Bingley, p. 229-240, 2017.

STECCOLINI, I. Accounting and the post-new public management: re-considering publicness in accounting research. Accounting, Auditing and Accountability Journal, v. 32, n. 1, p. 255-279, 2019.

UPADHAYA, B. et al. COVID-19 policy responses: reflections on governmental financial resilience in South Asia. Journal of Public Budgeting, Accounting & Financial Management, v. 32, n. 5, p. 825-836, 2020.

VAN DER VEGT, G. S; ESSENS, P.; WAHLSTRÖM, M.; GEORGE, G. Managing Risk and Resilience. **Academy of Management Journal**, v. 58, n. 4, p. 971-980, 2015.

VIZE, R. Bankrupt: a council in crisis and the impact on health and social care. **British Medical Journal**, v. 364, p. 1172, 2019.

WILLIG, C. Interpretation and analysis. In: FLICK, U. (Eds). The SAGE Handbook of Qualitative Data Analysis. SAGE Publications, 2014.

WORLD BANK. A fair adjustment: Efficiency and equity of public spending in Brazil. 2017. 154 p.