Affording and Constraining Digital Transformation:
The Enactment of Structural Change in Three Swedish Government Agencies

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Abstract. Public sector organizations need to adapt to the ongoing societal changes and new technologies emerging, and as public sector organizations engage in digital transformation, they are confronted with the need to re-arrange and change themselves to be successful. Previous research has identified factors for digital transformation in both public and private sector settings, yet there is still an absence of research into how public sector organizations deal with this transformation. In this study, we explore how government agencies enact structural changes related to digital transformation. We do so through a multi-case study of three government agencies in Sweden, interviewing key actors to explore the organizations' enactments. Our findings show that public sector organizations display a high level of variance in how they enact structural changes to succeed with digital transformation. This is discussed in relation to previous research on management commitment to digital transformation, as well as dialogue and tensions when changing, with the intent to contribute to research and practice in relation to digital transformation.

Keywords: Digital Transformation · Public sector · Structural changes

1 Introduction

The diffusion of new digital technologies puts pressure on organizations to capitalize on these opportunities. Understood as organizational changes brought on by the adoption and utilization of digital technologies [1], digital transformation affects how organizations plan, prioritize, and operate. It challenges how organizations structure the workplace, allocate resources, and build a culture of innovation [2]. Since digital transformation is going on everywhere and affects everything and everyone, it is important that officials in the public sector understand this phenomenon. Magnusson et al. show that digital transformation in incumbent organizations is hindered by their established routines, inertia, and dependencies [3]. There is a need for internal organizational enablers, such as skills development, cultural changes, and different leadership models, to manage this re-organization [4].

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We can, at the same time, see that studies of digital transformation and the organizational changes required in the public sector are in fact uncommon, and multi-case studies are even rarer, although they exist [5, 6]. Most empirical studies on digital transformation in the public sector to date have been conducted in single organizations [7], and on specific projects or initiatives [8]. To better understand digital transformation in the public sector, studies having a more holistic view of organizational changes due to digital transformation are needed [9].

A common assumption in research is that the public sector is uniform and can be standardized. For instance, in a recent study [10], the authors generalize their results to the public sector from a single case study, where they "stud[y] the barriers for digital transformation in a 'typical' public organization" [p. 277]. This is also acknowledged by Mergel et al. who call for more research on digital transformation within the public sector, its different types, and subsectors [11].

This paper aims to contribute to a more nuanced understanding of digital transformation in the public sector by focusing on a single Swedish subsector: national level governmental agencies. Our research question is: *How are structural changes associated with digital transformation enacted among Swedish national level government agencies?*

This question is answered through a multi-case study of three different Swedish government agencies and how they address digital transformation. The three organizations have different settings and configurations, varying from 40 to 1 700 employees, and have different assignments: one in government administration, one in environmental administration, and one in public higher education. Our study contributes by offering empirical insights into organizations within a subsector of the Swedish public sector.

Using Vial's framework for digital transformation [12] as a starting point, we analyze the three organizations' enactments of structural change across four concepts, by developing and using an abductively created conceptual framework.

The remainder of the paper is structured accordingly: This first introduction is followed by a description of the literature on digital transformation in the public sector and on affording and constraining factors in relation to digital transformation. In the third section, we describe our chosen method, our empirical cases, and our conceptual framework used when analyzing and its creation process. The fourth section describes our results, while the fifth section discusses the results in the context of digital transformation. To round off, we discuss the paper's limitations, suggest directions for future research, and make recommendations to practitioners and policymakers.

2 Precursory Findings and Theoretical Framing

2.1 Digital Transformation in Public Sector Organizations

While public sector organizations are under general pressure to be more efficient and increase quality, they are also under specific pressure to become more digital to provide more online services [13] as well as to adapt policies, legislation, and internal structures [14]. Public sector organizations are however governed by complex institutional elements [15], which, combined with a lack of analytical clarity [16], makes the transformation brought on by e-government "still relatively poorly understood" [17]. As Mergel

et al. identify [11], the terms *e-government* [16], *digital government* [13], and *transformational government* [18] are often used in similar ways, with similar meanings, ending up in conceptual unclarity.

As noted by Vial [12] as well as Mergel et al. [11], the construct of digital transformation is pluralistic and fragmented. The key aspect in the definition offered by Vial, is that the value creation paths of the organization are altered [12]. The definition put forth by Mergel et al. entails a more "holistic effort", which includes revising core processes [11]. In this study, we focus on the definition of digital transformation offered by Hanelt et al. as *organizational change brought on through the utilization of digital technologies* [1].

Regardless of the exact definition, however, we can see that studies of digital transformation in the public sector are rare, and that there is still much to be learned on how public sector organizations manage digital transformation. Recent studies have shown that digital transformation involves, among other things, creating a new organizational identity, which is a complex and paradoxical endeavor [19] that sometimes includes complicated intra-group power dynamics and introspection [20]. How government officials view themselves and their own organization's ability for digital transformation is therefore of interest. Several years ago, Meijer & Bekkers pointed out that individuals were rarely the object of e-government research [16]. Since then, several studies [21, 22] have heeded their call and shown that officials differ on the reasons, objects, processes, and results of digital transformation [11].

2.2 Factors Affording and Constraining Digital Transformation

In our stated definition of digital transformation, organizational change is emphasized. This change is facilitated by affording factors and hampered by constraining factors, carried out within the organization. There has been some research done on barriers to digital transformation in the public sector. Wilson & Mergel drew upon their analysis of the U.S. public sector and created concepts of barriers in two dimensions: s*tructural barriers* containing governance, capabilities, and resources; and *cultural barriers* containing a lack of awareness and internal culture [21].

Tangi et al. analyzed the Italian public sector and identified *organizational barriers* (including lack of political will, top management support, and coordination between divisions) and *cultural barriers* (including bureaucratic culture and employee resistance due to fear of losing jobs or control) [22]. In Sweden, Magnusson et al. identified ill-fitting IT governance models as a constraint to digital transformation in the public sector [23].

Some success factors for digital transformation have been stated by Osmundsen et al., such as a supportive organizational culture, well-managed transformative actions, and engaged managers and employees [24]. Escobar et al. instead explored eight concepts of success factors containing *people* (including team awareness and digital skills) as well as *organization* (including multilevel governance and management structures, changes in organizational structures, and changes in organizational culture) [25].

Based on a literature review, Vial proposes a broad conceptual framework designed to understand the phenomenon of digital transformation in its entirety, including the influence of affording and constraining factors [12]. Vial's framework describes digital transformation as a process initiated by ongoing technological development, which causes organizations to react to these changes and adjust their value-creation paths to stay competitive. These reactions and adjustments can be constrained by organizational barriers and afforded by structural changes, generating positive or negative impacts.

Vial's affording factors are grouped under the headline "structural changes" that affect the organization's development and are said to be needed for digital transformation. These changes include *organizational structure*, for instance, cross-functional collaboration, *organizational culture* regarding organizational agility and experimentation [op. cit., p. 127], *leadership* towards fostering a digital mindset, and having *employees* take new *roles* and develop new *skills* [op. cit., p. 129].

3 Method

In this study, we expand on Vial's conceptual framework and use it as a lens to analyze our organizations on whether they lean more towards affording factors, or more towards constraining factors, across the four concepts of structural change. Although Vial's framework is based on studies of the private sector, the framework can be equally useful for studying the public sector [26], as value creation likewise occurs in the public sector [27].

The research design in this paper is a qualitative [28], exploratory [29] multi-case study [30] which allows us to explore the emerging and under-researched phenomenon of digital transformation in the public sector. To answer our research question, we chose three Swedish national level government agencies to study, according to a most different systems design [31] with adequacy sampling [32], see Table 1. The organizations were chosen because of their differences and because of the research team's proximity to them as three of us are Executive Ph.D. students, employed in the organizations.

To gain insight into how the studied organizations enact digital transformation, we chose to conduct expert interviews [33] to understand how the individuals themselves describe the enactment. The research team did a total of 56 semi-structured interviews, between 16 and 23 per organization, of about 60 min each, over a period of three months, between December 2022 and February 2023. Both managers and employees involved in organizational development and digital transformation were interviewed, around themes such as digitalization, business improvement, and the relationship between core operations and the IT department. The interviews were recorded and transcribed.

After 56 interviews, we made a "situated, interpretative judgment" [34] that we did not need further interviews. We sensitized ourselves to our data by reading and watching all the interviews and deep coding 15 of them, five per organization, while iteratively developing our conceptual framework. The selection of interviews to code was made through purposive sampling [35] making sure to get both managers and employees, from both IT and core operations, and selecting at random when we had several interviewees in a category; see Table 2. After coding those 15 interviews, we again decided that we had enough empirical data to understand the organizations and to analyze them through our framework, and that coding more interviews would not yield any different results.

Table 1. Case descriptions

	Case A	Case B	Case C
No. of employees	~40	~1 700	~300
Annual turnover	EUR 3,2 million	EUR 140,1 million	EUR 69,4 million
Established in	Independent authority since 2002, in current configuration since 2016	First formed in 1977, in current configuration since 1999	Formed through the merger of several other (parts of) agencies in 2011
Subject matter	Government administration	University	Environmental administration
Sourcing of IT	In a long-term government mandated collaboration with a much larger host authority, supplying IT and administrative services	In-house IT but decentralized sourcing, where each department are hosting and managing various IT systems on their own	Heavily dependent on external consultants in IT, due to external financing generally not allowed to be used towards salaries

Table 2. Coded interviews sample overview

	Case A	Case B	Case C
Managers	CEO + 2 top-level managers	CIO + 2 top-level managers	CDO + 2 s-level managers
Employees	2 from core	1 from core + 1 from IT	2 from IT

The data from the interviews were primarily triangulated by the fact that three of the research team members were employed by the investigated organizations and therefore embedded in the context as a type of prolonged engagement in the field [36]. The research team thus had useful knowledge about whom to interview and had the organizational knowledge to interpret their statements with contextual nuance. The potential bias in interpretations and selection of respondents was managed by not interviewing within one's own organization, collaborating intensively during coding and analysis [37], and using the snowball method to add to our selection of respondents [38].

As the method of analysis, we followed the five phases of Braun & Clarkes reflexive thematic analysis [39] where analysis starts immediately. Our coding scheme and conceptual framework (see Table 3) developed abductively over time, while we still were interviewing and coding interviews.

We familiarized ourselves with the data (phase 1) by conducting, reading, or watching all 56 interviews. In phase 2, we constructed a deductive code sheet for affording digital transformation, originating from Vial's four structural changes. The idea was originally to code for affording factors for digital transformation, but as we searched for themes (phase 3), we discovered constraining factors as well. So, we expanded the conceptual framework and create new themes to include constraining factors as well.

We contrasted affording and constraining factors side by side as we reviewed our themes (phase 4) meaning that we had identified, defined, and named (phase 5) both affording and constraining factors over each of the type of structural change.

Table 3. Conceptual framework

Vial's concepts	Some examples of quotes	First-order codes	Second-order themes
Organizational structure	"No, we are special, and we want to do this" "IT helps, but we have to, on our own, come up with the ideas of what we want to digitalize" "I would like to say that our relationship is a very strong and intimate collaborative relationship"	*Affording*: Cross-functional networks, Unified planning and prioritizing, Non-hierarchical organization, Few silos, Holistic view of the organization	*Affording*: Cross-functional collaboration [40, 41]
		Constraining: Lack of cooperation or collaboration, Lack of knowledge of other organizations planning/ structure/ strategy, Language that shows uniqueness, IT decides which systems to use in business, Getting "help" from IT function	*Constraining*: Silo-thinking [21, 22]
Organizational culture	"We need to have proper investigations in a number of areas" "My view is that we are very cautious and like to do things that someone else has done before us" "I like continuous business development and not big projects because then you can constantly change a little bit"	*Affording*: Agility/flexibility, Courage, Goals or results of projects are unclear or not defined, Common language/definitions, Multi-media mindset, POC/pilots	*Affording*: Willingness to experiment and take risk [42]
		Constraining: Separation between IT and business functions, Waterfall methods, Focus on solutions instead of customer need, Fear, Preparatory studies instead of action	*Constraining*: Culture of planning and fear [21]

(*continued*)

Table 3. (*continued*)

Vial's concepts	Some examples of quotes	First-order codes	Second-order themes
Leadership	"When we recruit managers outside the organization, it is explicitly stated that you must have experience in, for example, business development, digitization" "To work with digital business development in a structured way, we are not … very good, strategically anyway"	*Affording*: (New) leadership roles, Leader/ roles tasked with closing the gap between business and IT, Aligning technology with strategy and ways of working, Models, methods, and actions supporting integration between IT and business	*Affording*: Leaders act to develop a digital mindset/ digital strategy [43, 44]
		Constraining: No leadership roles tasked with digitalization, Top management lacks digital strategy, Top management silent on digitalization	*Constraining*: Governance and management not targeting digital transformation [5, 45]
Employee roles and skills	"We have a manager level and an employee level that varies a lot in the ability to make use of the possibilities of digitization or to even be able to drive digitization forward" "There is a lack of internal competence in how to work with digitization" "We have also worked hard and put an incredible sum of resources into IT development"	*Affording:* Business leads IT projects, Competence development of employees, Employees want to be involved in digitalization (projects), Digital skills requested from all new personnel when hired, not only IT	*Affording*: Employees take/get new roles, tasks, or titles [41]
		Constraining: Lack of people with relevant/ right competence or skills, Employees lack interest, knowledge, or skills in digitalization, Forced to hire consultants	*Constraining*: Lack of personnel working with digital transformation [46]

4 Results

The results are presented following the four structural concepts as per our conceptual framework. Each sub-section expands on the differences and commonalities between the three cases in relation to their enactment of digital transformation. The second-order themes from Table 3 are written **in bold**. The last sub-section summarizes our findings from each organization.

The quotes have been translated into English by the authors and are being referenced as "Manager 1", "Employee 2", etc., in a sequential order to preserve their anonymity.

4.1 Organizational Structure

Case A have started to change their organizational structure to enable themselves to make the best use of digital technology. This is done by embracing **cross-functional collaboration** in both formal and informal ways: *"So, we continue to work on getting this together with us and them. So that it won't be us and them, but that it will be us, together"* (Manager 1, Case A).

In Case B there is a lack of unified commitment to digitalization, and they used to collaborate more in the past, leaving them with a current state of **silo thinking**: "*Man … well, no, I'm not … well, as you can hear, I miss these meetings where we actually had the opportunity to meet and discuss issues that concern everyone, and work together above all, that's really important*" (Employee 1, Case B).

Case C is undergoing a major top-down re-organization affecting roles, titles, responsibilities, assignments, and governance models. The CDO has a clear vision of unified planning and execution, and has disbanded the previous Digitalization Council, leaving the rest of the organization without insight into what is happening and why. Employees are frustrated about how these new ways of working are supposed to be executed: *"We have business developers, but how they work… it's very ad hoc. The role is not super defined, it depends on the department and the head of the department, so they are doing different things"* (Employee 1, Case C).

Both Cases B and C refer to **cross-functional collaboration** as an ideal. In Case B it is described as an ideal state, i.e., how it "ought to be" (without any reference to any codified rules or operating practices). In Case C it is described in terms of how it "will be" (once the new models and ways of working are put in place). Case A displays a unified starting point, having a single vision that everybody seems to rally around, leading to **cross-functional collaboration** being a reality.

4.2 Organizational Culture

Managers in Case A want the organization to expand, be more assertive, and be more future-oriented than its current financing and institutional arrangements allow. One of them says: *"I am quite critical towards the lack of understanding [from the government] that development work needs to be ongoing continuously in order to get the changes that are needed"* (Manager 2, Case A).

The management of Case C has grand plans for the organization, as mentioned in Sect. 4.1. Individual projects can be given free rein to be more agile and iterative, so there is a **willingness to experiment**, but this has not yet become the norm: "*But [being a project manager] has been like walking in a minefield in an organization that constantly refers to control models for project management that do not … there is no possibility that the project can use them. The project is losing forward momentum, we will not meet the target because we are moving towards a moving target where the development both in the users' maturity to use digital tools, and the functionality and performance of the tools themselves, is going extremely fast"* (Employee, Case C).

Cases A and C display similar patterns and express a desire to be more agile and make use of iterative ways of working. The **culture of planning** in Case B is, however, unparalleled in Cases A and C. It is so strong in Case B that one manager explained how they planned to plan: "*But then it will be more like we have to plan to raise the need for it. If we plan, for example, in the fall of 2022 that in 2023 we will raise the need with the administrative director, then we might talk about a process that will come in 2024 at the earliest or 2025, so there are very long lead times"* (Manager 1, Case B).

In Case B suggestions of organizational need can be submitted by anyone to a prioritization group, but without a designated project manager already designated in the submission, the suggestion is usually rejected. Like cross-functional collaboration, their idea of a **willingness to experiment** is mostly an ideal pushed by managers of how things ought to be, their stance on the matter, is not so much backed up by actual examples.

4.3 Leadership

Leaders in Cases A and C highlight the importance of adopting a team-based and agile approach. Case A does so more formally by creating teams within core operations and implementing a new software development scheme. In Case C **leaders act to develop a digital strategy** by appointing a CDO, an Enterprise Architect, and setting up an entire digital transformation department. They have the ambition to work in a more professional team-based agile manner, but the organization is currently characterized by a lot of individual work. *"…if we want to be an attractive workplace, if we are to retain people, and if people want to start working with us, we need to work in a way that people understand and recognize"* (Manager 1, Case C).

Those interviewed in Case B highlight the need to act quickly and bring new and scalable solutions into the organization, but struggle to gain understanding and attention from the core business, due to an absence of a clear digital transformation strategy: *"I think there is a need for somebody who knows about management, control, keep track, and takes inventory: 'What do we have? What are we doing?' [Digital transformation and IT] is a bit too scattered"* (Employee 1, Case B).

Interviewees from Cases A and C emphasize being a traditional government bureaucracy with a primary obligation to deliver on their democratic assignments, allowing for development and innovation only when time and resources permit. The picture of **unclear governance and management without a focus on digital transformation** emerges in all three cases but more so in Cases B and C. Governance are fragmented in Case B with two different lines of decision-making which are not unified in a joint vision. Or as one employee says: *"I would like to say that no one dares to decide. Within the administration, that is. I think it should be, developed within the departments or within the academy, how can we make it as good as possible for students and teachers, and what kind of support can the administration provide for that?"* (Employee 1, Case B).

All three organizations suffer from a lack of clarity regarding responsibilities and decisions-rights regarding digital transformation.

4.4 Employee Roles and Skills

In both Cases A and C, employees have been given **new roles to drive digital transformation**. In Case A, a new software development scheme is being put in place. This has brought on some tensions and unclarity towards those in other roles: *"We need to find a way of working where we have both people who take these [new] roles, but also those who do not have [software development] roles, how should they work with the [IT] organization?"* (Manager 3, Case A).

In Case B, the IT department perceives itself as a catalyst for digital transformation, as stated by the CIO, and the **business is expected to take the role of project leader**, despite the lack of both skills and sufficient resources: *"When I started, I got push-back from the business units: 'No, I won't send anyone to your reference group'… Well then, how I am supposed to know what is needed without input from users?"* (Employee 1, Case B).

There is also a lack of project managers in Case B, so projects are sometimes halted and delayed: *"That is a question in the prioritization: Do you have a project manager? - No? Then you must wait until someone is available"* (Manager 2, Case B). This is counter-acted by leaders trying to encourage employees and pushing them to step up to take on project leadership. However, as the **lack of personnel working with digital transformation** is a systemic problem, our understanding is that the problem will not be solved merely through encouraging individuals.

In all three cases, there is a lack of skills to run IT projects. Case A has historically relied heavily on external consultants in both management and development and is now more actively working to increase its internal skills, although through a different organization that brings in IT competence as a host authority. Case B makes less use of external consultants and **lacks internal resources**.

In Case C they continue to rely on external consultants despite investment in **new roles** and the creation of a new digital transformation department and the gap between the internal employee and the external consultants is wide. This quote describes the gap in skills between the external project manager and internal project members: *"But they are very novice and ignorant in the field, on a level that I am surprised by, I must say. It feels more like you have to educate, and go back to ABC, to make them understand what we are really doing here. Very… if the level of knowledge had been higher, it would have been a completely different journey"* (Employee 2, Case C).

4.5 Summary of Results

Figure 1 contains a summary of the results of the three case studies, presented across our four concepts.

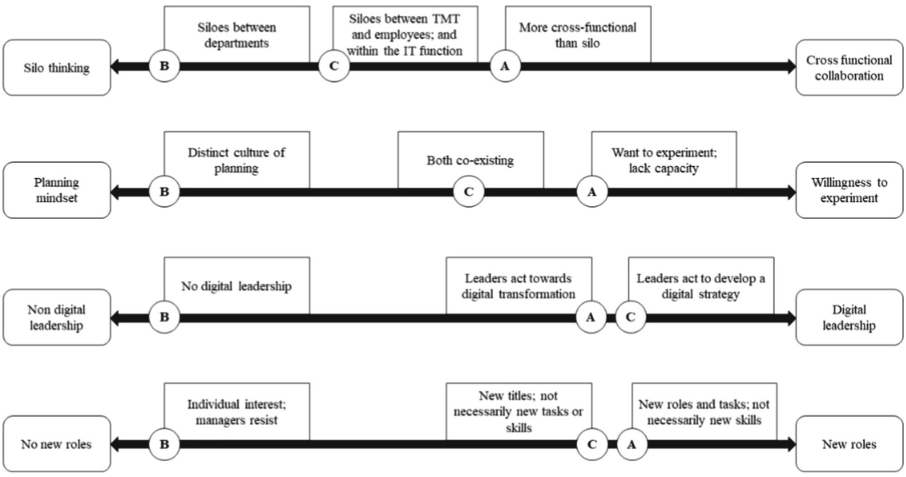

Fig. 1. Summary of results

5 Discussion

In this section, we first discuss our results across the three organizations, where we see that alignment of views and dialogue of digital transformation both within the top management team, and between the top management and the employees is a key factor influencing other factors. This is then discussed in relation to prior studies on the importance of leadership and management's commitment to digital transformation. Finally, we discuss similarities in the organizational changes in the three organizations in terms of duality, tension, and paradoxes.

The three organizations show different ways of enacting digital transformation and even though there are some similarities, they are overall more different than alike. We see that the organizations differ in degrees of alignment and consensus, both between and within the top management team and employees on how the organization faces digital transformation. Meaning making through dialogue is essential for organizational change or "rather, issues are made meaningful (or not) through communicative practices" [47, p. 34]. In Case A, there is alignment in the dialogue between top management and employees regarding the organization's need for digital transformation. They mention the same digital initiatives for the organization and discuss the same re-organization efforts in the same way. Whereas in Case B, there is a lack of conversation across the organization and between management and employees about digital transformation. All levels mention a need for digital transformation, but there is no consensus on how it is supposed to be done and who is supposed to champion it. In Case C, digital transformation is prioritized by some in senior management, but despite a re-organization, the organization does not seem to get clarity on what digital transformation actually means for them. There is no alignment between management and employees, as the employees call for clearer roles, processes, working methods, and priorities across the board.

Research has highlighted that leadership is essential for digital transformation [43], and that a lack of management commitment [48], support [49], and ownership [50] drives

inadequate resource allocation and weak decision-making, which drives other barriers. The consequences of a lack of commitment are evident in Case B, where questions about how to adapt to digital transformation are not on the agenda at all, creating frustration among both employees and managers. In Case C, on the other hand, we do find a commitment to digital transformation, but only in a selection of top management and consultants.

The structural changes to enhance digital transformation include more than just altering the organization. Employees' mindsets and participation in the change process, and management explaining why changes are being made [51], are important to employees' commitment and positive attitudes [49]. Here, top management in Case C has not been active in any strategic change management focused on people's contribution to the new ways of working. Like in Case B, this leads to frustration among both managers and employees, creating tension and increased distancing. This means that even if managers in Case C are aware of the need for digital transformation and have started to change the organizational structure, such as a new prioritization board, new governance models, and new roles and titles, the people within the organization are not changing, and the (absent) effects are the same as in an organization where no decisions have been made at all, such as Case B.

In Case A there is also a commitment to digital transformation, but from both managers and employees, although to a low degree, as the organization does not seem to know how to move from "want" to "do". But even if the transformation is slow or small, there is no frustration or lack of commitment to the common vision of Case A's need to digitally transform.

Albeit the direct enactment of organizational changes differs in the three organizations there are some similarities. Research suggests that thinking of structural changes as dualities, rather than either/or-situations that need to be resolved can be beneficial to relieve tensions and to overcome organizational barriers [52]. In all three cases, they mention how they perform a balancing act between old and new ways of working, thinking, and acting. They refer to walking in minefields when choosing how to realize digitalization and that formalized structures, routines, and models counteract development. These dialectics and organizational contradictions were present within all three organizations, creating tensions, but with different contents and expressions [53, 54].

The three agencies also describe tensions from all different levels of the organization, from the top management level to the employee level, and in various manners, such as expressing it in words, through facial expressions, and by showing emotions [55]. They all mention how they want something *more* or something *else*, but not *how to change* or *how to become* more of what they want to be. We, therefore, hypothesize that there are competing demands and existing contextual paradoxes in these three agencies that work interdependently and at multiple levels affecting how they conduct and succeed in their organizational changes [55, 56].

5.1 Contributions, Limitations, and Future Research

Our study has two main contributions to research. First, we have contributed to more multi-case studies of the public sector by offering empirical insight into three different

government agencies. Second, we have demonstrated that not all public sector organizations are the same, not even within the same subsector, as they differ greatly in attitude, enactment, and commitment toward digital transformation. Becoming aware of the public sector's similarities and differences in relation to digital transformation might open up new discussions, arguments, and formats for researchers in a variety of fields.

We offer three central implications for practice. First, we underline the contention from Aditya et al. [48] that lack of commitment has the most impact when enacting digital transformation. It may seem obvious, but as our study shows, it is still lacking. Second, we can see that commitment is not enough. There needs to be a dialogue on changes and action behind what top management says, and then change leadership behind the action, to get digital transformation going. Third, organizations may be advised to, instead of focusing on if the organization is following old or new ways of working, accept that these concepts exist simultaneously, which in turn might help them to overcome barriers to organizational changes.

We see some limitations to the presented study. First, we have not actually studied digital transformation as such; we do not know if any value creation paths have been altered. Second, as change is a key aspect of digital transformation, there is a limitation in that we only studied these organizations at one point in time and have not followed them over time [57]. Third, we have not tried to explain why the organizations' enactments are the way they are, which could be a theme for forthcoming research.

More empirical studies into the public sector and its subsectors are needed, both in this subsector and in others. We suggest a longitudinal study, following public sector organizations over time, tracking their change, as Svahn et al. did for a car manufacturer [54]. Second, we suggest evaluating whether public sector organizations really undergo digital transformation and how. Third, studying the public sector through a paradox lens to see how competing demands affect organizations' digital transformation [58].

6 Conclusion

This study offers empirical insight into how structural changes are differently enacted in three Swedish government agencies in relation to their digital transformation. There really is no single "public sector organization" ideal type that easily can be referenced to. While there exists a lot of research on how digital transformation affects and is enacted in the private sector, less is said about the public sector; especially studies comparing different subsectors and organizations within the public sector are lacking. Our study shows how these three organizations in different ways struggle with understanding how to change and their enactment of digital transformation and that there are some factors, for instance, communication and commitment of leadership, that trigger tensions and create barriers.

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