

The Impact of “Street-Level Bureaucrats” on Administrative Burdens and Mechanisms in the Context of Digital Government Development

Yi Geng

China University of Petroleum-Beijing at Karamay, Karamay, China

Keywords: Digital government; administrative burdens; “street bureaucrats”

Abstract: The construction of digital government in China has been advancing steadily and is regarded as a solution to reduce administrative burdens. However, “street-level bureaucrats” still face the dilemma of increased administrative burdens in specific contexts. This paper reviews the relevant literature on digital government, administrative burdens, and “street-level bureaucrats,” and finds that the impact and mechanisms of “street-level bureaucrats” on administrative burdens in the context of digital government construction have not been sufficiently studied. Therefore, based on the theories of “street-level bureaucrats” and principal-agent, this paper proposes a framework for the impact mechanisms of “street-level bureaucrats” on administrative burdens during the construction of digital government. Finally, this paper suggests that administrative burdens will rise when “street-level bureaucrats” deal with conflicting matters, and will decrease when they handle non-conflicting matters.

1. Introduction

At present, emerging electronic information technologies are rapidly advancing, and the wave of digitization is profoundly reshaping various aspects of human society. The construction of digital government has become an important way for most countries to enhance governance capabilities, and promoting digital government construction is also a key objective of China's government system reform. By integrating Information and Communication Technology (ICT) into the core functions of government, digital government construction makes administrative work more efficient and transparent. On July 18, 2024, *the Resolution of the Central Committee of the Communist Party of China on Further Deepening Reform Comprehensively to Advance Chinese Modernization*, adopted at the Third Plenary Session of the 20th Central Committee, proposed to “improve the nationwide integrated online government service platform.” This requirement will serve as an important guideline for enhancing the level of digital government construction^[1].

Administrative burden refers to the various costs borne by both citizens and government departments during their interactions, including citizens' learning costs, compliance costs, psychological costs, and the government's administrative costs^[2]. The construction of digital government based on emerging information technologies is seen as one of the key ways to reduce or even eliminate administrative burdens. However, digital government does not mean a government

without human involvement. In the era of digital government, grassroots civil servants still need to interact directly with citizens. As “street-level bureaucrats” (all tenured civil servants who have direct contact with citizens), their direct interactions with citizens are considered a major cause of administrative burdens. At the same time, “street-level bureaucrats” are also facing a transformative context during the process of digital government construction.

Although digital government construction and administrative burdens are emerging hot topics in public administration and political science research, studies focusing on administrative burdens and “street-level bureaucrats” from the perspective of digital government construction remain relatively scarce. Based on this, this paper aims to examine how “street-level bureaucrats” use digital technologies in administrative processes within the broader context of digital government construction, and how the application of these technologies affects administrative burdens, thereby influencing governance effectiveness.

2. Literature Review

2.1 Digital Government Construction and Administrative Burden

The digital government in this study refers to a strategic effort by the government to utilize data and other emerging information and communication technologies to create, optimize, and reform government structures and services. The primary requirements for digital government construction include the following five aspects: first, information disclosure; second, transparency in law enforcement; third, interactive communication; fourth, citizen feedback; and finally, data sharing.

The administrative burden in this study refers to the “friction” generated during government-citizen interactions, which can be categorized into four specific types of burdens. The first is learning costs, which refer to the information costs incurred by citizens to access relevant public services and policy information during their interactions with the government. The second is compliance costs, which refer to the costs borne by citizens to conform to the operational procedures of government departments. The third is psychological costs, which refer to the sense of “being controlled” due to the loss of personal autonomy, as well as the emotional stress and frustration caused by administrative procedures during citizen-government interactions. The fourth is administrative costs, which are borne not by citizens but by grassroots civil servants.

Regarding the issue of how digital government construction affects administrative burdens, educational circles primarily hold two views: digital government construction may either reduce or increase administrative burdens. Some scholars argue that digital government construction can alleviate administrative burdens. For instance, Herd et al. (2013) suggest that the establishment of government databases and the application of automated application systems during digital government construction shift the administrative burden originally borne solely by citizens to grassroots civil servants, thereby reducing the overall administrative burden^[3]. Ma Liang (2019), through a study of the administrative efficiency revolution in Xi'an, argues that embedding internet thinking and using information technology in administrative processes can reduce administrative burdens^[4]. On the other hand, some scholars contend that digital government construction may not reduce administrative burdens but could instead exacerbate them. Bozeman et al. (2020) argue that the use of OA systems leads to efficiency losses by shifting administrative burdens to grassroots bureaucrats and citizens^[5]. Madsen et al. (2022), focusing on digital self-service application tools for citizen welfare programs, suggest that these tools impose additional learning costs on citizens, thereby increasing administrative burdens.

2.2 “Street-Level Bureaucrats”

In research on the subject of “street-level bureaucrats,” Lipsky defines them as “public employees who interact directly with citizens in their work or possess substantial discretion in the execution of their duties.” Due to China's unique national conditions and party-government system, the definition of “street-level bureaucrats” cannot be directly borrowed from Western contexts. Therefore, this study, incorporating Chinese characteristics, defines China's “street-level bureaucrats” as all tenured civil servants who have direct contact with citizens. As “street-level bureaucrats” are at the forefront of policy implementation and direct citizen interactions, discretionary power becomes their most core and critical authority. The exercise of this discretionary power is also a significant factor influencing the degree to which “street-level bureaucrats” fulfill policy objectives.

2.3 Literature Review

Existing literature has extensively explored concepts such as digital government, administrative burden, and “street-level bureaucrats,” as well as the impact of digital government on administrative burdens. However, within the context of digital government construction, the question of how “street-level bureaucrats,” as civil servants who interact directly with citizens, influence administrative burdens when dealing with public affairs of different natures has not been sufficiently studied. Building on this gap, this paper, by considering the inherent complexity of public affairs, investigates how “street-level bureaucrats” influence administrative burdens and the mechanisms behind this influence in the context of digital government.

3. Theoretical analysis and Framework

In the context of digital government construction, changes in the discretionary power of “street-level bureaucrats” have generated a complex dual effect on administrative burdens. Firstly, digital government construction, through technological means such as information disclosure, data sharing, and increased transparency in law enforcement, has weakened the discretionary power of “street-level bureaucrats.” This limitation has led to an increased administrative burden in the handling of conflictual affairs¹. With reduced discretionary power, “street-level bureaucrats” are unable to flexibly adjust policy implementation strategies in complex situations and must rely on standardized, depersonalized, and transparent procedures to handle such matters. On the other hand, the reduction of discretionary power has significantly decreased administrative burdens in the context of non-conflictual affairs². The technological support provided by digital government reduces the space for personal intervention by “street-level bureaucrats” in repetitive tasks, thereby avoiding unnecessary obstacles or buck-passing that may arise from the misuse of discretionary power. This creates a burden-reducing effect in non-conflictual scenarios.

The principal-agent theory primarily focuses on the relationship between the principal (the government) and the agent (the “street-level bureaucrats”), emphasizing the analysis of behavioral deviations in agents caused by information asymmetry and conflicts of interest. Digital government construction enhances the government's ability to constrain the behavior of “street-level bureaucrats” through measures such as data sharing and increased transparency in law enforcement. In traditional

¹ Conflictual affairs refer to policy tasks carried out by “street-level bureaucrats” that may provoke public dissatisfaction and trigger conflicts between the government and citizens, such as the regulation of street vendors or housing demolitions.

² Non-conflictual affairs refer to policy tasks carried out by “street-level bureaucrats” that are less likely to provoke public dissatisfaction or conflicts between the government and citizens, such as personal income tax filing or handling traffic violation fines.

systems, “street-level bureaucrats,” as agents of the government, may act in ways that maximize their own interests, such as evading responsibilities, being perfunctory, or creating obstacles in handling affairs. Such behaviors not only increase the administrative burden on citizens but also reduce the efficiency of policy implementation.

However, in the process of digital government construction, technological methods weaken the discretionary power of “street-level bureaucrats,” making their behavior in policy implementation more transparent and reducing information asymmetry and agency costs. In the context of non-conflictual affairs, online services and intelligent systems directly assume some of the responsibilities of “street-level bureaucrats,” thereby avoiding inefficiencies caused by bureaucratic behavior. This results in a reduction of administrative burdens, demonstrating a burden-reducing effect.

4. Impact of “Street-Level Bureaucrats” on Administrative Burdens and Mechanisms in the Process of Building a Digital Government

In the process of digital government construction, the impact of “street-level bureaucrats” on administrative burdens primarily manifests in two aspects: burden-increasing effects and burden-reducing effects.

4.1 Burden-Increasing Effects

During the era of traditional bureaucracy, “street-level bureaucrats” often flexibly executed policies when handling tasks that were prone to provoke public dissatisfaction and conflict, adapting to the needs of citizens. However, in the current digital era, digital government is characterized by its digitized, formalized, depersonalized, transparent, and traceable nature. This has significantly constrained the discretionary power of “street-level bureaucrats,” making it difficult for them to continue executing policies flexibly, ultimately leading to an increase in administrative burdens. Specifically, this exacerbates administrative burdens in the following three aspects:

Learning Costs: While digital government aims to reduce information asymmetry through transparency and technological means, this process can, in certain situations, increase the learning costs for citizens. In the past, when dealing with conflictual affairs, “street-level bureaucrats” took the lead, utilizing their discretionary power to adapt policies flexibly. During this process, they would proactively inform citizens about policies and any changes, eliminating the need for citizens to actively seek out information. However, in the era of digital government construction, the discretionary power of “street-level bureaucrats” has been greatly restricted, making it difficult for them to continue executing policies flexibly. Citizens have shifted from being passive recipients of information to active seekers. Moreover, citizens now need to understand the structure of government organizations and the specific terminology used by officials, undoubtedly increasing their learning costs.

Psychological Costs: While transparency and proceduralization reduce deviations in agent behavior, an overemphasis on the rigidity of technological designs may weaken trust relationships in policy implementation. As the direct point of contact for policy execution, “street-level bureaucrats” could alleviate public dissatisfaction through informal communication and flexible handling when dealing with conflictual affairs. For example, in the enforcement of street vending regulations, urban management officers (chengguan) in the traditional model could resolve issues through direct communication with vendors, issuing verbal warnings or reducing fines to avoid conflicts. However, in the digital government era, smart cameras and online enforcement systems have replaced some roles of “street-level bureaucrats,” directly recording violations and generating

finer. This cold, proceduralized enforcement lacks emotional interaction, easily provoking dissatisfaction among vendors and leading to increased psychological costs.

Administrative Costs: The rigidity of procedures resulting from the reduction of discretionary power significantly increases administrative costs. The theory of “street-level bureaucrats” highlights that discretionary power is a key tool for handling complex affairs. For “street-level bureaucrats” dealing with conflictual affairs, tasks that could once be handled flexibly must now be executed strictly by the book due to the contraction of discretionary power in the digital government era, thereby increasing the administrative burden on grassroots civil servants. For instance, in addressing street vending issues, urban management officers in the past could resolve problems through verbal warnings. Now, they must follow a standardized process involving capturing evidence, uploading it to the system, generating records, and issuing fines. While this standardized process enhances enforcement transparency, it significantly increases the time and complexity of handling affairs for “street-level bureaucrats.”

4.2 Burden-Reducing Effects

The application of emerging communication and electronic technologies in the process of digital government construction has transformed traditional government operational processes and, with its unique functionalities, alleviated administrative burdens in various aspects of non-conflictual affairs. Specifically, it reduces administrative burdens in the following three ways:

Learning Costs: In the construction of digital government, technological means, such as intelligent question-answering systems and government service platforms, have replaced some of the intermediary functions of “street-level bureaucrats.” The intelligent question-answering systems in government service apps can provide 24/7 answers to policy-related inquiries, helping citizens quickly understand procedures and policy requirements. This avoids the time wasted due to the inefficiency or delayed information transmission by “street-level bureaucrats.” Digital technologies effectively reduce the supervision costs between the principal (the government) and the agent (“street-level bureaucrats”), as well as the information asymmetry between the agent (“street-level bureaucrats”) and the service recipients (citizens).

Compliance Costs: In the context of digital government, technological means have effectively reduced citizens' compliance costs through process optimization and transparent design. The theory of “street-level bureaucrats” points out that the reduction of discretionary power diminishes the space for “street-level bureaucrats” to create artificial obstacles in policy implementation. In traditional systems, “street-level bureaucrats” might set implicit barriers through complex procedures, increasing the difficulty for citizens to access services. Digital government, through standardized and transparent process design, compels “street-level bureaucrats” to operate according to fixed rules, avoiding policy implementation deviations caused by subjective judgments. At the same time, process standardization reduces the arbitrariness of agents (“street-level bureaucrats”) in policy implementation and enhances citizens' predictability of service procedures. Through online appointment systems, citizens can choose specific times for handling affairs and submit applications directly online, eliminating the need to wait in queues.

Administrative Costs: Digital government construction significantly reduces the administrative burden on “street-level bureaucrats” when dealing with non-conflictual affairs through technological means and process optimization. Digital government introduces intelligent tools that reduce the involvement of “street-level bureaucrats” in repetitive tasks. For example, in traffic management, smart cameras can capture violations in real time and automatically generate fines. This automated design not only improves law enforcement efficiency but also greatly alleviates the work pressure on “street-level bureaucrats.”

5. Conclusion

The research framework of this paper is grounded in the theories of “street-level bureaucrats” and principal-agent theory. It posits that in the process of digital government construction, the discretionary power of “street-level bureaucrats” is constrained. This constraint leads to different outcomes when “street-level bureaucrats” handle affairs of varying natures. Specifically, when “street-level bureaucrats” deal with conflictual affairs, the reduction of discretionary power results in an increase in administrative burdens. Conversely, when they handle non-conflictual affairs, the reduction of discretionary power leads to a decrease in administrative burdens.

Digital government construction holds significant potential for reducing administrative burdens for both “street-level bureaucrats” and citizens. However, it can also contribute to an increase in administrative burdens. Therefore, it is essential to consider the attributes of “street-level bureaucrats” and the nature of public affairs, as well as to pay attention to relevant influencing factors and environmental conditions. By doing so, we can effectively promote digital government construction while minimizing administrative burdens.

References

- [1] *The Resolution of the Central Committee of the Communist Party of China on Further Deepening Reform Comprehensively to Advance Chinese Modernization*[J]. *Party Construction*, 2024, (08): 8-24.
- [2] Herd P, Moynihan DP. *Administrative Burden: Policymaking by Other Means*[M]. New York, NY: Russell Sage Foundation, 2018: 2-11.
- [3] Herd P, DeLeire T, Harvey H. *Shifting Administrative Burden to the State: The Case of Medicaid Take-Up*[J]. *Public Administration Review*, 2013(s1).
- [4] Ma Liang. *How do Administrative Service Innovations Alleviate Administrative Burden: A Case Study of Administrative Reform in Xi'an*[J]. *Journal of Gansu Administrative College*, 2019, (02): 4-11+126.
- [5] Bozeman B, Youtie J. 2020. *Robotic bureaucracy: Administrative burden and red tape in university research*[J]. *Public Administration Review*, 80(1): 157-162.