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Legislative Attention and Nonprofit Efficiency: A Link Across Sectoral Boundaries

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ABSTRACT

Government attention matters for nonprofit management and nonprofit-government interactions. This study focuses on legislative attention, an important yet less-studied aspect of government attention in public policy research, and examines its impact on nonprofit efficiency. By employing a longitudinal multi-level regression design and utilizing data from state-level legal proceedings and financial statements from a national sample of housing nonprofits, the findings suggest a positive impact of legislative attention on nonprofit efficiency, highlighting a complementary mode of nonprofit-government relations. Additionally, this impact is more pronounced among nonprofits that receive government grants, suggesting the role of government support in enhancing nonprofits' responsiveness to government attention. Our study contributes to a macro–micro understanding of government-nonprofit relationships and extends prior research on government attention by bridging the dynamics in the policy process with practices in other sectors.

摘要

政府注意力对非营利组织管理以及非营利组织与政府之间的互动至关重要。本研究聚焦于立法注意力，这是公共政策研究中政府注意力的一个重要但研究较少的方面，并分析了其对非营利组织效率的影响。通过采用一项纵向多层回归设计，并利用来自州级法律诉讼的数据和来自全美住房非营利组织样本的财务报表，研究结果表明，立法注意力对非营利组织效率产生了积极影响，凸显了非营利组织与政府关系的互补模式。此外，这种影响在那些获得政府资助的非营利组织中更为明显，表明“政府支持”在增强非营利组织对政府注意力的响应能力方面发挥了作用。我们的研究有助于从宏观和微观角度理解政府与非营利组织的关系，并通过将政策过程中的动态与其他部门的实践联系起来，进而扩展了关于政府注意力的以往研究。

RESUMEN

La atención gubernamental es crucial para la gestión de las organizaciones sin fines de lucro y sus interacciones con el gobierno. Este estudio se centra en la atención legislativa, un aspecto importante, aunque menos estudiado, de la atención gubernamental en la investigación de políticas públicas, y examina su impacto en la eficiencia de las organizaciones sin fines de lucro. Mediante un diseño de regresión longitudinal multinivel y utilizando datos de procedimientos legales estatales y estados financieros de una muestra nacional

de organizaciones sin fines de lucro dedicadas a la vivienda, los hallazgos sugieren un impacto positivo de la atención legislativa en la eficiencia de las organizaciones sin fines de lucro, destacando una modalidad complementaria de relaciones entre organizaciones sin fines de lucro y el gobierno. Además, este impacto es más pronunciado entre las organizaciones sin fines de lucro que reciben subvenciones gubernamentales, lo que sugiere el papel del apoyo gubernamental en la mejora de la capacidad de respuesta de las organizaciones sin fines de lucro a la atención gubernamental. Nuestro estudio contribuye a una comprensión macro-micro de las relaciones entre el gobierno y las organizaciones sin fines de lucro y amplía la investigación previa sobre la atención gubernamental al conectar la dinámica del proceso de formulación de políticas con las prácticas en otros sectores.

1 | Introduction

Attention is not a unitary concept but varies across different metatheories; for instance, the behavioral theory of organizations, managerial cognition, issue selling, and agenda-setting (Ocasio 2011). In general, attention can be understood as a set of varied, interconnected processes in individual and/or organizational information processing networks that can influence their subsequent perception and/or action (Posner and Rothbart 2007). Due to its potential in explaining key policy and managerial decisions such as issue prioritization and resource allocation (Jones and Baumgartner 2005), attention has been increasingly examined in public policy and nonprofit management studies, focusing on important variants such as political, fiscal, and media attention as well as their linkages to varied organizational characteristics and managerial practices (Boettke et al. 2017; Fan et al. 2022; Guo and Saxton 2018; Quinn et al. 2010; Peterson 2018; van Aelst et al. 2008). Despite the progress, most studies are conducted in sectoral silos (e.g., within government entities or nonprofits), leaving attention mechanisms and influence across sectors understudied[1].

An attention-based view can be instrumental in understanding government-nonprofit relationships, which are essential in public policy processes and public service delivery. First, the conceptual richness of attention entails greater analytical applicability to the complexity and multifacetedness of government-nonprofit relationships. For instance, in addition to its substantive variants such as political and fiscal attention (see e.g., Mortensen 2009), attention can likewise be distinguished into categories such as selective and executive attention based on their driven stimuli (e.g., top-down and bottom-up) as well as their roles in individual and organizational decision-making (Ocasio 2011). These variants and their mechanisms can help better capture the nuances of government-nonprofit interactions beyond resource exchange and contractual relationships (Cheng 2019). For example, selective attention, which characterizes the process by which an organization's limited information processing capacity is allocated to a specific set of stimuli at a moment in time, can help explain if and to what extent government and nonprofit organizations would respond to each other's varied signals (e.g., requests and demands) coherently in an environment of competing sources of stimuli (Ocasio 2011).

Second and relatedly, an attention-based view of government-nonprofit relationships facilitates incorporating knowledge from fields such as psychology and cognitive neuroscience. These disciplines are essential for advancing our understanding of government and nonprofit interactions and promoting a behavioral perspective in public policy and nonprofit management. This is because studying attention at the organizational and sectoral levels will necessarily engage the micro-level behavior and attitudes of individual managers and practitioners. Such intricacies can be effectively disentangled by psychology- and/or neuroscience-informed research (Grimmelikhuijsen et al. 2017). For instance, an attention-based view of government-nonprofit relationships can help address important yet less-studied questions such as the potential discrepancies between individual- and organizational-level attention within public and nonprofit organizations as well as the relationship between the varied forms of attention and their effects on managerial practices and motivation. As for the behavioral perspective of public policy and nonprofit management, an attention-based view of government-nonprofit relationships will help provide evidence to critical topics such as public leadership and motivation (e.g., connecting perception to action at the agent and organizational levels; Warren 2006) that can have important implications for areas such as government and nonprofit accountability and performance.

We apply the attention-based view of government-nonprofit relationships to examining the relationship between two important concepts: government attention and nonprofit efficiency, defined here as the selective allocation of government capacity and resources (Quinn et al. 2010) and the extent to which a nonprofit succeeds in accomplishing its objectives (e.g., delivering social services) with limited inputs (Alexander et al. 2010), respectively. Our motivation for focusing on this relationship is twofold. First, although government attention has been recognized as crucial in political and policy processes, due primarily to the capacity-and-overload gap in government information processing (Jones and Baumgartner 2005), as well as its potential influence on the behaviors of partners and stakeholders within and beyond the public sector (see e.g., Klüver 2020; Yackee 2006), there remains a lack of research on government attention in cross-sector settings. As for nonprofit efficiency, its long-standing importance to nonprofit survival has likewise made it worthwhile to be further examined in an intersectoral setting in relation to the dynamics of government attention. Second, connecting government attention to nonprofit efficiency helps build a macro–micro model of government-nonprofit relationships in which dynamics in the political and policy processes can be reflected in and/or help explain relevant managerial practices and outcomes at the individual and/or organizational levels (Vogel et al. 2022). Such a macro–micro approach to government-nonprofit relationships will help refine and improve our understanding of interactions between government and nonprofit organizations, such as collaboration and conflict, as well as provide room for other types of societal dynamics such as public and media attention, to be incorporated into the analysis of government-nonprofit relationships.

In this article, we focus on legislative attention, an important yet less-studied aspect of government attention in

public policy research, and examine its impact on nonprofit efficiency. Specifically, we ask two questions: (1) What is the relationship between government attention and nonprofit efficiency? and (2) how does the receipt of government grants influence this relationship? Empirically, we adopt a three-step approach contextualized in the U.S., focusing on housing nonprofits. First, we theorize and measure legislative attention at the state level in the U.S. via a computational text analysis approach and data from state-level legal proceedings. Second, we develop a comprehensive measure of nonprofit efficiency at the organizational level using Data Envelopment Analysis (DEA), based on a national sample of Habitat for Humanity (HFH) affiliates. Third, we analyze the relationship between legislative attention and efficiency with a longitudinal multilevel regression design. Our findings provide suggestive evidence for a positive association between legislative attention and efficiency, pointing to a complementary mode of nonprofit-government relations in the context of our study. Additionally, our findings reveal that the positive correlation between legislative attention and nonprofit efficiency is more pronounced among nonprofits that receive government grants, whereas this association is not statistically significant among nonprofits without government grants.

2 | Literature Review

Government-nonprofit relationships feature prominently in policy processes and public service delivery. Government failure theory posits that nonprofit service delivery occurs when the government fails to meet citizens' heterogeneous demands (Zuhlke 2021). Building on theories of collective action and transaction costs, scholars have also proposed a symbiotic relationship between the government and nonprofits to deal with "free-riding" and inefficiency in public service provision (Kapucu 2006). Nonprofits are responsible for service delivery, whereas the government is responsible for service financing. Lastly, the advocacy role of many nonprofits and monitoring pressures from the government can render the government-nonprofit relationship adversarial and reactive (Verschuere and De Corte 2015). The sum is that the government and nonprofits can work in a supplementary and complementary manner and be engaged in an adversarial relationship of mutual accountability and influence (Cheng 2019; Young 2000). An important implication of these findings is that government-nonprofit relationships are multifaceted, dynamic, and contextually dependent.

As noted previously, a key element in public policy is attention (Jones and Baumgartner 2005), defined here broadly as the selective allocation of government capacity and resources (Quinn et al. 2010). In other words, government attention captures the extent to which the government engages consciously in a selected set of issues and/or uses resources (Simon 1947). The importance of government attention stems from the cognitive limitations at individual and organizational levels, the oversupply of information in political and policy decision-making (Workman et al. 2009), and the government's control over key governance resources such as public finance and legislation. Accordingly, government attention can also be understood as the weight of each issue definition on government decision-making. Despite the importance, however, government attention has not been well recognized in the context of government-nonprofit relationships, with a few exceptions in advocacy business-government relations and policy change (see Fyall and McGuire 2015; Guo and Saxton 2018). The lack of recognition can be attributable, at least in part, to the difficulties in constructing viable measures of government attention (Quinn et al. 2010). Yet, given the increasing cross-sector interaction and cooperation in public service delivery, a better understanding of the role of government attention in shaping nonprofit service delivery is necessary.

A significant body of research within the public policy literature focuses on the concept of government attention, particularly in the forms of political and fiscal attention. Key areas of study include the influence of attention on agenda-setting as well as the interplay between government attention and public and/or media attention (see e.g., Bevan and Rasmussen 2020; Jones and Baumgartner 2004). An overview of this body of research indicates a common perspective of government attention as a valuable political resource, highlighting its significant role across various stages of policymaking and the factors determining its allocation. Methodologically, scholars in these fields have been innovating empirical methods to quantify and analyze attention, increasingly employing techniques like computational text analysis and leveraging big data to gain insights (see e.g., Barberá et al. 2019; Russell Neuman et al. 2014). One understudied area is the impact of government attention in cross-sector contexts, particularly on topics such as how actors from non-public sectors respond to different forms of government attention.

As for the variants of government attention, as mentioned previously, their definitions are largely in line with the divisions of government responsibilities in many political systems, often categorized into types such as administrative, political, and judicial attention. These variants are increasingly examined in policy studies, with a focus on their influence in shaping key government behaviors and practices such as budgeting and policy adoption (Boettke et al. 2017; Fan et al. 2022). An important yet less-studied type of government attention is legislative attention, defined here as the extent to which the government engages in issues using cognitive and/or material resources in the legislative process. Legislative institutions play a key role in determining the relative importance of various public concerns through their agenda-setting function; understanding the dynamics of the legislative process is thus essential, particularly regarding its impact on actors both within and beyond the public sector (Woon 2009). Additionally, while legislative attention generally aligns with other types of government attention, such as political and fiscal attention, this alignment is not always consistent due to the common executive-administrative discretion exercised in various aspects of policy implementation and public service delivery (Lynn et al. 2000; Lovett et al. 2015).

Specifically, legislative attention holds a unique and critical role in shaping the policy process by establishing the legal groundwork for policy development through both structured institutional procedures and the entrepreneurial efforts of representatives (Woon 2009). That is, legislative attention is instrumental in the policy process by fostering debates and exchanges, building coalitions, and reconciling diverse interests (see e.g.,

DeLeo and Duarte 2022; Luxon 2019). In contrast, administrative attention is primarily concerned with addressing the short-term and practical challenges of policy implementation by leveraging bureaucratic discretion and organizational capacities—which are influenced by contextual specificities—to translate policymakers' decisions into action (May et al. 2008; Williams 2021). At the same time, judicial attention functions as an essential check by ensuring that both legislative actions and administrative practices adhere to constitutional principles, as emphasized in theories of institutional checks and balances (Rubenstein 2009). Importantly, unlike the often rapid and/or volatile dynamics of administrative attention and the more indirect, exogenously driven influence of judicial attention, legislative attention tends to be slow-moving (i.e., the built-in inefficiencies; see Oleszek et al. 2020), more endogenous (representatives' entrepreneurial efforts), and consequential over a longer time period, and is thus more likely to catalyze substantive changes among policy stakeholders (Ponomarenko 2021).

Regarding efficiency, it is arguably one of the most critical factors in assessing and characterizing nonprofit service delivery performance, given the extent to which nonprofits depend on external resources for service input and the volume of service output that is required to meet citizens' heterogeneous demands (Coupet 2018). In other words, nonprofits must balance both structural and instrumental priorities in their management and operations. This involves reconciling stakeholder expectations with practical operational outcomes (Mitchell 2018). External stakeholders often promote resource management practices rooted in established standards of good governance and stewardship, where efficiency stands out as a key indicator of responsible management—an essential factor for long-term sustainability (Coupet and Berrett 2019). Although metrics like the volume of services delivered can provide a more straightforward gauge of performance, emphasizing efficiency—which inherently considers the strategic investments in management and operations (Altamimi and Liu 2022)—offers a more comprehensive approach to evaluating nonprofit performance within their operational contexts.

Moreover, in line with what resource dependence theory posits—that dependence on external resources can result in a power imbalance that opens internal control to external interests that extend those resources (Pfeffer and Salancik 1978)—the nonprofit literature has likewise suggested that the threat of removal of key public resources can affect nonprofit efficiency (Malatesta and Smith 2011). One possible explanation lies in the cost associated with fulfilling the requirements of using public resources, such as reporting and disclosure, which could potentially lead to an increase in the input side of the efficiency measure and hence decrease nonprofit efficiency (Froelich 1999). Here, the potential effect of public resource dependence on nonprofit efficiency again points to a principal role of the government in government-nonprofit relationships. Yet, given the complexity and multifacetedness of government-nonprofit relationships, other elements of policymaking, such as attention, should likewise be assessed in relation to nonprofit efficiency. As such, our study examines the role of legislative attention in shaping nonprofit efficiency as well as how government grants affect the relationship between government attention and nonprofit efficiency.

3 | Theoretical Expectations and Hypotheses

3.1 | Government Attention and Nonprofit Efficiency: Enhancement or Hindrance?

Government attention has been viewed as a resource that shapes important practices such as agenda-setting and public spending (Jones and Baumgartner 2005). The resource-based view recognizes the gap between limited information processing capacity and information overload (Workman et al. 2009). Here, both serial and parallel government information processing (Simon 1947) are subject to the capacity-and-overload gap since it is the individual public managers that constitute the "building blocks" of government decision-making (Jones and Baumgartner 2005). In the context of government information processing, assuming it can be stylized into different stages (e.g., noticing, encoding, and interpreting), the distinction between serial and parallel processing relates to how a stimulus array is processed at each stage. Serial processing involves handling one array at a time in each stage, while parallel processing involves simultaneously processing multiple arrays (Massaro and Cowan 1993). An implication of the resource-based view is that a higher level of government attention indicates more weight of an issue on the government's decision-making, which can potentially translate into a higher level of policy priority, action, and/or resources (Fan et al. 2022). Additionally, government attention can be influenced by either top-down (e.g., policy and political agendas) or bottom-up mechanisms (e.g., public demands) or a combination of both (Ocasio 2011).

Linking legislative attention to nonprofit efficiency, two possible relationships emerge in opposite directions. The first aligns with the complementary mode of nonprofit-government relations and suggests a positive relationship based on a threefold rationale. First, many nonprofits face underinvestment in organizational infrastructure (e.g., the nonprofit starvation cycle; Lecy and Searing 2015). Along these lines, nonprofits also struggle to gain sufficient policy influence due to challenges in effectively deploying advocacy tactics (Ljubownikow and Crotty 2016). The policy priorities and resources generated by heightened attention in the legislative process—through both its agenda-setting function and its control over budget and appropriations (Oleszek et al. 2020)—can significantly enhance nonprofits' capacity building, operational stability, and long-term performance, thus leading to more efficient resource use. Second, despite challenges from constructivist and postmodernist perspectives and the increasingly politicized relationship between scientific evidence and policymaking, the emphasis on evidence-based policymaking remains both relevant and important (Cairney 2016; Sanderson 2002). In light of this, policymakers are more likely and capable of demanding performance disclosure and monitoring nonprofit operations (Coupet and Schehl 2021), and nonprofits can be expected to seek enhanced efficiency when there is a high level of legislative attention to their service issue areas. Third, strategic management and innovation studies suggest that increased government attention in general may help create new market space in public service delivery (see Li et al. 2013). Given nonprofits' role in meeting the public's heterogeneous demands, when facing a high level of legislative attention, it is logical to expect nonprofits to introduce new services, update

existing ones, or both (see Shi et al. 2020), which requires improvement in their operational efficiency and performance (Smith et al. 2005). Such information leads to the following hypothesis:

Enhancement Hypothesis (H1). *All else being equal, legislative attention is positively associated with nonprofit efficiency.*

An alternative link between legislative attention and nonprofit efficiency suggests a negative direction based on the following grounds. First, research on organizational theory suggests that in addition to selective attention, which emphasizes the information capacity-and-overload gap, a distinct form of attentional mechanism, executive attention, may also explain and guide organizational decision-making and action (Ocasio 2011). Specifically, executive attention involves allocating cognitive resources to diverse and/or inconsistent stimuli and, more importantly, facilitates planning and problem-solving. Put differently, executive attention goes beyond allocating cognitive resources selectively and implies motivation and action. A logical expectation, based on executive attention, is that increased legislative attention may be channeled into the executive branch through mechanisms such as legislative mandates, which may then prompt more direct government involvement in service delivery, potentially exacerbating the nonprofit starvation cycle (Lecy and Searing 2015) and potentially reducing nonprofit efficiency.

Second, apart from governments' expanded involvement in service delivery, the potential policy priorities and resources available for the nonprofit sector due to increased legislative attention may not necessarily translate into nonprofits' enhanced efficiency. From a policy growth perspective, increased legislative attention may lead to a piling up of regulations and scrutiny in nonprofits' service areas, resulting in additional administrative and managerial costs that could threaten nonprofit efficiency (Fyall 2016). This is particularly the case when implementation capacities do not expand in parallel with policy growth (Knill et al. 2024). Additionally, from a resource dependence perspective, nonprofits that overly rely on government support may ultimately lose their independence and become less adaptive to external influences. Furthermore, as indicated above, prior literature suggests that government funding can negatively affect organizational efficiency (Froelich 1999; Gronbjerg 1991). For instance, Coupet (2018) finds that increases in state funding negatively impact the efficiency of public colleges. This may be because, to compete for government support, substantial effort is required to become more formalized and bureaucratized to meet the demands of the government's disclosure requirements (Lu 2018). Accordingly, we hypothesize that:

Hindrance Hypothesis (H2). *All else being equal, legislative attention is negatively associated with nonprofit efficiency.*

3.2 | Heterogeneity in the Receipt of Government Grants

While the above reasoning indicates that legislative attention could have an impact on nonprofit efficiency in either direction, it is likely that such impact might vary depending on whether a nonprofit is financially connected with the government. In this case, we further hypothesize that the impact of legislative attention on nonprofit efficiency may be more pronounced among nonprofits that receive government grants. This is because such nonprofits are more likely to be informed of dynamics in government attention in general, given their established financial relationships with government agencies. Additionally, as previously mentioned, government principals, unlike individual donors who face various information costs like search, discovery, bargaining, and decision-making (Mitchell and Calabrese 2020), tend to prioritize factors such as efficiency and productivity in funding decisions for nonprofits (Coupet and Schehl 2021). Such a focus could further incentivize nonprofits to respond to legislative attention. In this case, our above reasoning leads to the following hypothesis:

Government Grants Hypothesis (H3). *All else being equal, the impact of legislative attention on nonprofit efficiency is more pronounced among nonprofits that receive government grants.*

4 | Empirical Context, Data, and Methods

The nonprofit housing sector offers a useful context for exploring the relationship between government attention and nonprofit efficiency. Housing addresses a fundamental human need but has become increasingly unaffordable due to the widening gap between rising housing costs and stagnant personal incomes in the U.S. (Ellen and Karfunkel 2016). Consequently, both the government and nonprofit sectors are contending with an expanding demand for affordable housing. Furthermore, extensive interactions between nonprofits, government agencies, and the public characterize the housing sector, driven by complex regulatory frameworks and incentives at various administrative levels (e.g., the U.S. Department of Housing and Urban Development) and exacerbated by market segmentation and rising housing insecurity (Coupet and Schehl 2021). The variation in service delivery and policy actions in this sector provides ample empirical opportunities to investigate how government attention influences nonprofit efficiency.

This study specifically focuses on U.S.-based affiliates of Habitat for Humanity (HFH) to construct the sample of housing nonprofits. HFH, a global nonprofit, aims to build homes and communities for disadvantaged populations (Habitat for Humanity 2021). HFH affiliates offer a suitable context for efficiency analysis, given their similar operational and production processes, which facilitate standardized comparisons across units. Moreover, their centralized leadership structure ensures consistent managerial control and policy guidance, reducing the influence of confounding factors such as differences in leadership styles and internal policies across units. That said, HFH differs in several important aspects from many other affordable housing providers. First, HFH emphasizes single-family homeownership rather than multifamily rental housing or voucher programs. Second, it operates at a relatively modest scale compared with federal and state housing programs. Third, HFH relies heavily on volunteer labor—data that were unfortunately unavailable for our study period. These distinctive features can influence both HFH's financial structure and the efficiency metrics we observe in this study.

For example, extensive volunteer labor likely reduces reported program costs, which may inflate measured efficiency relative to organizations that depend on paid workforces; likewise, a single-family ownership model may produce higher per-beneficiary costs than higher-density rental programs. Given these differences, our results should be interpreted with caution when generalizing to the broader universe of nonprofit housing providers—particularly those that manage large-scale, multifamily developments or government-funded voucher schemes. While HFH affiliates offer a compelling and internally comparable sample, the sector's diversity means that efficiency dynamics documented here may not fully translate to other organizations.

4.1 | Data and Variables

Our study leverages data from numerous sources. First, we employ data from HFH to construct our dependent variable, nonprofit efficiency. Specifically, we draw on nonprofit management studies and use managerial efficiency as our dependent variable for two reasons. First, managerial efficiency is a valid and highly used indicator of organizational efficiency (Prentice 2015) and is particularly useful in research on nonprofit organizations, given the aforementioned nonprofit starvation cycle. This is because managerial efficiency accounts for the managerial capacity to turn inputs into outputs (Coupet and Berrett 2019). Second, the aggregating nature of managerial efficiency has made it more advantageous in being comparable across organizations, whereas output measures might be less comparable due to variations in desirable and undesirable organizational outputs.

To quantify managerial efficiency, we employ DEA, a nonparametric and deterministic linear programming method that generates a single, synthesized measure of an organization's efficiency based on observed input–output vectors. Our choice of DEA is motivated by two primary reasons. First, as a nonparametric technique, DEA does not require assumptions about data distribution or specific production, cost, or profit functions (Dong et al. 2015). Second, DEA facilitates comparisons across sampled nonprofits by assigning varying weights to each organization's inputs and outputs, constructing a production frontier from the input–output vectors of all sampled entities (Charnes et al. 1978). Assuming there are k nonprofits, each with m inputs and n outputs, the DEA score of nonprofit p can be obtained by solving the following model (Cooper et al. 2011):

$$\text{Max} \quad \theta_p = \frac{\sum_{i=1}^{n} u_i y_{ip}}{\sum_{j=1}^{m} v_j x_{jp}}$$

$$\text{s.t.:} \quad \frac{\sum_{i=1}^{m} u_i y_{io}}{\sum_{j=1}^{n} v_j x_{jo}} \leq 1 \qquad \forall o$$

$$u_i, v_j \geq 0 \qquad \forall i, j$$

where $i = 1, ..., n$, $j = 1, ..., m$, $o = 1, ..., k$, y_{ip} is the observed level of output i from nonprofit p, x_{jp} is the observed level of input j from nonprofit p, u_i is the weight on output i, v_j is the weight on input j. For our study, we source input and output data for HFH affiliates from two main repositories: HFH production reports and GuideStar's Form 990 filings. The Form 990, required by the U.S. Internal Revenue Service, provides detailed financial information about nonprofits. We select management and program expenses as our input variables, as they represent key components of an organization's financial resource deployment. Our output variables include the numbers of new, recycled, rehabilitated, and repaired houses[2], capturing the tangible, mission-driven outcomes HFH affiliates are expected to deliver. By incorporating both programmatic and administrative costs along with multiple forms of housing activity, our approach operationalizes efficiency as an organization's capacity to transform its total expenditures into measurable, mission-aligned housing outputs. This conceptualization is consistent with definitions from the public and nonprofit management literature, which frame efficiency as an organization's capabilities in achieving its objectives—such as delivering social services—using limited resources (Alexander et al. 2010), and aligns methodologically with recent empirical studies in the field (e.g., Berrett and Hung 2023; Coupet 2018; González-Torre et al. 2017). Please refer to the Appendix A for details about our input and output variables.

We focus on government attention at the state level as our primary explanatory variable. In particular, we introduce an important yet understudied variant of government attention, legislative attention, which captures the government's engagement in varied issues in the legislative process. Inspired by Baldwin (2019) and Worth et al. (2020), we measure legislative attention using legal proceedings from the NexusUni database, one of the largest and most relevant legal databases in the U.S. To ensure the validity of our legislative attention variable and to mitigate distortion from the large volume of legal proceedings in each state, we first identify relevant proceedings using the search terms “affordable housing,” “low-income housing,” “affordable home ownership,” or “Habitat for Humanity.” We further narrowed the search to include proceedings published between January 1, 2010, and December 31, 2016, in line with the timeframe of our HFH and GuideStar data. This search yielded 15,417 proceedings from 49 states and the District of Columbia; no proceedings were identified for Wyoming under these criteria.

We build our state-level legislative attention variable using natural language processing (NLP) techniques. In doing so, following common practice, we first pre-processed all the raw input (i.e., legal proceedings) by removing stopwords and punctuation, replacing inflected words with their base forms (or lemmatization), replacing numbers with a single tag, and unifying the same words written with different capitalization (Isoaho et al. 2021). Next, we employ GloVe (Global Vectors for Word Representation; Pennington et al. 2014), a widely applied unsupervised learning algorithm in NLP, to create word embeddings. These pretrained embeddings serve as the foundation for constructing our legislative attention variable based on the proceedings at the state-year level (i.e., grouping proceedings per year and per state). We construct our legislative

attention variable by utilizing GloVe's embeddings to learn the grouped text representations through a weighted averaging system on individual word embeddings. The weights are determined by the Term Frequency-Inverse Document Frequency (TF-IDF) score (Rajaraman and Ullman 2011) assigned to each word.

We then build a list of keywords that are carefully chosen to be relevant to our research topic of nonprofit housing (for further details, please refer to the Appendix A). These keywords serve as our reference points. We apply the same embedding procedures to this keyword list and all other proceeding documents to quantify the extent of legislative attention they capture. The measure of legislative attention is derived from the cosine similarity between the topic representations and the corresponding document embeddings. A higher score suggests a more pronounced level of legislative attention. Lastly, we normalize the scores using either L1 or L2 normalization along the row dimensions to enhance statistical validity and semantic balance. In L1 normalization, the scores are divided by their absolute sums, after which they sum to 1. In contrast, L2 normalization involves dividing scores by their squared sums, after which their squared scores sum to 1. Without affecting regression analysis, we scale all scores by 100 times for lighter computation. Both normalization methods yield correlated results.

Finally, we incorporate two sets of control variables. At the state level, we control for government size, income level, and government decentralization. Government size, representing the government's potential capacity for service delivery involvement, is measured by the number of full-time government employees per thousand residents. To account for heterogeneity in state housing markets and demand, we include income level, using per capita income in real 2019 thousand dollars as a proxy. Regarding government decentralization, while government failure theory suggests that decentralization might hinder nonprofit performance due to increased efficiency and heterogeneity of government services, other scholars have found evidence of an interdependent relationship between government and nonprofits, indicating minimal influence of decentralization on nonprofit efficiency (Liu 2017). Following Wei (2020), we measure government decentralization by the number of special-district governments weighted by population size in millions.

To account for state-level variations in housing availability for disadvantaged populations, we include several additional control variables that capture nuances in housing assistance and accessibility. Following Gromis et al. (2022), we first control for the occupancy rate of assisted housing units, which provides insight into the availability of housing assistance relative to the overall housing market in each state. Second, we include the average waiting time for new admissions to assisted housing units, measured by the average number of months applicants spend on waiting lists—a proxy for both accessibility and demand for housing assistance. Lastly, to assess the extent of need among subsidized households, we control for the proportion of low-income households among those receiving subsidies. This variable is operationalized as the percentage of subsidized households with incomes below 50% of the local area's median family income, as defined by the U.S. Department of Housing and Urban Development and adjusted for household size. Data for these measures were obtained from the HUD Picture of Subsidized Housing.

At the nonprofit-level, we control for organizational size and age, following standard practices in nonprofit research. Size is measured by log-transformed total revenue, and age by years since founding, since larger organizations may benefit from economies of scale (Hager et al. 2001), while younger ones may face the "liability of newness" (Stinchcombe 1965). We also control for the share of government grants, revenue concentration, and the GSA population category. The share of government grants is calculated as the ratio of government grants to total revenue. Revenue concentration is assessed using the Herfindahl–Hirschman Index (HHI), where a score of 1 indicates complete concentration and a score near 0 indicates diversification; this is calculated from contributions, net income from special events, earned revenue, and investment income, excluding government grants to avoid multicollinearity. The GSA population category classifies the community's population size into five groups—from Small ($<50{,}000$) to Very Large ($\geq 750{,}000$)—to account for varying scales of nonprofit operations. Data were obtained from HFH production reports and GuideStar's Form 990 data. Specifically, each affiliate's GSA was identified based on county-level descriptions provided by HFH and mapped accordingly to county boundaries (Habitat for Humanity 2021). Lastly, we control for the costs of purchasing land or houses in the region where an HFH affiliate operates. Following prior research (see Berrett and Hung 2023), this variable is operationalized as the logarithm of the Zillow Home Value Index provided by Zillow Data (https://www.zillow.com/research/data/), a website that publishes housing data in North America. We assign each affiliate's region based on the zip code of its primary operating location. The final sample includes 2334 observations from 757 HFH affiliates from 2010 to 2016, with descriptive statistics and data sources provided in Table 1.

4.2 | Methods

We employ observational data at both state and nonprofit-levels and across multiple time periods to investigate the relationship between legislative attention and nonprofit efficiency. We rely on a multi-level regression model to account for the variation in this nested service delivery structure. Multi-level modeling outperforms classical regression in terms of prediction, data reduction, and causal inference, albeit to varying degrees (Gelman 2006). While it is beyond the scope of our study to provide causal inferences, when randomized experimental data and/or credible quasi-experimental designs are unavailable, multi-level models can be used to simulate causal relationships with hierarchical heterogeneities (Subramanian 2004). The following specification is our baseline model without the moderator (i.e., public attention):

$$P_{ist} = \alpha_0 + \alpha_1 A_{st} + \alpha_2 G_{st} + \alpha_3 N_{it} + \theta_s + \delta_i + \varepsilon_{ist}$$

where P_{ist} represents service delivery efficiency of NPO_i in state_s and year_t, A represents state-level legislative attention; G represents a vector of state-level control variables; N represents a

TABLE 1 | Variables, measurements, and descriptive statistics.

Variable	Mean	SD	Min	Max	Data source
State level					
Variables of interest					
Legislative attention	0.248	0.053	−0.092	0.354	a
Government funding allocation	1.537	0.485	0.566	4.297	b
Public attention	42.304	14.119	8.417	71.167	c
State-level control variables					
Per capita income	49.245	7.258	36.679	75.227	d
Government size	45.511	5.505	33.528	68.856	e
Government decentralization	143.052	137.787	11.955	765.053	f
Assisted housing occupation rate	92.611	2.534	79.000	98.000	g
Average waiting time for admission	23.147	8.875	2.000	61.300	g
Percent households with low income	95.391	1.617	90.000	99.000	g
NPO-level					
Variables of interest					
Nonprofit efficiency (DV)	95.391	1.617	90.000	99.000	h, i
Nonprofit-level control variables					
Nonprofit age	22.386	5.818	1.000	72.000	i
Nonprofit size	13.482	1.389	5.298	16.805	i
Government grants contribution	0.068	0.130	0.000	0.958	i
Revenue concentration (HHI)	0.587	0.145	0.303	1.000	i
GSA population category	2.714	1.312	1.000	5.000	h
Zillow Home Value Index (log)	11.892	0.558	10.537	13.330	j

Note: a = Nexis Uni database. b = U.S. Census Annual Survey of State and Local Government Finances. c = Google Trends. d = the U.S. Bureau of Economic Analysis Personal Income by State. e = the U.S. Census Annual Survey of Public Employment & Payroll. f = the U.S. Census of Governments: Organization. g = HUD. h = HFH production reports. i = GuideStar Form 990 data. k = Zillow Housing Data.

vector of nonprofit-level characteristics. Additionally, α_0 is the intercept, α_1, α_2, α_3 represent respective parameters to be estimated. θ_s and δ_{ti} represent state- and nonprofit-specific effects, respectively. ϵ_{ist} represents the disturbance term.

Given the three levels of variation in our data—across nonprofits, across states, and over time—we estimate this multilevel model with a set of three-way fixed effects regressions, as suggested by Andrews et al. (2006). This methodology handles additional variation generated by a third level of data (e.g., states), which is typically one level higher than the cross-sectional units (e.g., nonprofits), as opposed to traditional panel data models, which only allow for two levels of variation (e.g., nonprofits and time). Alternatives include hierarchical linear models (HLM) and linear mixed models (LMM), although HLM/LMM are less suited due to the assumption that fixed error components are uncorrelated with observed explanatory variables (see Ba et al. 2021). All independent variables are lagged by one year to eliminate the possibility of simultaneity bias.

5 | Results

5.1 | Main Results

Table 2 presents the results of our multi-level regression models. Model 1 focuses on the entire sample and does not consider the heterogeneous effects between nonprofits that receive government grants and those that do not. Model 2 is centered on nonprofits that receive government grants, while Model 3 examines nonprofits that do not receive government grants. In Model 1, our regression results show a statistically significant positive association between legislative attention and nonprofit efficiency measured in DEA scores. Given the scale difference between the two variables, to ease interpretation, we standardize our legislative attention variable (see Appendix A for results without standardizing legislative attention). Specifically, all else being equal, the results of Model 1 suggest that a one-standard-deviation increase in legislative attention is associated with a 1.642 increase in nonprofit efficiency (DEA score). Such a positive association aligns with our enhancement hypothesis (H1) but contradicts

TABLE 2 | Regression results.

	Nonprofit efficiency		
	Model 1	**Model 2 (with government grants)**	**Model 3 (without government grants)**
Variables of interest			
Legislative attention	1.642**	2.399**	1.147
	(0.737)	(1.023)	(1.104)
State-level control variables			
Per capita income	1.459***	1.070	1.679**
	(0.437)	(0.765)	(0.732)
Government size	−1.853***	−2.905***	−0.954
	(0.595)	(1.018)	(0.922)
Government decentralization	0.355**	0.435**	0.382
	(0.149)	(0.172)	(0.280)
Assisted housing occupation rate	0.239	−0.375	0.276
	(0.492)	(0.762)	(0.719)
Average waiting time for admission	0.075	0.010	−0.003
	(0.121)	(0.202)	(0.168)
Percent households with low income	2.541**	4.351**	3.379**
	(1.136)	(1.719)	(1.717)
NPO-level control variables			
Nonprofit age	−0.268	0.779	0.270
	(0.268)	(1.040)	(0.948)
Nonprofit size	4.402***	1.070	4.821*
	(1.653)	(2.547)	(2.469)
Government grants contribution	2.413	8.393	—
	(6.492)	(7.695)	—
Revenue concentration (HHI)	11.785*	10.204	16.762*
	(6.721)	(10.895)	(9.884)
GSA population category	2.077	16.302***	1.424
	(2.326)	(2.355)	(3.038)
Zillow Home Value Index (log)	−2.154	−16.593**	4.713
	(5.980)	(7.716)	(10.682)
Constant	−323.290**	−231.275	−561.659**
	(150.327)	(222.565)	(243.006)
N	2334	1015	1319
BIC	20,337.96	8609.21	11,457.16

Note: Standard errors are clustered by NPOs and in parentheses. Regressions include state and nonprofit fixed effects. Legislative attention variable has been standardized to ease interpretation. Government grants contribution omitted because of collinearity.
*$p < 0.1$.
**$p < 0.05$.
***$p < 0.01$.

the hindrance hypothesis (H2), suggesting that government attention is positively linked to nonprofit efficiency when constructed as legislative attention. This implies the presence of a complementary mode of nonprofit-government relations in the context of our analysis. In particular, heightened government attention in the legislative process can lead to potential policy priorities and resources that can add to nonprofits' operational stability, capacity building, and efficiency (Fyall 2016; Lu 2018). Along this line, the positive relationship likewise suggests that nonprofits are inclined to enhance their operational efficiency in response to increased government attention and scrutiny, as governments are more likely to and capable of demanding performance disclosure (Coupet and Schehl 2021).

Moving on to Models 2 and 3, we separately run the regression from Model 1 on two groups of nonprofits: those that receive

government grants and those that do not (i.e., where government grant contributions are zero). This approach allows us to test the heterogeneous effects induced by government grants on how legislative attention impacts nonprofit efficiency. Here, the regression results indicate that the positive correlation between legislative attention and nonprofit efficiency persists for nonprofits receiving government grants, with a larger effect size than observed in Model 1 ($\beta_{\text{Model1-standardized}} = 1.642$, $p < 0.05$; $\beta_{\text{Model2-standardized}} = 2.399$, $p < 0.05$). Conversely, this positive correlation does not hold for nonprofits without government grants. These findings support our heterogeneous effect hypothesis (H3) and underscore government grants as an important factor influencing how legislative attention impacts nonprofit efficiency in the context of our study. Specifically, the results indicate that nonprofits receiving government grants are more likely to enhance their operational efficiency in response to increased government attention. This enhancement in efficiency may stem from the tendency of government officials to prioritize factors such as efficiency and productivity in grant decisions for nonprofits (Coupet and Schehl 2021). Moreover, in situations where there is a heightened level of government attention, nonprofits that receive government grants may improve their operational efficiency to demonstrate their accountability to secure additional grants (Salamon 1995). Notably, in addition to our subgroup analysis, we conducted an analysis incorporating an interaction term between legislative attention and the receipt of government grants. The results (see Appendix A) are consistent with our subgroup findings, indicating that legislative attention has a more pronounced effect on nonprofit efficiency among nonprofits that receive government grants.

As for the control variables, in Models 1 and 2, government size and decentralization have shown consistently statistically significant associations with nonprofit efficiency. Specifically, a negative association with government size and a positive association with government decentralization suggest that, in the context of our study, nonprofits tend to operate more efficiently under smaller, more decentralized governments. These findings support the interdependent relationship between governments and nonprofits identified by previous studies (see e.g., Liu 2017). Furthermore, the share of low-income households among subsidized households at the state level—defined as those receiving housing subsidies with an income below 50% of the state's median family income—has also demonstrated a consistently significant positive impact on nonprofit efficiency across Models 1–3. This aligns with the operations of HFH affiliates, which primarily serve low-income neighborhoods, indicating that higher needs among assisted households can enhance the efficiency of nonprofit operations. Lastly, per capita income shows a statistically significant positive association with nonprofit efficiency in Models 1 and 3, but not in Model 2. This suggests that government grants may crowd out private donations, thus diminishing the potential influence of private contributions on nonprofit efficiency.

At the nonprofit level, variables such as nonprofit size and revenue concentration—measured by a nonprofit's log-transformed total revenue and the Herfindahl–Hirschman Index (HHI) of revenue, respectively—have shown consistently statistically significant positive associations with nonprofit efficiency in Models 1 and 3, but not in Model 2. This suggests that, in general, larger organizations may benefit from economies of scale, enabling more efficient operations compared to smaller ones (Hager et al. 2001). Additionally, consistent with the literature (see e.g., Mendoza-Abarca and Gras 2019; Mitchell and Calabrese 2023), the concentration of revenue sources may help nonprofits minimize operational transaction costs, which is conducive to enhancing efficiency. However, the impact of these variables may be less pronounced in the presence of government grants. For nonprofits receiving government grants, variations in size and HHI tend to be smaller, which could explain their limited statistical significance in the regressions. Moreover, in Model 2, the GSA population category is statistically significant and positively associated with efficiency, indicating that in larger communities, nonprofits receiving government grants tend to operate more efficiently to meet higher levels of demand. By contrast, the logarithm of the Zillow Home Value Index is negative and statistically significant, implying that nonprofits operating in high-cost housing markets appear less efficient. This likely reflects the fact that elevated land, labor, and construction costs inflate spending relative to the number of homes built or families served.

5.2 | Further Analyses

In addition to our primary linear model examining the relationship between legislative attention and nonprofit efficiency, recognizing the punctuated and dynamic pattern of governmental attention identified in the broader public policy and political science literature (see e.g., Jennings and John 2009; Walgrave et al. 2017), we further explore whether legislative attention exerts any nonlinear effects at varying intensities. To investigate this possibility, we re-estimated Model 1 with the inclusion of a quadratic term for legislative attention, with the results reported in Table 3. The coefficient for the quadratic term is not statistically significant, indicating that our data do not support a nonlinear relationship between legislative attention and nonprofit efficiency.

Our study examines the relationship between state-level legislative attention—a macro-level factor—and nonprofit efficiency, a micro-level outcome, using a national sample of U.S. housing nonprofits. Recognizing this level difference, we explore intermediary mechanisms linking legislative attention to nonprofit efficiency. Drawing on relevant literature, we focus on two potential channels: government funding allocation and public attention. Regarding funding allocation, research indicates that government attention shapes funding decisions (Jones and Baumgartner 2005). When the government concentrates on specific issues, it signals to funding bodies that targeted investments are necessary. As a result, nonprofits may be motivated to improve efficiency, assuming governments may favor organizations with lower administrative costs in the grantmaking process (Ashley and Van Slyke 2012). As for public attention—which can be defined as the public's process of noticing, interpreting, and allocating resources to specific issues (Ocasio 2011)—prior research on agenda-setting and focusing events has shown that legislative dynamics are often reflected in and/or driven by public discourse (see e.g., Barberá et al. 2019; Bevan and Rasmussen 2020; Birkland 2007). In other words, when legislators prioritize a particular topic, it tends to

TABLE 3 | Exploration of nonlinear effects of legislative attention on nonprofit efficiency.

	Nonprofit efficiency
Variables of interest	
Legislative attention	0.853
	(1.053)
Legislative attention^2	−0.213
	(0.234)
State-level control variables	
Per capita income	1.438***
	(0.437)
Government size	−1.881***
	(0.594)
Government decentralization	0.329**
	(0.158)
Assisted housing occupation rate	0.183
	(0.481)
Average waiting time for admission	2.570**
	(1.139)
Percent households with low income	0.071
	(0.121)
NPO-level control variables	
Nonprofit age	−0.259
	(0.274)
Nonprofit size	4.334***
	(1.651)
Government grants contribution	2.690
	(6.497)
Revenue concentration (HHI)	11.964*
	(6.725)
GSA population category	2.232
	(2.369)
Zillow Home Value Index (log)	−1.695
	(6.001)
Constant	−319.704
	(150.258)
N	2334
BIC	20,344.25

Note: Standard errors are clustered by NPOs and in parentheses. Regressions include state and nonprofit fixed effects. The legislative attention variable has been standardized to ease interpretation.
*$p < 0.1$.
**$p < 0.05$.
***$p < 0.01$.

TABLE 4 | Mechanism analysis.

	Government funding allocation	Public attention
Variables of interest		
Legislative attention	−0.006	0.659***
	(0.004)	(0.096)
State-level control variables		
Per capita income	−0.025***	1.613***
	(0.002)	(0.055)
Government size	−0.004	0.306***
	(0.004)	(0.083)
Government decentralization	−0.003***	0.240***
	(0.001)	(0.017)
Assisted housing occupation rate	−0.003	0.569***
	(0.003)	(0.059)
Average waiting time for admission	−0.000	0.046***
	(0.001)	(0.016)
Percent households with low income	0.107***	0.543***
	(0.007)	(0.147)
Constant	−6.496***	−190.955***
	(0.710)	(15.550)
N	2337	2337
BIC	−2378.01	12,045.70

Note: Standard errors are in parentheses. Regressions include state fixed effects. Legislative attention variable has been standardized to ease interpretation. Coefficient for Average waiting time for admission is −0.0001768.
*$p < 0.1$.
**$p < 0.05$.
***$p < 0.01$.

spark media coverage and public attention, which may in turn increase public scrutiny of nonprofit operations and encourage greater efficiency.

Empirically, we operationalize government funding allocation at the state level as the percentage of spending on housing and community development relative to total spending, using data from the U.S. Census Annual Survey of State and Local Government Finances. To capture public attention, we draw on marketing and business studies (Huang et al. 2020) and use Google Trends (http://www.google.com/trends/), which aggregates and normalizes search queries by time and location to facilitate comparisons across terms, time points, and geographical areas. For instance, a value of 100 represents peak popularity, while a value of 50 indicates half that level. Following our approach for legal proceedings, we generate state-level Google Trends data from 2010 to 2016 using the following keywords and Boolean operators: "affordable housing" OR "low-income housing" OR "affordable home ownership" OR "Habitat for Humanity." We then estimate the relationships between legislative attention, government funding allocation, and public attention at the state level, with results reported in Table 4. Notably, government funding allocation is not significantly related to legislative attention, whereas public attention shows a statistically significant positive relationship. In other words, the positive relationship between legislative attention and nonprofit efficiency identified in our study may be channeled through increased public attention. That is, heightened public attention could potentially amplify public scrutiny of nonprofit operations, which in turn encourages them to pursue greater efficiency.

6 | Discussion

By examining the relationship between legislative attention and nonprofit efficiency, our study contributes to a macro–micro understanding of government–nonprofit relationships and extends the literature on government attention by linking dynamics in the policy process to cross-sector practices. In particular, our work makes four theoretical contributions. First, we conceptualize and operationalize legislative attention—an understudied aspect of government attention—demonstrating that the various forms of government attention (e.g., legislative, executive, judicial) can be distinct and operate through different mechanisms, especially in cross-sector contexts. Second, and more specifically, our analysis shows that dynamics in the broader political and policy processes can be reflected in and shape nonprofit operations and management at the micro-level, thus advancing an integrated framework of government–nonprofit interactions and enriching the literature on cross-sector interactions in public policy. Third, our findings support a complementary mode of interaction, whereby increased legislative attention enhances nonprofit efficiency. This suggests that the legislative process—through its agenda-setting and resource allocation functions—can positively affect nonprofit performance and that the impact of legislative attention is more pronounced among nonprofits receiving government grants, which highlights the moderating role of government support. Finally, we demonstrate that public attention—defined as the extent of public engagement with policy issues—can help channel the impact of legislative attention on nonprofit management and operations, thus offering a more holistic understanding of government–nonprofit interactions.

Alongside our theoretical contributions, our study also raises several practical considerations. First, it provides important implications for policymakers and nonprofit managers regarding designing and implementing collaborative performance management and boundary-crossing performance dialogues (Douglas and Ansell 2020). These approaches are essential for achieving sustainability and addressing "wicked" policy problems (Ansell and Gash 2018; Ba et al. 2024; Bianchi 2016), especially in light of the positive effect of legislative attention on nonprofit efficiency (H1) observed in our results. To this end, by highlighting cross-sector interactions and dynamics, our study also contributes to the evolving shift toward performance governance within the nonprofit sector, as well as the critical importance of efficient management in light of the recent political dynamics in many societies. Second, our findings underscore the importance for government officials and policymakers to leverage targeted government support to enhance nonprofit operational efficiency. In particular, the stronger positive correlation between legislative attention and nonprofit efficiency among nonprofits that receive government grants suggests that financial ties with the government amplify the impact of legislative focus on performance. This highlights a critical pathway for improving public service delivery and policy outcomes by strategically aligning government support with sectoral needs.

Lastly, it is useful to discuss several limitations of our study. First, our study endeavors to extend the existing literature by adding a less-studied construct of government attention (i.e., legislative attention). However, other important dimensions, such as bureaucratic/administrative attention, are regrettably omitted. Likewise, our focus on nonprofit efficiency might not be able to capture the missions and goals of nonprofits in service delivery, which are arguably more directly reflected in output-based variables such as houses rebuilt and repaired. Along this line, our measure of nonprofit efficiency using DEA scores, albeit effective, might not capture the full spectrum of nonprofit efficiency, as the usefulness of DEA scores hinges on the selected inputs and outputs and is sensitive to outliers. In this case, future studies are suggested to focus on alternative dependent variables to further explore the link between legislative attention and nonprofit management and operations. To this end, another key limitation of this study is that government grants in Form 990 are reported as an aggregate sum, encompassing federal, state, and local grants. As a result, we are unable to isolate the effects of state-level government grants on Habitat affiliates. While this limits our ability to directly assess state-level government attention, total government grants remain a meaningful proxy for overall government support. Future research could address this limitation by incorporating additional data sources or collecting primary data from affiliates to disaggregate grant funding by government level. Additionally, while this study incorporates state-level socioeconomic variables to contextualize our main independent variable—legislative attention at the state level—we acknowledge that more localized, community-level controls may provide additional explanatory power in understanding variation in nonprofit efficiency. Future research could thus benefit from integrating community-level socioeconomic indicators, as well as measures of housing availability and affordability, particularly when standardized, geographically specific datasets are available. Doing so would help us better understand how broader policy environments interact with local economic conditions.

Moreover, and as noted previously, our sample of HFH affiliates might limit the generalizability of our findings. While our selection of HFH affiliates was driven by sound reasons, including the ability to conduct a comparable and effective assessment of nonprofit efficiency, we acknowledge this limitation. Therefore, we recommend that future research expand the investigation scope to include a wider array of affordable housing organizations with diverse service-delivery models, as well as nonprofits in other domains—such as public health and arts and culture (see e.g., Altamimi and Liu 2022). Such studies would enhance the external validity of our findings and provide a more robust understanding of the relationship between government attention and nonprofit efficiency. Furthermore, due to limited data availability, we could not provide more nuanced causal inferences on the effect of legislative attention on nonprofit efficiency or completely rule out the risk of reverse causality or omitted variables. Future studies are thus encouraged to add to this line of research. For instance, should data availability permit, a valid instrumental variable that only affects nonprofit efficiency through legislative attention may help address the endogeneity issue and obtain unbiased estimates of the causal effect of legislative attention on nonprofit efficiency. To this end, while our further analysis did not reveal a complex, nonlinear relationship between legislative attention and nonprofit efficiency, nor were we able to examine its long-term impact, the possibility that its effects vary at different intensity levels or manifest over extended periods remains valid and likewise warrants further exploration.

Additionally, and perhaps more importantly, it is critical to recognize that our analysis is limited to state-level attention. However, in the realm of housing policies, local governments, such as county and municipal authorities, also play a role. For example, local regulations, like minimum lot sizes and single-family square footage requirements, can significantly impede the efforts of HFH affiliates in certain areas. Additionally, local business environments, including construction costs, as well as factors related to individual HFH affiliates' internal management, may further influence our results. However, our study is limited in its ability to capture these local nuances, particularly because some HFH affiliates operate across multiple jurisdictions. Therefore, we recommend that future research conduct a more in-depth analysis—either by assessing the effects of local government attention on nonprofit efficiency or by incorporating local dynamics into the analysis of state-level government attention—to yield a more detailed and comprehensive understanding of the interplay between policy environments and nonprofit operations and management.

7 | Conclusions

Government attention plays a crucial role in nonprofit management and nonprofit-government interactions. By applying an attention-based view, our study examines how legislative attention is linked to nonprofit efficiency and how government grants moderate this relationship. Focusing on the U.S. nonprofit housing sector, we utilize a longitudinal multi-level regression approach with data drawn from state-level legal proceedings and financial statements of a national sample of housing nonprofits. Our findings indicate a positive association between legislative attention and nonprofit efficiency, supporting a complementary model of nonprofit–government relations. Notably, this relationship is stronger among nonprofits that receive government grants, underscoring the importance of government support in enhancing responsiveness to legislative focus. Further analyses reveal no evidence of a nonlinear relationship between legislative attention and efficiency, while suggesting that public attention may help channel this effect. Overall, our study advances a macro–micro perspective on government–nonprofit interactions and extends the literature on government attention by linking policy process dynamics with practices across diverse sectors.

Conflicts of Interest

The authors declare no conflicts of interest.

Data Availability Statement

Data supporting the findings of this study were all publicly available at the time of submission.

Endnotes

[1] A possible exception is Yackee's (2006) work on inter-institutional attention although their focus is more on different branches within the U.S. federal government (i.e., Congress and the President).

[2] Ideally, more input variables, such as the number of volunteers, should be considered. However, the number of volunteers was not captured for some of the sampled years.

[3] Pennington et al. (2014). GloVe: Global Vectors for Word Representation.

[4] Rajaraman and Ullman (2011). "Data Mining" (PDF). Mining of Massive Datasets. pp. 1–17.

References

Alexander, J., J. L. Brudney, and K. Yang. 2010. "Introduction to the Symposium: Accountability and Performance Measurement: The Evolving Role of Nonprofits in the Hollow State." *Nonprofit and Voluntary Sector Quarterly* 39, no. 4: 565–570. https://doi.org/10.1177/0899764010369662.

Altamimi, H., and Q. Liu. 2022. "The Nonprofit Starvation Cycle: Does Overhead Spending Really Impact Program Outcomes?" *Nonprofit and Voluntary Sector Quarterly* 51, no. 6: 1324–1348. https://doi.org/10.1177/08997640211057404.

Andrews, M., T. Schank, and R. Upward. 2006. "Practical Fixed-Effects Estimation Methods for the Three-Way Error-Components Model." *Stata Journal* 6, no. 4: 461–481. https://doi.org/10.1177/1536867X0600600402.

Ansell, C., and A. Gash. 2018. "Collaborative Platforms as a Governance Strategy." *Journal of Public Administration Research and Theory* 28, no. 1: 16–32. https://doi.org/10.1093/jopart/mux030.

Ashley, S. R., and D. M. Van Slyke. 2012. "The Influence of Administrative Cost Ratios on State Government Grant Allocations to Nonprofits." *Public Administration Review* 72, no. S1: S47–S56. https://doi.org/10.1111/j.1540-6210.2012.02666.x.

Ba, Y., S. Nair, and M. Kedia. 2024. "Cross-Sector Collaboration, Nonprofit Readiness, and Sustainability Transitions." *Environmental Innovation and Societal Transitions* 53: 100933. https://doi.org/10.1016/j.eist.2024.100933.

Ba, Y., J. Berrett, and J. Coupet. 2021. "Panel Data Analysis: A Guide for Nonprofit Studies." *VOLUNTAS: International Journal of Voluntary and Nonprofit Organizations*. https://doi.org/10.1007/s11266-021-00342-w.

Baldwin, E. 2019. "Why and How Does Participatory Governance Affect Policy Outcomes? Theory and Evidence From the Electric Sector." *Journal of Public Administration Research and Theory*: muz033. https://doi.org/10.1093/jopart/muz033.

Barberá, P., R. Bonneau, A. Casas, et al. 2019. "Who Leads? Who Follows? Measuring Issue Attention and Agenda Setting by Legislators and the Mass Public Using Social Media Data." *American Political Science Review* 113, no. 4: 883–901. https://doi.org/10.1017/S0003055419000352.

Berrett, J. L., and C. Hung. 2023. "Does Revenue Concentration Really Bring Organizational Efficiency? Evidence From Habitat for Humanity." *Nonprofit and Voluntary Sector Quarterly*: 974–996. https://doi.org/10.1177/08997640231199469.

Bevan, S., and A. Rasmussen. 2020. "When Does Government Listen to the Public? Voluntary Associations and Dynamic Agenda Representation in the United States." *Policy Studies Journal* 48, no. 1: 111–132. https://doi.org/10.1111/psj.12231.

Bianchi, C. 2016. *Dynamic Performance Management*. Springer International Publishing. https://doi.org/10.1007/978-3-319-31845-5_2.

Birkland, T. A. 2007. "Agenda Setting in Public Policy." In *Handbook of Public Policy Analysis (D. H. Hill Jr. Library)*, edited by F. Fischer and G. Miller. Routledge. https://catalog.lib.ncsu.edu/catalog/NCSU1954913.

Boettke, P. J., L. Palagashvili, and E. E. Piano. 2017. "Federalism and the Police: An Applied Theory of Fiscal Attention." *Arizona State Law Journal* 49: 907.

Cairney, P. 2016. *The Politics of Evidence-Based Policy Making*. 1st ed. Palgrave Pivot. https://doi.org/10.1057/978-1-137-51781-4.

Charnes, A., W. W. Cooper, and E. Rhodes. 1978. "Measuring the Efficiency of Decision Making Units." *European Journal of Operational Research* 2, no. 6: 429–444. https://doi.org/10.1016/0377-2217(78)90138-8.

Cheng, Y. D. 2019. "Nonprofit Spending and Government Provision of Public Services: Testing Theories of Government–Nonprofit Relationships." *Journal of Public Administration Research and Theory* 29, no. 2: 238–254. https://doi.org/10.1093/jopart/muy054.

Cooper, W. W., L. M. Seiford, and J. Zhu, eds. 2011. *Handbook on Data Envelopment Analysis*. 2nd ed. Springer US. https://doi.org/10.1007/978-1-4419-6151-8.

Coupet, J. 2018. "Exploring the Link Between Government Funding and Efficiency in Nonprofit Colleges." *Nonprofit Management and Leadership* 29, no. 1: 65–81. https://doi.org/10.1002/nml.21309.

Coupet, J., and J. L. Berrett. 2019. "Toward a Valid Approach to Nonprofit Efficiency Measurement." *Nonprofit Management and Leadership* 29, no. 3: 299–320. https://doi.org/10.1002/nml.21336.

Coupet, J., and M. Schehl. 2021. "Government Grants, Donors, and Nonprofit Performance." *Journal of Public Administration Research and Theory*: muab022. https://doi.org/10.1093/jopart/muab022.

DeLeo, R. A., and A. Duarte. 2022. "Does Data Drive Policymaking? A Multiple Streams Perspective on the Relationship Between Indicators and Agenda Setting." *Policy Studies Journal* 50, no. 3: 701–724. https://doi.org/10.1111/psj.12419.

Dong, F., P. D. Mitchell, and J. Colquhoun. 2015. "Measuring Farm Sustainability Using Data Envelope Analysis With Principal Components: The Case of Wisconsin Cranberry." *Journal of Environmental Management* 147: 175–183. https://doi.org/10.1016/j.jenvman.2014.08.025.

Douglas, S., and C. Ansell. 2020. "Getting a Grip on the Performance of Collaborations: Examining Collaborative Performance Regimes and Collaborative Performance Summits." *Public Administration Review*. https://doi.org/10.1111/puar.13341.

Ellen, I. G., and B. Karfunkel. 2016. *Renting in America's Largest Metropolitan Areas*. NYU Furman Center/Capital One. https://wagner.nyu.edu/files/faculty/publications/NYU_Furman_Center_2016_Renting_in_Americas_Largest_Metropolitan_Areas.pdf.

Fan, Z., T. Christensen, and L. Ma. 2022. "Policy Attention and the Adoption of Public Sector Innovation." *Public Management Review* 25, no. 10. https://doi.org/10.1080/14719037.2022.2050283.

Froelich, K. A. 1999. "Diversification of Revenue Strategies: Evolving Resource Dependence in Nonprofit Organizations." *Nonprofit and Voluntary Sector Quarterly* 28, no. 3: 246–268. https://doi.org/10.1177/0899764099283002.

Fyall, R. 2016. "The Power of Nonprofits: Mechanisms for Nonprofit Policy Influence." *Public Administration Review* 76, no. 6: 938–948. https://doi.org/10.1111/puar.12550.

Fyall, R., and M. McGuire. 2015. "Advocating for Policy Change in Nonprofit Coalitions." *Nonprofit and Voluntary Sector Quarterly* 44, no. 6: 1274–1291. https://doi.org/10.1177/0899764014558931.

Gelman, A. 2006. "Multilevel (Hierarchical) Modeling: What It Can and Cannot Do." *Technometrics* 48, no. 3: 432–435. https://doi.org/10.1198/004017005000000661.

González-Torre, P., S. Lozano, and B. Adenso-Díaz. 2017. "Efficiency Analysis of the European Food Banks: Some Managerial Results." *Voluntas: International Journal of Voluntary and Nonprofit Organizations* 28, no. 2: 822–838. https://doi.org/10.1007/s11266-016-9814-0.

Grimmelikhuijsen, S., S. Jilke, A. L. Olsen, and L. Tummers. 2017. "Behavioral Public Administration: Combining Insights From Public Administration and Psychology." *Public Administration Review* 77, no. 1: 45–56. https://doi.org/10.1111/puar.12609.

Gromis, A., J. R. Hendrickson, and M. Desmond. 2022. "Eviction From Public Housing in the United States." *Cities* 127: 103749. https://doi.org/10.1016/j.cities.2022.103749.

Gronbjerg, K. A. 1991. "Managing Grants and Contracts: The Case of Four Nonprofit Social Service Organizations." *Nonprofit and Voluntary Sector Quarterly* 20, no. 1: 5–24. https://doi.org/10.1177/089976409102000103.

Guo, C., and G. D. Saxton. 2018. "Speaking and Being Heard: How Nonprofit Advocacy Organizations Gain Attention on Social Media." *Nonprofit and Voluntary Sector Quarterly* 47, no. 1: 5–26. https://doi.org/10.1177/0899764017713724.

Hager, M. A., T. Pollak, and P. Rooney. 2001. "Variations in Overhead and Fundraising Efficiency Measures: The Influence of Size, Age, and Subsector." Association for Research on Nonprofit Organizations and Voluntary Action, Miami, FL. https://archives.indianapolis.iu.edu/server/api/core/bitstreams/c13f44a1-c2ae-41ce-ae02-4675d96517e1/content.

Habitat for Humanity. 2021. *Annual Report 2021*. Habitat for Humanity. https://www.habitat.org/multimedia/memoria-2021-en/.

Huang, M. Y., R. R. Rojas, and P. D. Convery. 2020. "Forecasting Stock Market Movements Using Google Trend Searches." *Empirical Economics* 59, no. 6: 2821–2839. https://doi.org/10.1007/s00181-019-01725-1.

Isoaho, K., D. Gritsenko, and E. Mäkelä. 2021. "Topic Modeling and Text Analysis for Qualitative Policy Research." *Policy Studies Journal* 49, no. 1: 300–324. https://doi.org/10.1111/psj.12343.

Jennings, W., and P. John. 2009. "The Dynamics of Political Attention: Public Opinion and the Queen's Speech in the United Kingdom." *American Journal of Political Science* 53, no. 4: 838–854. https://doi.org/10.1111/j.1540-5907.2009.00404.x.

Jones, B. D., and F. R. Baumgartner. 2004. "Representation and Agenda Setting." *Policy Studies Journal* 32, no. 1: 1–24. https://doi.org/10.1111/j.0190-292X.2004.00050.x.

Jones, B. D., and F. R. Baumgartner. 2005. *The Politics of Attention: How Government Prioritizes Problems*. University of Chicago Press. https://press.uchicago.edu/ucp/books/book/chicago/P/bo3644482.html.

Kapucu, N. 2006. "Public-Nonprofit Partnerships for Collective Action in Dynamic Contexts of Emergencies." *Public Administration* 84, no. 1: 205–220. https://doi.org/10.1111/j.0033-3298.2006.00500.x.

Klüver, H. 2020. "Setting the Party Agenda: Interest Groups, Voters and Issue Attention." *British Journal of Political Science* 50, no. 3: 979–1000. https://doi.org/10.1017/S0007123418000078.

Knill, C., Y. Steinebach, and D. Zink. 2024. "How Policy Growth Affects Policy Implementation: Bureaucratic Overload and Policy Triage." *Journal of European Public Policy* 31, no. 2: 324–351. https://doi.org/10.1080/13501763.2022.2158208.

Lecy, J. D., and E. A. M. Searing. 2015. "Anatomy of the Nonprofit Starvation Cycle: An Analysis of Falling Overhead Ratios in the Nonprofit Sector." *Nonprofit and Voluntary Sector Quarterly* 44, no. 3: 539–563. https://doi.org/10.1177/0899764014527175.

Li, Q., P. G. Maggitti, K. G. Smith, P. E. Tesluk, and R. Katila. 2013. "Top Management Attention to Innovation: The Role of Search Selection and Intensity in New Product Introductions." *Academy of Management Journal* 56, no. 3: 893–916. https://doi.org/10.5465/amj.2010.0844.

Liu, G. 2017. "Government Decentralization and the Size of the Nonprofit Sector: Revisiting the Government Failure Theory." *American Review of Public Administration* 47, no. 6: 619–633. https://doi.org/10.1177/0275074016631643.

Ljubownikow, S., and J. Crotty. 2016. "Nonprofit Influence on Public Policy: Exploring Nonprofit Advocacy in Russia." *Nonprofit and Voluntary Sector Quarterly* 45, no. 2: 314–332. https://doi.org/10.1177/0899764015583121.

Lovett, J., S. Bevan, and F. R. Baumgartner. 2015. "Popular Presidents Can Affect Congressional Attention, for a Little While." *Policy Studies Journal* 43, no. 1: 22–43. https://doi.org/10.1111/psj.12087.

Lu, J. 2018. "Fear the Government? A Meta-Analysis of the Impact of Government Funding on Nonprofit Advocacy Engagement." *American Review of Public Administration* 48, no. 3: 203–218. https://doi.org/10.1177/0275074016680024.

Luxon, E. M. 2019. "What do Advocates Know About Policymaking? Revealing Process in the Advocacy Coalition Framework." *Journal of European Public Policy* 26, no. 1: 106–125. https://doi.org/10.1080/13501763.2017.1400088.

Lynn, L. E., Jr., C. J. Heinrich, and C. J. Hill. 2000. "Studying Governance and Public Management: Challenges and Prospects." *Journal of Public Administration Research and Theory* 10, no. 2: 233–262. https://doi.org/10.1093/oxfordjournals.jpart.a024269.

Malatesta, D., and C. R. Smith. 2011. "Resource Dependence, Alternative Supply Sources, and the Design of Formal Contracts." *Public Administration Review* 71, no. 4: 608–617. https://doi.org/10.1111/j.1540-6210.2011.02392.x.

Massaro, D. W., and N. Cowan. 1993. "Information Processing Models: Microscopes of the Mind." *Annual Review of Psychology* 44, no. 1: 383–425. https://doi.org/10.1146/annurev.ps.44.020193.002123.

Mendoza-Abarca, K. I., and D. Gras. 2019. "The Performance Effects of Pursuing a Diversification Strategy by Newly Founded Nonprofit Organizations." *Journal of Management* 45, no. 3: 984–1008. https://doi.org/10.1177/0149206316685854.

May, P. J., S. Workman, and B. D. Jones. 2008. "Organizing Attention: Responses of the Bureaucracy to Agenda Disruption." *Journal of Public Administration Research and Theory* 18, no. 4: 517–541. https://doi.org/10.1093/jopart/mun015.

Mitchell, G. E. 2018. "Modalities of Managerialism: The "Double Bind" of Normative and Instrumental Nonprofit Management Imperatives." *Administration & Society* 50, no. 7: 1037–1068. https://doi.org/10.1177/0095399716664832.

Mitchell, G. E., and T. D. Calabrese. 2020. "Instrumental Philanthropy." *Nonprofit Theory, and Information Costs* 11, no. 2. https://doi.org/10.1515/npf-2019-0050.

Mitchell, G. E., and T. D. Calabrese. 2023. "The Hidden Cost of Trustworthiness." *Nonprofit and Voluntary Sector Quarterly* 52, no. 2: 304–326. https://doi.org/10.1177/08997640221092794.

Mortensen, P. B. 2009. "Political Attention and Public Spending in the United States." *Policy Studies Journal* 37, no. 3: 435–455. https://doi.org/10.1111/j.1541-0072.2009.00322.x.

Ocasio, W. 2011. "Attention to Attention." *Organization Science* 22, no. 5: 1286–1296. https://doi.org/10.1287/orsc.1100.0602.

Oleszek, W. J., M. J. Oleszek, E. Rybicki, and B. Heniff. 2020. *Congressional Procedures and the Policy Process (1–0)*. CQ Press. https://doi.org/10.4135/9781506367514.

Pennington, J., R. Socher, and C. D. Manning. 2014. "Glove: Global Vectors for Word Representation." In *Proceedings of the 2014 Conference on Empirical Methods in Natural Language Processing (EMNLP)*, 1532–1543. Association for Computational Linguistics.

Peterson, H. L. 2018. "Political Information has Bright Colors: Narrative Attention Theory." *Policy Studies Journal* 46, no. 4: 828–842. https://doi.org/10.1111/psj.12272.

Pfeffer, J., and G. R. Salancik. 1978. *The External Control of Organizations: A Resource Dependence Perspective*. Stanford University Press.

Posner, M. I., and M. K. Rothbart. 2007. "Research on Attention Networks as a Model for the Integration of Psychological Science." *Annual Review of Psychology* 58, no. 1: 1–23. https://doi.org/10.1146/annurev.psych.58.110405.085516.

Ponomarenko, M. 2021. "Legislative Administration Public Law in the States Conference." *Wisconsin Law Review* 2021, no. 5: 1231–1256.

Prentice, C. R. 2015. "Why So Many Measures of Nonprofit Financial Performance? Analyzing and Improving the Use of Financial Measures in Nonprofit Research." *Nonprofit and Voluntary Sector Quarterly* 45, no. 4: 715–740. https://doi.org/10.1177/0899764015595722.

Quinn, K. M., B. L. Monroe, M. Colaresi, M. H. Crespin, and D. R. Radev. 2010. "How to Analyze Political Attention With Minimal Assumptions and Costs." *American Journal of Political Science* 54, no. 1: 209–228. https://doi.org/10.1111/j.1540-5907.2009.00427.x.

Rajaraman, A., and J. D. Ullman. 2011. *Mining of Massive Datasets*. Cambridge University Press.

Rubenstein, D. S. 2009. "Relative Checks: Towards Optimal Control of Administrative Power." *William and Mary Law Review* 51, no. 6: 2169–2242.

Russell Neuman, W., L. Guggenheim, S. Mo Jang, and S. Y. Bae. 2014. "The Dynamics of Public Attention: Agenda-Setting Theory Meets Big Data." *Journal of Communication* 64, no. 2: 193–214. https://doi.org/10.1111/jcom.12088.

Salamon, L. M. 1995. *Partners in Public Service: Government-Nonprofit Relations in the Modern Welfare State*. Johns Hopkins University Press.

Sanderson, I. 2002. "Evaluation, Policy Learning and Evidence-Based Policy Making." *Public Administration* 80, no. 1: 1–22.

Shi, Y., H. S. Jang, L. Keyes, and L. Dicke. 2020. "Nonprofit Service Continuity and Responses in the Pandemic: Disruptions, Ambiguity, Innovation, and Challenges." *Public Administration Review* 80, no. 5: 874–879. https://doi.org/10.1111/puar.13254.

Simon, H. A. 1947. *Administrative Behavior; a Study of Decision-Making Processes in Administrative Organization*, xvi, 259. Macmillan.

Smith, K. G., C. J. Collins, and K. D. Clark. 2005. "Existing Knowledge, Knowledge Creation Capability, and the Rate of New Product Introduction in High-Technology Firms." *Academy of Management Journal* 48, no. 2: 346–357. https://doi.org/10.5465/amj.2005.16928421.

Stinchcombe, A. L. 1965. "Social Structure and Organizations 1." In *Handbook of Organizations (RLE: Organizations)*. Routledge. https://www.taylorfrancis.com/chapters/edit/10.4324/9780203629130-5/social-structure-organizations-1-arthur-stinchcombe.

Subramanian, S. V. 2004. "The Relevance of Multilevel Statistical Methods for Identifying Causal Neighborhood Effects." *Social Science & Medicine* 58, no. 10: 1961–1967. https://doi.org/10.1016/S0277-9536(03)00415-5.

van Aelst, P., B. Maddens, J. Noppe, and S. Fiers. 2008. "Politicians in the News: Media or Party Logic?: Media Attention and Electoral Success in the Belgian Election Campaign of 2003." *European Journal of Communication* 23, no. 2: 193–210. https://doi.org/10.1177/0267323108089222.

Verschuere, B., and J. De Corte. 2015. "Nonprofit Advocacy Under a Third-Party Government Regime: Cooperation or Conflict?" *Voluntas: International Journal of Voluntary and Nonprofit Organizations* 26, no. 1: 222–241. https://doi.org/10.1007/s11266-013-9427-9.

Vogel, R., M. Göbel, M. Grewe-Salfeld, B. Herbert, Y. Matsuo, and C. Weber. 2022. "Cross-Sector Partnerships: Mapping the Field and Advancing an Institutional Approach." *International Journal of Management Reviews* 24, no. 3: 394–414. https://doi.org/10.1111/ijmr.12283.

Walgrave, S., A. E. Boydstun, R. Vliegenthart, and A. Hardy. 2017. "The Nonlinear Effect of Information on Political Attention: Media Storms and U.S. Congressional Hearings." *Political Communication* 34, no. 4: 548–570. https://doi.org/10.1080/10584609.2017.1289288.

Warren, W. H. 2006. "The Dynamics of Perception and Action." *Psychological Review* 113: 358–389. https://doi.org/10.1037/0033-295X.113.2.358.

Wei, W. 2020. "Fiscal Slack, Rule Constraints, and Government Corruption." *Public Administration Review* 82. https://doi.org/10.1111/puar.13299.

Williams, M. J. 2021. "Beyond State Capacity: Bureaucratic Performance, Policy Implementation and Reform." *Journal of Institutional Economics* 17, no. 2: 339–357. Cambridge Core. https://doi.org/10.1017/S1744137420000478.

Woon, J. 2009. "Issue Attention and Legislative Proposals in the U.S. Senate." *Legislative Studies Quarterly* 34, no. 1: 29–54. https://doi.org/10.3162/036298009787500367.

Workman, S., B. D. Jones, and A. E. Jochim. 2009. "Information Processing and Policy Dynamics." *Policy Studies Journal* 37, no. 1: 75–92. https://doi.org/10.1111/j.1541-0072.2008.00296.x.

Worth, M. J., S. Pandey, S. K. Pandey, and S. Qadummi. 2020. "Understanding Motivations of Mega-Gift Donors to Higher Education: A Qualitative Study." *Public Administration Review* 80, no. 2: 281–293. https://doi.org/10.1111/puar.13139.

Yackee, S. W. 2006. "Assessing Inter-Institutional Attention to and Influence on Government Regulations." *British Journal of Political Science* 36, no. 4: 723–744. https://doi.org/10.1017/S000712340600038X.

Young, D. R. 2000. "Alternative Models of Government-Nonprofit Sector Relations: Theoretical and International Perspectives." *Nonprofit and Voluntary Sector Quarterly* 29, no. 1: 149–172. https://doi.org/10.1177/0899764000291009.

Zuhlke, S. 2021. "Acres for the Affluent: An Interactive Model of Nonprofit Resources and Demand Heterogeneity." *Journal of Public Administration Research and Theory*: muab046. https://doi.org/10.1093/jopart/muab046.

Appendix A

Data and Variables

A.1. | Details of Input and Output Variables

Input	
Management expenses	Management and general expenditures (administrative expenses)
Program expenses	Program expenditures
Output	
New	Number of newly constructed houses
Recycled	Number of houses an affiliate has foreclosed on and made available to a new HFH homebuyer
Rehabilitated	Number of houses that were donated to HFH and turned around to a HFH homebuyer
Repaired	Number of houses that received an improvement such as a new roof

A.2. | NLP Analysis

Data processing steps

- Convert raw data from RTF format to plain text format for further processing. Group the texts based on the state and year.
- Utilize pretrained GloVe embeddings[3] to load word embeddings that have been pretrained by GloVe.
- Generate representations for grouped texts by calculating the weighted average of individual word embeddings. The weights for each word are determined by the TF-IDF score[4].
- Obtain a representation for keywords by averaging the GloVe embeddings associated with them.
- Compute the similarity metric, specifically cosine similarity, between the grouped text representations and the keyword representation. A higher metric indicates a stronger relevance of a grouped text to a keyword.
- Normalize the scores along the row dimensions to ensure statistical robustness and semantic balance.
  - L1 Normalization: the scores are divided by their absolute sums, after which they sum to 1.
  - L2 Normalization: L2 normalization involves dividing scores by their squared sums, after which their squared scores sum to 1.

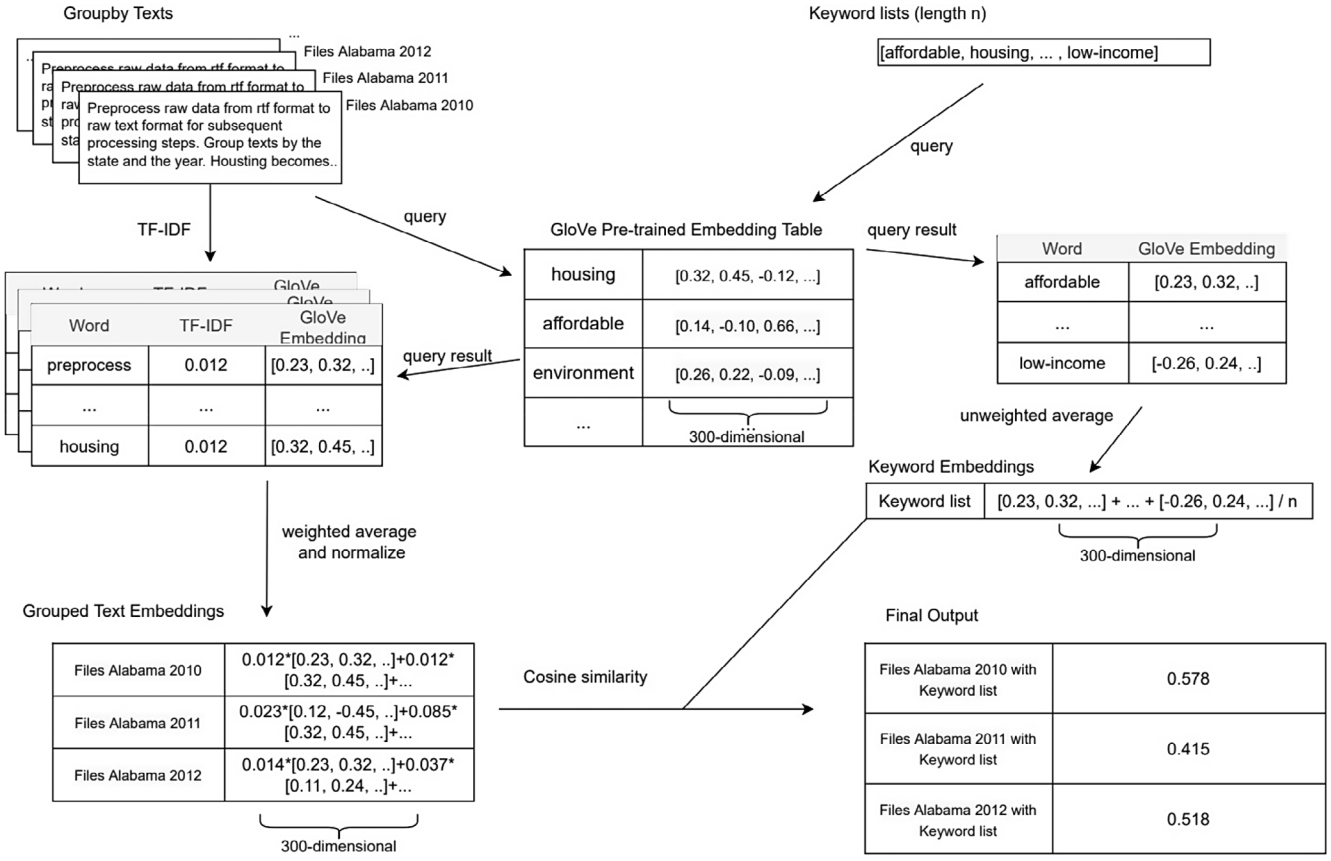

Illustration flowchart of legal proceeding scoring steps.

List of Keywords

Affordable housing	Low-cost homeownership
Low-income housing	Low-cost home
Affordable home ownership	Low-cost housing
Habitat for Humanity	Low-cost homeownership
Affordable homeownership	Housing assistance
Affordable homes	Housing subsidy
Affordable houses	Subsidized housing
Affordable mortgage	Housing affordability
Low-income homes	Housing policy
Low-income house	Affordable housing development
Low-income homeownership	Sustainable affordable housing
Low-income homes	Nonprofit affordable housing developers
Low-income house	Neighborhood Homes Investment Act
Low-income homeownership	Restoring Communities Left Behind Act
Habitat International	The HOME Act
Housing access	Build Back Better Act
Affordable housing access	National infrastructure package
Affordable home access	Emergency mortgage payment assistance for low-income homeowners
Equitable housing	U.S. fair housing initiative

Affordable housing	Low-cost homeownership
Low-cost home	Low-income housing tax credit
Low-cost housing	Community Reinvestment Act

A.3. | Results

A.3.1. | Regression Results Without Standardizing Legislative Attention

	Nonprofit efficiency		
	Model 1	Model 2 (with government funding)	Model 3 (without government funding)
Variables of interest			
Legislative attention	30.910**	45.171**	21.591
	(13.874)	(19.260)	(20.796)
State-level control variables			
Per capita income	1.459***	1.070	1.679**
	(0.437)	(0.765)	(0.732)
Government size	−1.853***	−2.905***	−0.954
	(0.595)	(1.018)	(0.922)
Government decentralization	0.355**	0.435**	0.382
	(0.149)	(0.172)	(0.280)
Assisted housing occupation rate	0.239	−0.375	0.276
	(0.492)	(0.762)	(0.719)
Average waiting time for admission	0.075	0.0101	−0.003
	(0.121)	(0.202)	(0.168)
Percent of households with low income	2.541**	4.351**	3.379**
	(1.136)	(1.719)	(1.717)
NPO-level control variables			
Nonprofit age	−0.268	0.779	0.270
	(0.268)	(1.040)	(0.948)
Nonprofit size	4.402***	1.070	4.821*
	(1.653)	(2.547)	(2.469)
Government grants contribution	2.413	8.393	—
	(6.492)	(7.695)	—
Revenue concentration (HHI)	11.785*	10.204	16.762*
	(6.721)	(10.895)	(9.884)
GSA population category	2.077	16.302***	1.424
	(2.326)	(2.355)	(3.038)
Zillow Home Value Index (log)	−2.154	−16.593**	4.713
	(5.980)	(7.716)	(10.682)
Constant	−330.950**	−242.468	−567.009**
	(−150.251)	(222.339)	(242.962)
N	2334	1015	1319
BIC	20,337.96	8609.21	11,457.16

Note: Standard errors are clustered by NPOs and in parentheses. Regressions include state and nonprofit fixed effects. Government grants contribution omitted because of collinearity. *$p < 0.1$. **$p < 0.05$. ***$p < 0.01$.

A.3.2. | Regression Results With the Interaction Term Between Legislative Attention and Receiving Government Grants

	Nonprofit efficiency
Variables of interest	
Legislative attention	13.774 (18.112)
Without government grants	0 (.)
With government grants	−11.497* (6.228)
Without government grants × Legislative attention	0 (.)
With government grants × Legislative attention	41.129* (23.858)
State-level control variables	
Per capita income	1.422*** (0.439)
Government size	−1.842*** (0.591)
Government decentralization	0.352** (0.150)
Assisted housing occupation rate	0.240 (0.490)
Average waiting time for admission	2.693** (1.131)
Percent of households with low income	0.082 (0.122)
NPO-level control variables	
Nonprofit age	−0.223 (0.261)
Nonprofit size	4.500*** (1.662)
Revenue concentration (HHI)	11.165* (6.701)
GSA population category	2.426 (2.312)
Zillow Home Value Index (log)	−2.087 (5.974)
Constant	−342.691** (149.821)
N	2334
BIC	20,341.18

Note: Standard errors are clustered by NPOs and in parentheses. Regressions include state and nonprofit fixed effects. The legislative attention variable has been standardized to ease interpretation. *$p < 0.1$. **$p < 0.05$. ***$p < 0.01$.