No Safe Harbor: Eviction Filing in Public Housing

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ABSTRACT Using the records of hundreds of thousands of court cases filed across the United States between 2010 and 2016, we assess whether residence in public housing reduces the risk of facing an eviction filing. Comparing with similar sets of private market renters, we demonstrate that those living in public housing face equal risk. Once filed against, public housing residents face a far higher risk of serial eviction filing. Within states, public and private market serial eviction filing rates are strongly correlated—evidence that public housing property managers respond to local eviction policies in ways that resemble their private market counterparts. We report on in-depth interviews with property managers from two housing authorities in Ohio. Property managers use the courts to facilitate rent collection in jurisdictions that enable the practice, but doing so does not necessarily result in better outcomes on evaluations conducted by the Department of Housing and Urban Development.

INTRODUCTION

Public housing offers a critical respite from the rising costs and insecurity of the private rental housing market for nearly 1 million American households (US Department of Housing and Urban Development [HUD] 2022).

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Affordability represents the most basic protection: whereas the majority of low-income renters in the United States spend more than half their income on housing (JCHS 2022), rent for public housing residents is capped at 30 percent of household income. Tenants in subsidized properties also benefit from a range of legal rights that defend against discrimination, formalize the landlord-tenant dispute process, and may protect renters from the risk of eviction (Preston and Reina 2021). Indeed, previous research finds that residence in public housing, compared with the unsubsidized private market, is associated with reduced risk of eviction (Lundberg et al. 2021; Preston and Reina 2021).

Still, public housing authorities (PHAs) account for a disproportionately large share of eviction cases (Gromis, Hendrickson, and Desmond 2022). In an era of reduced budgets and declining confidence in public housing (Goetz 2011), PHAs face intense pressure to meet rent collection and operations benchmarks (Lead the Way 2015). Just as private market landlords routinely wield the threat of removal as a means of disciplining tenants and collecting rent (Garboden and Rosen 2019; Rosen and Garboden 2022), eviction filings remain a common event in public housing, especially among a subset of residents who experience regular difficulty making rent (Lundberg et al. 2021).

In this article, we explore public housing residents' risk of eviction filing. Whereas previous studies have focused on single markets or relied on tenant self-reports (Harrison et al. 2021; Preston and Reina 2021; Lundberg et al. 2021), we use the records of hundreds of thousands of eviction cases filed across the United States between 2010 and 2016 to assess the prevalence of both eviction filing and serial eviction filing (repeated cases brought against the same tenants at the same address; Garboden and Rosen 2019; Immergluck et al. 2019). Comparing with the most similar possible sets of renters in the private market, we demonstrate that those living in public housing—despite paying much lower rents—face the equal risk of being filed against for eviction. Once filed against, PHA residents face a far higher risk of serial eviction filing than those living in private market housing. Among public housing residents in our study who were filed against for eviction, nearly half (46.8 percent) were filed against repeatedly at the same address, compared with less than one-third (28.4 percent) of those living outside of PHAs.

Serial eviction filing patterns are influenced by local legal regimes and property management norms (Leung, Hepburn, and Desmond 2021). Examining

when and why PHAs file serially allows us to understand the ways in which public operators are responsive to the same pressures and incentives as private market housing providers. We analyze the correlates of PHA serial eviction filing rates, finding that rates are higher in PHAs with higher shares of Black residents and lower in smaller PHAs and those with more seniors (residents 62 and older). PHA and private market serial eviction filing rates within the same state are strongly correlated, evidence that public housing property managers respond to local legal and regulatory structures underlying the eviction process in ways that closely resemble their private market counterparts. We also show that variations in serial eviction filing rates among developments within the same PHA are smaller than those among PHAs, signaling that shared institutional strategies and policies shape use of landlord-tenant courts.

To better understand what these policies are and how they influence eviction filing practices, we conducted in-depth interviews with two housing authorities in Ohio with vastly different serial eviction filing patterns: the Cuyahoga Metropolitan Housing Authority (CMHA) and Akron Metropolitan Housing Authority (AMHA). Although managers in both PHAs emphasize the importance of meeting rent collection metrics, that imperative shapes interactions with residents in different ways. CMHA works with tenants even after a court eviction filing has been initiated, offering payment plans for tenants to stay and repay back rent. That strategy, combined with court intervention, means that eviction filings often serve more as a rent collection tactic than a tool of displacement. By contrast, property managers at AMHA understand eviction filing as a last resort and are more likely to see it through to removal. This strategy is facilitated by stricter rent collection policies, including a requirement that tenants submit full back rent to settle an eviction filing.

Our findings belie the distinctions that scholars often draw between rental housing management practices in the public and private markets. Although PHAs confer meaningful benefits to their residents, particularly in terms of affordability, they operate using many of the same property management strategies and techniques, including serial eviction filing, that are common in the private market (Kleit and Page 2015; Rosen and Garboden 2022). Just as in private market housing, serial eviction filings increase rental cost burden by imposing fines and fees and restrict tenants' future housing options by leaving them with extensive eviction records (Garboden and Rosen 2019; Leung et al. 2021). The costs are borne by public housing residents

with limited resources and highly restricted options on the private market (Popkin, Cunningham, and Burt 2005). These filings fundamentally undermine the promise of public housing, exposing residents to previously underappreciated levels of housing instability.

EVICTIONS AND SUBSIDIZED HOUSING

Every year, 3.6 million eviction cases are filed across the United States, equivalent to seven cases filed every minute (Gromis, Fellows, et al. 2022). Black and Latinx renters, women of color, and families with children face a disproportionate share of eviction filings and eviction judgments (Desmond and Gershenson 2017; Hepburn, Louis, and Desmond 2020). Neighborhoods with high poverty rates and with high shares of Black residents tend to have the highest eviction rates (Goodspeed, Benton, and Slugg 2021; Lens et al. 2020).

As policy makers look to address eviction and its disparate impact, a growing body of research explores the potential protective effects of subsidized housing programs (Ellen, Lochhead, and O'Regan 2022; Gromis, Hendrickson, et al. 2022; Harrison et al. 2021; Lundberg et al. 2021; Preston and Reina 2021). Roughly 8.6 million units received some form of housing subsidy from the federal government in 2019. The majority of this assistance was through the low-income housing tax credit (LIHTC) program, housing choice vouchers (HCVs), project-based rental assistance programs (e.g., Section 8), and public housing (Schwartz 2021, 8). This assistance was provided to renters at high risk of eviction: people of color, those with low incomes, and female-headed households. Do these programs, either as a function of increased rental affordability or enhanced tenant protections, result in lower eviction rates?

We explore this question in the context of public housing, the ownership and management of which plausibly offer the most protection from the threat of eviction (Preston and Reina 2021). LIHTC, for example, limits its maximum allowable rent as a function of area median income but not with reference to household income. By contrast, HCV, project-based Section 8, and public housing provide greater affordability by capping tenants' contribution to rent at 30 percent of household income and allowing for recertification as incomes shift. Because they are publicly owned, PHA units are also considered the most permanently affordable. Whereas the project-based Section 8 and HCV programs rely on private housing

providers to manage units, PHAs remain public entities and are governed by minimum standards established by HUD for any adverse action that may result in an eviction.

Once the largest housing subsidy program, the public housing program has declined in scale over the last 4 decades. There were more than 1.4 million units of public housing in 1994 but under a million by 2019 (Schwartz 2021).[1] This loss of permanently affordable housing units both reflects and exacerbates the unique and public pressures PHAs face as housing providers. PHAs' mismanagement and challenges in meeting operating costs have long been scrutinized, and large-scale failures have fed popular narratives of distressed public housing system-wide (Schwartz 2021; Vale 2000; Goetz 2011). Concerns over cost-effectiveness and the broader turn in federal policies toward market-based solutions have pressured PHAs to downsize their public housing programs (Goetz 2011; Kleit and Page 2015).

Rent collection is critical to PHAs, both to shore up budgets and as a signal of efficiency. The imperative of rent collection, however, can conflict with PHAs' role as service providers (Kleit and Page 2015). Public housing, by design, serves a population that faces disproportionate risk of eviction (Popkin et al. 2005). The average annual household income for a family living in public housing is $16,398 (HUD 2022). Among those living in public housing, 43 percent are Black and 32 percent of families are female-headed with children, all characteristics that have been associated with heightened risk of eviction (Desmond et al. 2013; Desmond and Gershenson 2017; HUD 2022). Even with rent capped at 30 percent of household income, families living in public housing struggle to pay (Lundberg et al. 2021).

Previous research on eviction from subsidized housing—and public housing in particular—paints a mixed picture. Lundberg and colleagues (2021), using data from the Fragile Families Study, find that households in public housing have lower risk of eviction than comparable families without housing assistance. Analyzing administrative data from Philadelphia, Preston and Reina (2021) find that tenants in public housing and project-based rental assistance properties were less likely than unassisted households to receive eviction filings. On the other hand, property-level analysis of metropolitan Atlanta's multifamily buildings shows that the risk of eviction is reduced in subsidized senior housing but not in other forms of subsidized

1. A significant share of lost PHA units has been transitioned to other forms of place-based HUD subsidy (e.g., through the Rental Assistance Demonstration program).

housing (Harrison et al. 2021). Eviction filing rates from public housing in New York State are routinely higher than in comparable private rental housing (Ellen et al. 2022). Recent analyses conducted across metropolitan areas demonstrate that PHAs account for a disproportionately large share of eviction filings but do not consider individual- or neighborhood-level risk factors that might explain the discrepancy (Gromis, Hendrickson, et al. 2022).

We build on this literature in three ways. First, expanding on work by Gromis, Hendrickson, and colleagues (2022), we provide estimates of the risk of being filed against for eviction in private market housing and public housing that extend across multiple jurisdictions and hundreds of PHAs. In so doing, we attempt to make a comparison of similar housing markets that is as direct as possible, restricted only to neighborhoods in which PHAs operate and controlling for the sociodemographic and housing characteristics of those spaces. Because we cannot control for selection into public housing and the individual characteristics of residents, we do not address the causal question of whether living in public housing reduces a given household's risk of being filed against, a subject that has motivated previous research (Lundberg et al. 2021). Rather, we describe differences in eviction filing rates in private market and public housing in otherwise-comparable neighborhoods across a large swath of the United States.

Second, we interrogate how PHAs employ the eviction process as a property management technique. Specifically, we turn to serial eviction filings to better understand how different management styles and policies across housing authorities shape eviction patterns. Serial eviction filings occur when a property manager or landlord files to evict the same household repeatedly from the same address (Garboden and Rosen 2019; Immergluck et al. 2019). Understanding eviction requires looking beyond discrete moments of displacement to the processes and negotiations that led up to it. Rather than removal of tenants, private landlords have been found to use the threat of eviction—an eviction filing at the court—to collect rent and additional fees (Leung et al. 2021). Investigating serial eviction filings allows us to understand how that threat is used within broader rent collection and management processes, by PHAs as well as in private market housing.

Third, we explore heterogeneity within and among public housing authorities. Public housing is often treated as a uniform category when, in fact, it is remarkably diverse, both in terms of scale and operational tactics. Nearly 3,000 PHAs currently maintain public housing nationwide, varying widely in operation size and management approaches (Schwartz 2021).

This heterogeneity in management across PHAs may also lead to different eviction filing patterns, both among PHAs and—for larger housing authorities—across developments within the same PHA (Gromis, Hendrickson, et al. 2022). Recognizing these differences allows us to explore the practices and policies that are associated with more or less aggressive use of the eviction process. We are particularly interested in variation within PHAs. Historically, PHAs centralized operations in such a way that individual developments were granted relatively little managerial and financial flexibility. In the 2000s, HUD began moving toward a property-based accounting and management system designed to allow for greater independence for developments (Schwartz 2021; Stockard et al. 2003). It is unclear, however, whether this change resulted in variation in eviction patterns among developments or if rates are relatively uniform within PHAs (Ellen et al. 2022).

DATA AND METHODS

QUANTITATIVE ANALYSIS

Analyzing hundreds of thousands of eviction court records, we address four questions. First, are residents of public housing filed against for eviction more or less often than tenants living in private market housing? Second, conditional on being filed against, are residents of public housing at greater or lesser risk of being filed against serially than those in the private market? Third, what are the characteristics of PHAs with lower or higher serial eviction filing rates? Fourth, do we see more variation in serial eviction filing rates among PHAs or in particular developments within the same authority?

We focus on public housing for two reasons. First, although public housing has the potential to offer the greatest protection of any subsidized housing program, previous research has yielded conflicting and incomplete evidence regarding its efficacy in doing so. We expand on this research by including multiple geographies, providing a clear comparison between private and public rental markets, and expanding the scope of analysis to highlight serial eviction filings. The latter is particularly important, as it provides new insight into property management techniques used across markets and the punitive turn in PHA management. Second, despite their shrinking supply of units, housing authorities remain a major provider of affordable housing. Public housing is the source of more than 1 in every 10 subsidized housing units in the United States (Schwartz 2021). PHAs are among the largest single landlords in many markets, often contributing to a large number of

evictions (Rutan and Desmond 2021). This concentration of ownership and evictions—coupled with public accountability—means that interventions aimed at PHAs could be extremely effective in driving down eviction filing rates.

To address our questions, we analyzed eviction filings between 2010 and 2016 across 956 counties in 29 states, covering roughly one-third of US renter households.[2] Eviction records include court-assigned case numbers, names of plaintiffs (landlords, property managers, or their agents) and defendants (tenants), defendant addresses, and filing dates. We cleaned these records, removed duplicate and commercial eviction cases, geocoded, and validated records against publicly available data sources published by county- and state-court systems (Desmond et al. 2018). The resulting data set constitutes a purposive sample of counties in which externally validated eviction court records were available across at least 3 consecutive years between 2010 and 2016.[3] Because the sample was not randomly selected, results pertain strictly to the counties under analysis for the given set of years and should not be generalized to the full United States.

In total, we observed the records of filings against 905,611 households across our sample ("household" defined as an individual or group of individuals sharing an address). Because we could not track households across addresses, those that moved and were filed against for eviction again would be identified as a new household. We identified serial eviction filings in the data using case numbers, tenant names, and tenant addresses, linking distinct cases that shared the same (standardized) defendant names and addresses.[4]

2. The states included in our data are Alabama, Arizona, California, Colorado, Connecticut, Delaware, Florida, Georgia, Illinois, Indiana, Iowa, Kansas, Kentucky, Maryland, Massachusetts, Michigan, Minnesota, Missouri, Nebraska, New Mexico, North Carolina, Ohio, Oregon, South Carolina, Texas, Utah, Virginia, Washington, and Wisconsin. Notably, the data do not include New York State and the five-county New York City region. As such, our analysis necessarily excludes the New York City Housing Authority, far and away the largest PHA in the United States. For analysis of eviction patterns in subsidized housing in New York, see Ellen et al. (2022).

3. If a county has more than 3 consecutive years of valid records, we analyze only the most recent 3-year period. For example, if the county has validated data between 2011 and 2016, we would focus analysis on 2014–16 and consider 2015 the "focal year." We use a 3-year window to catch serial filings that span more than 1 calendar year.

4. We established a protocol using the Levenshtein distance, a measure of edits required for two strings to match, to compare defendant names sharing the same street address within and among case numbers. A threshold of two or fewer edits, depending on the fields matched, was used to determine whether two versions of the defendant names match (Desmond et al. 2018).

We structured the data so that a household appears in the data once, regardless of how many times they were filed against, with a binary variable indicating whether they were subject to serial filings.

Direct comparison of eviction filing patterns between private market housing and public housing is complicated by selection issues: residents of public housing are more likely than the general public to share a number of economic and sociodemographic characteristics that put them at increased risk of eviction (Desmond and Gershenson 2017). We lack access to household-level data that would allow us to control systematically for these factors.

Instead, building on previous research in this field (Harrison et al. 2021; Preston and Reina 2021), we test whether there are differences in eviction filing rates between private market housing and public housing that are robust to controls on neighborhood characteristics. In other words, what is the effect of a unit being public housing on the risk of an eviction filing—or serial eviction filing—taking place in that unit? We can control for the characteristics of the places in which residents live using data from the American Community Survey (ACS), but doing so across a broad array of neighborhoods—many of which have no public housing—raises concerns about generalizability and common support. Put another way, comparing eviction filing rates from public housing in an inner-city neighborhood with private market housing in a suburban community is an apples-to-oranges comparison. We addressed these concerns by following an approach employed as a sensitivity analysis by Preston and Reina (2021), limiting our analysis only to census tracts that were home to at least one public housing unit, as reported in the Picture of Subsidized Households data (POSH; HUD 2022). In so doing, we shrank our sample to 258,556 households in 623 counties across 28 states.[5]

In table 1, we display the sociodemographic and housing market characteristics of the neighborhoods (census tracts) included in this sample. In doing so, we draw on data from the 2012–16 ACS and the 2012–15 POSH. The first column describes the characteristics of all residents in the 623 counties in the sample. The second column provides the same information but just for the 4,898 tracts that had at least one unit of public housing (24.8 percent of the total tracts in these counties). In the bottom

5. We lose data from the state of California at this stage.

TABLE 1. Characteristics of Sampled Areas

	Full Counties	Tracts with Public Housing
ACS (full population):		
Median rent ($)	967	808
Median household income ($)	39,220	29,975
Poverty rate (%)	12.9	18.8
% renter occupied	37.8	46.7
Rental vacancy rate (%)	7.3	7.2
Unemployment rate (%)	7.7	9.7
% Black	17.0	23.3
% Latinx	13.1	13.5
% white	63.1	56.5
% female-headed renter HH	36.2	44.8
% renter HH with children	35.5	34.7
% renter with ≥ college education	24.2	18.3
POSH (public housing only):		
Rent ($)		268
HH income ($)		12,977
% Black		50.3
% white		38.7
% female-headed renter HH		76.1
Tracts	19,727	4,898
Counties	623	623

Note.—ACS = American Community Survey; HH = household; POSH = Picture of Subsidized Housing.

panel, we use POSH data to describe the characteristics of public housing residents across tracts included in our sample.

Relative to the broader counties in which they were located, the tracts in our sample had higher poverty and unemployment rates and were home to relatively more Black and Latinx residents. In the tracts with public housing, a larger share of housing units was renter occupied; rents were, on average, lower; and renter household income was considerably lower ($29,975 for in-sample tracts vs. $39,220 in the full counties). More renter household heads were women, and fewer had a college degree or more. Still, even within these tracts with public housing, PHA residents were relatively disadvantaged: average household incomes were lower, larger shares of residents were Black, and the large majority of households were headed by women. Average rents for public housing residents were extremely low, at only $268 per month.

HUD provided us with a listing of the addresses of all public housing buildings and units operating between 2000 and 2016. These data also contained the formal names of PHAs and their developments, which may be listed as plaintiffs on an eviction record. Following Gromis, Hendrickson, and colleagues (2022), we identified eviction cases originating from public

housing and, where possible, assigned them to specific PHAs and developments.[6] Within our restricted sample of households facing eviction, we found that 25,772 (10.0 percent) lived in public housing.

Risk of Eviction and Serial Eviction Filing in Public Housing and the Private Market

Answering our first question involved estimating disparities in eviction filing risk from public and private market housing. To do so, we fit a three-level, varying-intercept linear probability regression model in which we predicted the risk of eviction filing on the basis of housing type (private market vs. public). The primary unit of analysis was the household. We identified all households that were filed against while living in public housing and marked all others as living in private market housing. Note that in drawing this distinction, we included those with housing subsidized through other programs (e.g., HCV, LIHTC)—subsidies that we were unable to observe—within the "private market housing" category. To account for the population of households that were not filed against, we used 5-year ACS estimates from 2012–16 to determine the total number of occupied rental housing units in each tract and POSH data to calculate the number of occupied public housing units in the tract.[7] We subtracted the latter from the former to calculate the number of private market that occupied rental units. In both the private market and public housing, we subtracted the number of filed-against households from the total number of occupied rental housing units to determine the count of not-filed-against households. We restructured the data to include one line per household, with indicators for each household of whether (1) they lived in public housing or private market housing and (2) they had been filed against for eviction.

6. Several previous analyses of eviction from subsidized properties have used data from the National Housing Preservation Database (NHPD) to identify subsidized properties (Harrison et al. 2021; Preston and Reina 2021). These data, however, only include one address per property, even if a property consists of multiple buildings. As the NHPD notes in their documentation, this omission can lead to undercounting, particularly for public housing developments (NHPD 2021). Data from HUD allow for identification of a more complete universe.

7. POSH reports the total number of public housing units and the occupancy rate. We multiplied the former by the latter to estimate the total number of occupied units. Data were missing for 431 tracts; we substituted the median occupancy rate across the sample (97 percent) in these cases. We use POSH matched to the focal year for the given tract; see note 3 above.

We fit a regression model that predicted the likelihood of eviction filing as a function of public housing residence and a range of sociodemographic, housing market, and regulatory characteristics of the tracts and counties in which these households lived. The inclusion of these covariates is intended to control for variation in eviction risk among neighborhoods and jurisdictions, allowing us to isolate the key parameter of interest: the difference in eviction risk between public and private market housing. Formally, the series of nested models can be written as

$$Y_{ijk} = \pi_{0jk} + \pi_{1jk}\text{PHA}_{ijk} + e_{ijk}, \quad (1)$$

$$\pi_{0jk} = \beta_{00j} + \beta_{0mk}X_{mjk} + r_{0jk}, \text{ and} \quad (2)$$

$$\beta_{00j} = \gamma_{000} + \gamma_{001}Z_{nk} + u_{00k}. \quad (3)$$

The dependent variable Y_{ijk} is a binary indicator of whether household i in census tract j within county k was filed against for eviction. The only predictor at level 1 (eq. [1]) was the binary indicator of whether the household lived in public housing (PHA_{ijk}). We allowed for random variation on the intercept term (π_{0jk}), adding a vector of m neighborhood-level predictors (X_{mjk}; $m = 19$) in equation (2) to control for differences across neighborhoods in the likelihood that households were filed against. These covariates, primarily drawn from the 2012–16 ACS, included a set of sociodemographic and housing market characteristics that have been associated with eviction filing rates in previous analyses (Desmond and Gershenson 2017; Goodspeed et al. 2021): tract racial majority (if any),[8] rental vacancy rate, percentage of female-headed renter households, percentage of renter households with children, percentage of renting households whose householder has a bachelor's degree or more, percentage of working adults in the tract employed in the service sector, percentage of working-age adults who are unemployed or out of the labor market, tract median rent,[9] and the percentage of households in the tract that rent their homes. Using POSH data,

8. This categorical variable is coded white, Black, Latinx, or other/none, with the latter used as the reference category.

9. The bin ranges are $600 or less, $601–$800, $801–$1,000, $1,001–$1,200, $1,201–$1,400, $1,401–$1,600, $1,601–$1,800, $1,801–$2,000, and $2,001 or more. For reference, the average across our sample is a median rent of $751. Because it is strongly correlated with median rent—and because we believe rent is a more proximate predictor of serial filing—we omit median household income from the model.

we also controlled for the share of HUD-subsidized units in the tract.[10] We again allowed for random variation in the intercept (β_{00j}), which we modeled in equation (3) as a function of n legal and regulatory characteristics of the landlord-tenant process in county k (the vector Z_{nk}; $n = 6$): the filing fee that landlords must pay to initiate a court-ordered eviction case,[11] the number of courts in the county that heard eviction cases, the average time between filing and judgment in the county, a binary indicator of whether there were requirements for either defendant or plaintiff to hire attorneys, a binary indicator of whether the court automatically scheduled a hearing upon receiving an eviction filing, and a binary indicator of whether landlords have to notify tenants of late rent and allow for a set number of days to accept payments. Each of these variables represents a regulatory or legal barrier that slows the process and makes it more expensive for landlords to pursue eviction (Leung et al. 2021). In calculating model parameters, we clustered standard errors by state.

However, eviction filings are not just the outcome of missed rent payments or tenant behavior but also reflective of management practices. To explore further, we turn to *serial* eviction filings in our second question. We fit a nearly identical set of multilevel linear probability regression models, in this case predicting whether a household was filed against repeatedly at the same address. In these models, we restricted the analysis to those households that were ever filed against, again nesting them within census tracts, which were in turn nested within counties. The basic structure of these models follows the same format as equations (1) through (3) above. The dependent variable was the binary indicator of serial eviction filing, and we included the same set of tract- and county-level covariates described above (following eqs. [2] and [3]). We again clustered standard errors by state.

The primary difference in these models is that we were able to include two additional household-level covariates as predictors: an indicator of whether any listed defendant in the household was Black and an indicator of whether all listed defendants in the household were female. These data

10. We tallied the number of housing units under project-based Section 8 or HCV programs as well as the number of public housing units. The denominator for this rate was the total number of rental housing units in the tract.

11. We collected data on filing fees from 3,118 counties and county equivalents across the United States. If we were not able to find filing fee data for the county, we substituted the state average filing fee. In the model, we included the natural logarithm of the filing fee rather than the absolute dollar figure.

allow us to control for the possibility that Black or female-headed households are at greater risk for serial eviction, and that some of the public-private difference in serial eviction risk was driven by selection on these characteristics. To create these variables, we used defendants' names and addresses from eviction records to impute gender and race or ethnicity, demographic characteristics that are not included in the court records themselves (Hepburn et al. 2020; Thomas et al. 2019). To impute gender, we drew on defendants' first names to produce three predictions using the *gender* package in R (Mullen 2021), the *genderizeR* package in R (Wais 2016), and Gender-API.com (Gender API 2022). Each method estimated the probability that the provided name was female (zero to one) or male (the inverse). We averaged the probabilities provided across the three methods. To impute race or ethnicity, we used the *wru* package in R. The procedure drew on defendants' surnames and the demographic characteristics of their census tract to assign probabilities (summing to one) that they were white, Black, Latinx, Asian, or some other race or ethnicity. We coded binary variables indicating whether any defendant in the household was identified as likely (>50 percent probability) Black and whether all defendants in the household were identified as likely (>50 percent probability) female.

Variation in Serial Eviction Filing Rates among and within PHAs

To explore variation in serial eviction filing rates among housing authorities, we shifted the unit of analysis from households to PHAs. Doing so required that we assign eviction filing from public housing to the PHA from which they originated, which we were not able to do in all cases. To ensure we assigned cases correctly to PHAs, we implemented strict criteria on accepted matches based on plaintiff names or addresses.[12] Because of these limitations, we restricted these analyses to 814 PHAs across 24 states. In total, these PHAs filed eviction cases against 21,020 households, 9,645 (45.9 percent) of them repeatedly at the same address.

Using these data, we fit a negative binomial regression in which we predicted the count of households filed against for eviction serially by the given housing authority as a function of a broad set of PHA characteristics. The model included an offset for the natural logarithm of the total number of households filed against by the PHA, so results should be interpreted in

12. See supplementary appendix of Gromis, Hendrickson, and colleagues (2022) for details on assignment of public housing cases.

terms of a serial eviction filing rate: the number of households filed against repeatedly divided by the total number of unique households that received an eviction filing (Leung et al. 2021; Osgood 2000). We predicted this rate as a function of a set of variables from the POSH that have previously been linked to PHA eviction filing rates (Gromis, Hendrickson, et al. 2022): the total number of units operated by the PHA, the percentage of residents who were Black and percentage who were Latinx, the percentage of female-headed households, the share of residents 62 and older, and the average time spent on the waiting list for new admissions.[13] In addition, we included housing authorities' 2014 scores on the four elements of the Public Housing Assessment System (PHAS): physical, financial, management, and capital fund (Lead the Way 2015). We were particularly interested in the association between rent collection metrics, nested within the management score, and PHA serial eviction filing rates. We also included the private market serial eviction filing rate that we observed in the given tract. We included random effects for the state in which the PHA was located.

Our final question aimed to explore the extent to which serial eviction filing patterns are set at the level of the housing authority relative to the level of individual development. Understanding these dynamics is important in determining the appropriate site for interventions. Evidence of minimal variation in serial eviction filing rates between developments within the same PHA would point toward the need to make changes at the level of the overall housing authority, rather than development by development.

To conduct these analyses, we limited our sample to those PHAs in which we were able to assign eviction filings to specific developments reliably.[14] Because not all public housing cases were successfully assigned to a

13. We recoded this from a continuous variable, as reported in the POSH, into a categorical variable with the following levels: fewer than 100 units, 100–299 units, 300–499 units, 500–999 units, and 1,000 units or more.

14. Development assignment consisted of up to four steps. First, if the defendant address and plaintiff name exactly matched a listed combination of address and name in the HUD data, we assigned the case to that development. Second, if the defendant address exactly matched a listed address in the data provided by HUD, we assigned the case to that development. Third, if an exact address match was not possible, we assigned the case to a given development if that development was listed as the plaintiff in the case. Fourth, if neither address nor name match was possible, we assigned cases to specific developments if there was only one development operating in the given census tract during the focal year. Table A1 details the frequency of each match type.

development, we restricted our sample to include only PHAs where, for 3 consecutive years, at least 90 percent of cases had developments assigned. Because we wanted to analyze variation within PHAs, we also dropped housing authorities that had a single development. This third, more restricted sample leaves us with a sample of 852 developments across 142 PHAs and includes 13,336 total households filed against.

These data allowed us to tally the number of households filed against—and the number filed against serially—for every development within every PHA that met our selection criteria. Using the resulting figures, we calculated serial eviction filing rates at both the development and the PHA level. To analyze these data, we tested for differences within and among PHAs using one-way analysis of variance (ANOVA). The resulting *F*-statistic allowed us to determine whether the variability between groups—that is, differences in the serial eviction filing rate between PHAs—was significantly greater than the variability across developments within PHAs.

QUALITATIVE DATA

We conducted 42 interviews in Cleveland and Akron in 2019. These sites were selected because, despite geographic proximity and demographic similarity, they have drastically different PHA serial eviction filing rates. Among residents of CMHA who were filed against for eviction, 51.1 percent were filed against serially, compared with just 3.5 percent in AMHA.[15] This difference is particularly striking because both housing authorities operate under the Ohio Landlord Tenant Law and in counties with quite similar non-PHA serial eviction filing rates: 24.3 percent in Cuyahoga County (CMHA) and 21.3 percent in Summit County (AMHA). Although CMHA evicts a larger share of tenants than AMHA each year (6.1 percent compared with 2.9 percent), the difference in completed evictions is far smaller than the difference in serial filings.

To understand landlord-tenant dynamics in each PHA, we conducted semistructured interviews with staff from each organization. In both sites, these interviews aimed to elicit a range of perspectives on how each PHA manages rent collection and evictions. At CMHA, we conducted

15. The higher serial eviction filing rate in CMHA resulted in a higher overall eviction filing rate (number of filings divided by number of occupied units) in 2015: 19.3 percent in CMHA vs. 4.55 percent in AMHA.

15 interviews with staff, including property managers, asset management project (AMP) leaders, resident service providers, members of upper-level management, and legal counsel. We interviewed 13 staff members of AMHA. Their roles included property management, resident service providers, upper management, and legal counsel.

We asked staff members about their roles and responsibilities at the housing authority, focusing on their experiences with rent collection and eviction policies. Interviews lasted between 30 and 90 minutes. Because the interviews were arranged by each PHA, interview setups differed across agencies. Specifically, all interviews with CMHA staff were conducted in groups of three interviewees, providing a mix of staff and management perspectives within each group. By contrast, we conducted both individual and group interviews with AMHA staff. Table A2 provides details about the contexts in which the interviews were conducted. Interviews performed in groups and individually may generate different data (Guest et al. 2017). For example, power dynamics between management and staff within the same group interview could influence responses (Frey and Fontana 1991). However, group interviews also allow us to observe these dynamics, as well as how perspectives varied within the organization. For example, property managers who worked directly with tenants were more able to offer specific experiences and observations of eviction filings, whereas management-level staff provided information about higher-level policies and decision-making.

To triangulate information gathered from PHA staff and to complement our understanding of local landlord-tenant laws and procedures, we also conducted court observations and supplementary interviews at both sites. We observed eviction cases at the Cleveland Housing Court and the Akron Municipal Court. In addition, we recruited magistrates and court staff by reaching out to courts with jurisdiction over eviction cases, while also contacting local community organizations that have worked with eviction cases. We conducted additional interviews through snowball sampling. In Cleveland, we interviewed two magistrates, three members of the court staff, and three staffers from community organizations. In Akron, we spoke with one magistrate and five staffers from community organizations. These semistructured interviews included questions about the interviewee's roles, local landlord-tenant laws, and any experiences with public housing evictions. We read and analyzed interview transcripts alongside the PHA staff interview data to provide context and validate information.

In addition, we conducted supplementary interviews with 22 tenants in CMHA and 20 tenants in AMHA. We do not include data from these interviews in the main analysis but draw on them in our conclusion. We recruited tenants by sending out letters to addresses in our eviction records that had been subject to serial eviction filings. We also put up flyers at local community organizations. Moreover, we conducted snowball sampling by asking interviewees for referrals. Interviews lasted between 30 and 120 minutes. We conducted semistructured interviews asking tenants about their housing and financial situations, focusing on any experiences with eviction or late rent payments.

We presented all interview respondents with the option to use their real names; we use real names for all respondents who consented. We do not name respondents who wished to remain anonymous. Using real names promotes accountability and transparency in the research process and, by giving research subjects the choice, allows them to have more control over their narratives (Duneier 1999; Jerolmack and Murphy 2017; Murphy, Jerolmack, and Smith 2021).

We recorded and transcribed all interviews. Next, we conducted line-by-line analysis, reading first to index and identify recurring themes, then again to apply thematic codes. This process is appropriate for an empirical study using a semistructured interview protocol with a large sample size. It also allows us to put our interview data in dialogue with our quantitative findings.

RESULTS

QUANTITATIVE RESULTS

Risk of Eviction and Serial Eviction Filing in Public Housing and the Private Market

We restricted our analyses to 4,898 census tracts that were the site of at least one public housing unit. More than 3.4 million renter households lived in these tracts, with 8.2 percent living in public housing. Within these tracts, we observed 258,133 households filed against for eviction. Among households living in public housing, 9.8 percent faced an eviction filing, compared with 8.1 percent of households living in private market housing.

Of the households that were filed against for eviction, three in 10 (30.3 percent) were filed against repeatedly at the same address, consistent with previous findings (Leung et al. 2021). The serial eviction filing rate varied considerably as a function of housing type, however: of households

that were filed against at least once, 46.8 percent of PHA resident households were filed against serially, compared with 28.4 percent of households living in private market housing.

Serial eviction filing rates vary considerably from state to state (Leung et al. 2021), and we found that this was true for PHAs as well as market-rate housing. For each of the states in our sample, we calculated serial eviction filing rates in public housing and in market-rate housing. Those two rates were positively correlated ($r = 0.469$): in the states in which serial eviction filings were common on the private market, they also tended to be common in public housing.

Indeed, serial eviction filing rates in PHAs often exceeded those on the private market. In figure 1, we plot these rates for private market housing (*x*-axis) and public housing (*y*-axis). States that fall above the superimposed

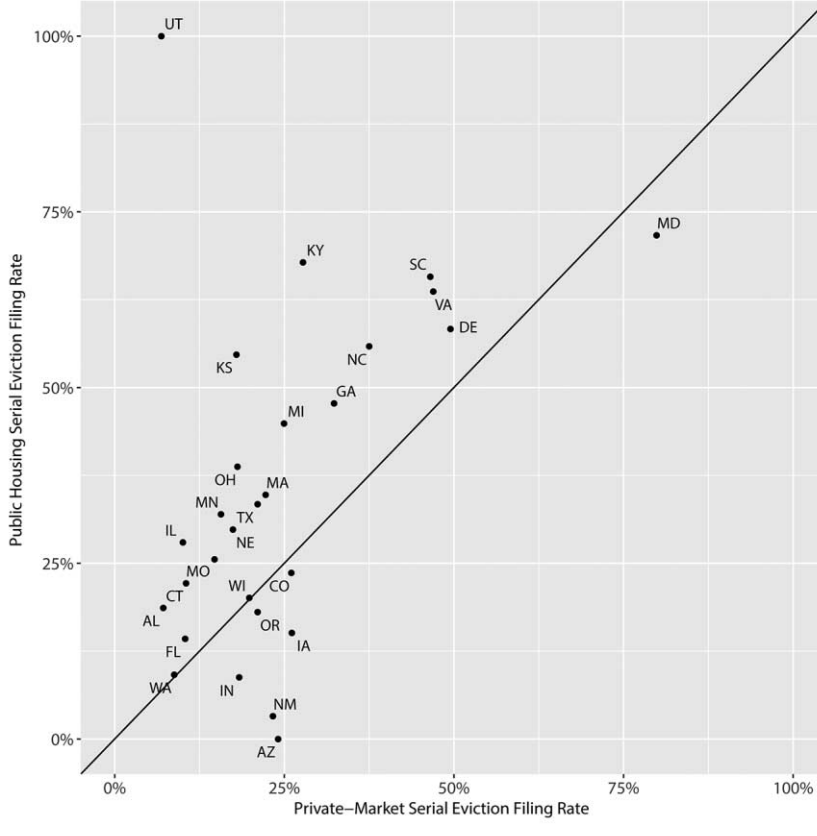

FIGURE 1. Serial eviction filing rates in public housing and the private market, by state

45-degree line had higher rates of serial eviction filing in public housing. Serial eviction filing rates were higher in PHAs than in the private market in 21 of the 28 states in our sample. For example, in Kentucky, more than two-thirds of PHA resident households that faced an eviction case were filed against serially (67.8 percent), compared with less than one-third of those renting on the private market (27.8 percent).

In table 2, we report results from a series of regression models that formally tested for differences between public and private market housing residence in the risk of eviction filing (models 1 and 2) and, conditional on filing, the risk of serial eviction filing (models 3 and 4).

In model 1, we predicted the risk of eviction filing simply as a function of public housing residence, whereas in model 2, we included a full set of tract and county covariates. In both models, we found no statistically significant difference in the risk of eviction filing by housing type: residents of public housing were filed against for eviction almost exactly as often as their neighbors living in private market housing.

Among those who were filed against, residents of public housing were significantly more likely to be filed against repeatedly (model 3). This pattern held true even after controlling for a range of household, tract, and county characteristics that affect the risk of serial eviction filing (model 4). Indeed, in model 4, we found that, all else held equal, public housing residents were 15.5 percentage points more likely to be filed against serially than their counterparts living in private market housing. By contrast, a household where all listed defendants were female had only a very slightly higher risk of serial eviction filing (statistically significant, but less than one percentage point). Households with at least one listed defendant who was likely Black—relative to households without such a defendant—had significantly higher odds of being filed against serially, consistent with the previous literature (Hepburn et al. 2020).

Neighborhood characteristics also affected the likelihood that renters faced eviction filing and serial eviction filing. Relative to those who lived in a neighborhood with no racial/ethnic majority (or some majority that was not white, Black, or Latinx), renters in majority-white neighborhoods were significantly less likely to be serially filed against. The odds of serial eviction filing rose as the share of renters and the share of renters with children increased. In addition, the legal regime shaping the eviction process in a given county affected the odds that an individual was filed against serially. In particular, we found that the serial eviction filing rate fell as the filing fee on an eviction case rose.

TABLE 2. Three-Level, Varying-Intercept Linear Probability Regression Model Estimates of Eviction Filing and Serial Eviction Filing Probability

	Risk of Eviction Filing				Risk of Serial Eviction Filing			
	Model 1		Model 2		Model 3		Model 4	
	Coefficient	Robust SE	Coefficient	Robust SE	Coefficient	Robust SE	Coefficient	Robust SE
Household characteristics:								
PHA residence	.00724	(.00667)	.00686	(.00679)	.159***	(.0151)	.155***	(.0149)
At least one Black defendant							.0488***	(.00440)
All female defendants							.00951**	(.00351)
Neighborhood characteristics:								
Tract racial majority:								
Majority white			−.0119**	(.00395)			−.0108*	(.00485)
Majority Black			.0200*	(.00971)			.00296	(.00597)
Majority Latinx			−.0138	(.00757)			−.0101	(.00745)
No/other racial majority			*ref*				*ref*	
Tract median rent:								
<$600			−.0225*	(.00883)			−.0408	(.0238)
$601–$800			−.00950	(.00815)			−.0233	(.0233)
$801–$1,000			−.00576	(.00642)			.000613	(.0223)
$1,001–$1,200			−.00714	(.00441)			.0123	(.0208)
$1,201–$1,400			*ref*				*ref*	
$1,401–$1,600			.00222	(.00792)			.000539	(.0231)
$1,601–$1,800			.00648	(.00833)			−.00979	(.0196)
$1,801–$2,000			.0102	(.0124)			−.0775	(.0530)
>$2,000			.0142	(.00954)			−.107	(.0656)

% renter households			.0164	(.0116)			.0584**	(.0193)
% renter householder with bachelor's degree			−.0547***	(.0138)			.0392*	(.0177)
% renter households with female head			.0271***	(.00459)			.0141	(.0115)
% renter households with children			.0507***	(.00778)			.0588***	(.0125)
% residents in service occupations			−.00983	(.0171)			−.0586	(.0347)
Unemployment rate			.0691**	(.0251)			−.131***	(.0380)
Rental vacancy rate			.138***	(.0158)			−.0373	(.0209)
Share of rental housing subsidized			.00292	(.0101)			.0134	(.0180)
County legal characteristics:								
Filing fee (natural log)			−.0293*	(.0119)			−.0778*	(.0314)
Number of courts handling evictions			.00178	(.00133)			.00210	(.00364)
Median eviction processing time			−1.78e-05	(.000103)			.000153	(.000206)
Attorney requirement			−.0147	(.0146)			−.0655	(.0377)
Automatic hearing requirement			−.0133	(.00989)			.00224	(.0302)
Notice requirement			−.00988	(.0139)			.00806	(.0304)
Constant	.0556***	(.00965)	.232***	(.0587)	.159***	(.0259)	.555***	(.147)
Observations	3,445,796		3,423,676		258,556		257,983	
Number of groups	623		582		623		582	

Note.—PHA = public housing authority. Robust standard errors are in parentheses. *ref* signals the reference category for the given variable within the regression model.

* $p < .05$.

** $p < .01$.

*** $p < .001$.

Variation in Serial Eviction Filing Rates among and within PHAs

In most jurisdictions, we were able to assign eviction filings from public housing reliably to a specific PHA (n = 814). Based on data from HUD, these PHAs varied widely in terms of their scale of operations. Just under half (396 PHAs) operated fewer than 100 units, whereas 49 of these housing authorities were quite large, operating 1,000 or more units. We calculated serial eviction filing rates for each as the share of households facing the threat of eviction that was filed against repeatedly at the same address. These rates varied considerably among housing authorities. In figure 2, we plot serial eviction filing rates across the 49 large PHAs in our sample.

The highest serial eviction filing rate among large PHAs in our sample was recorded by the Housing Authority of the City of Charleston, South Carolina, where more than 8 in every 10 households that were filed against were filed against repeatedly. Fourteen PHAs had serial eviction filing rates above 50 percent; of those, 11 were located in North Carolina, South Carolina, or Virginia. The average overall PHAS score among these 14 housing authorities was 83.9 (maximum 100). By contrast, 13 of the large PHAs in our sample had serial eviction filing rates below 20 percent, with the lowest recorded by the Housing Authority of the City of El Paso, Texas, which had no repeat eviction filings. The average PHAS score for the large housing authorities with low serial eviction filing rates was 86.9.[16]

What explains this considerable variation in serial eviction filing rates among PHAs? In table 3, we report results from a regression model in which we predicted PHA serial eviction filing rates as a function of the demographic characteristics of their renter population and formal evaluations by HUD.

We found that PHAs that had a higher share of Black residents had significantly higher serial eviction filing rates, whereas those that had more elderly residents (62 or older) had lower rates of serial eviction filing. Relative to midsize PHAs (those with between 300 and 499 units), small PHAs (<100 units) had significantly lower serial eviction filing rates, but otherwise there was no difference by scale of operations. Given that nearly half of all PHAs nationwide have fewer than 100 units (Schwartz 2021, 146), the

16. In terms of the management subscore that includes accounts receivable, large PHAs with high serial eviction filing rates averaged 21 (out of a maximum 25) compared with 20.3 for those with low serial eviction filing rates.

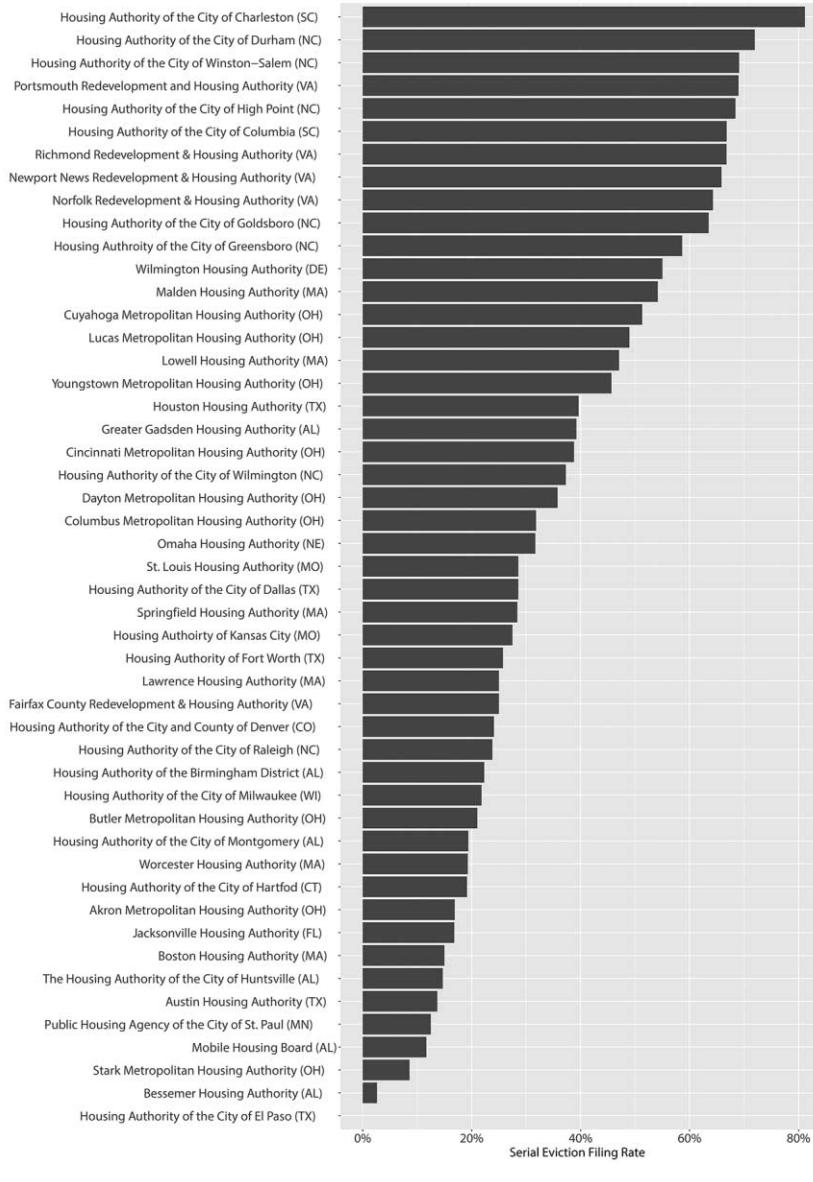

FIGURE 2. Development-level serial eviction filing rates for large public housing authorities

finding that smaller PHAs file serial cases less often is encouraging. None of the component PHAS scores was associated with a PHA's serial eviction filing rate, nor was the average time new residents waited for a unit. As expected, given the pattern in figure 1, the private market serial eviction filing

TABLE 3. Two-Level, Varying-Intercept Negative Binomial Regression Model Estimates of Serial Eviction Filing Rates between PHAs

	Coefficient	SE
PHA characteristics:		
% Black residents	.007**	(.001)
% Latinx residents	.001	(.003)
% female-headed households	.003	(.004)
% residents age 62 and over	−.010*	(.005)
Average months on the waiting list	.002	(.003)
Size:		
<100 units	−.597**	(.130)
100–299 units	−.050	(.087)
300–499 units	*ref*	
500–999 units	.056	(.120)
1,000 units or more	.149	(.101)
PHAS scores:		
Physical score	−.004	(.009)
Financial score	−.005	(.006)
Management score	−.003	(.008)
Capital fund score	.001	(.011)
State private market serial eviction filing rate	2.798**	(.792)
Constant	−2.294**	(.407)
Observations	776	
Log likelihood	−951.482	
Akaike information criterion	1,936.964	
Bayesian information criterion	2,016.085	

Note.—PHA = public housing authority; PHAS = Public Housing Assessment System. *ref* signals the reference category for the given variable within the regression model.

* $p < .05$.

** $p < .01$.

rate in a given state was a strong positive predictor of PHA serial eviction filing rate.

Although these analyses demonstrate variation among PHAs, they leave unresolved our last question: Do serial eviction filing rates vary primarily among or within PHAs? To address this question, we turned to our final data set, in which we were able to assign eviction cases originating from public housing reliably to specific developments. These data included records from 852 developments spread across 142 PHAs. The median PHA in these data had three developments, and the largest had 32; 28 of the PHAs had 10 developments or more. We calculated the serial eviction filing rate for every development that appeared in our sample.

We found a pattern of strong internal homogeneity in serial eviction filing rates. That is, rates appeared to vary among PHAs but not nearly as much development by development within PHAs. We formally tested this proposition through a one-way ANOVA test over the full sample of 142 PHAs. The F-statistic from this test was significantly greater than one ($p < .001$),

indicating that variation among PHAs was larger than the variation between developments within the same PHA.[17]

QUALITATIVE FINDINGS

The large variation in serial eviction filing rates among housing authorities suggests that PHA-level policies and decision-making matter. We turn to in-depth interviews to better understand why PHAs file serial evictions and how differing rent collection strategies and policies across institutions drive these variations. Interviews at two PHAs in Ohio allow us to focus on PHA-level differences. Despite serving demographically similar populations in adjacent counties and operating under the same landlord-tenant laws in Ohio, CMHA filed serial eviction cases at a much higher rate than AMHA.

Pressure to Collect Rent

The majority of evictions across both CMHA and AMHA were filed for nonpayment of rent, consistent with previous findings (Preston and Reina 2021). Rent makes up more than a fifth of PHA operating budgets. Rent collection is imperative to operations and factors into the annual evaluations conducted by HUD. Interviewees with both housing authorities recognize that despite their roles as social service providers, they need to meet metrics on tenant accounts receivable and occupancy rates. Aaron Cooper, director of asset management at CMHA and the main administrator of the public housing program, described the conflicting goals:

> For us, we're also judged. A housing authority is given a score. . . . HUD looks at our occupancy rates . . . as well as your aged receivables (accounts with outstanding invoices). HUD also looks at it and says, "Hey, housing authority, you have aged receivables. It can be rent, it can be charges, whatever." . . . The higher that that balance is, the lower we get score[d,] so you can see the conflicting type of parameter. . . . Those two things kind of butt heads, especially if you're [the] housing authority.

Eviction is a costly event, and turning a vacant unit around can prove particularly expensive. Jeffrey Wade, legal counsel to CMHA, explained, "We are neither subsidized, nor do we collect rent on vacant units. In fact, it costs

17. As a sensitivity check, we replicated this test over a sample that included just the 28 PHAs with 10 or more developments and found equivalent results.

us two, three, fourfold more to redevelop, to renovate, to make our unit ready when a family has been put out in order for the new family to come in." Allan Thomas, director of operations at AMHA, echoed these calculations:

> Eviction affects everything. It affects your occupancy. It affects your delinquency. . . . It also affects your budget because now you're going to be spending all this money to get this unit ready. The average turn is over 1,000 bucks to turn a unit. . . . You're going to be forced to deal with your occupancy percentage to make sure you can keep that intact to get that unit ready within 20 days.

Both housing authorities were, therefore, incentivized to maximize rent collection and minimize vacancy. However, if they operated under similar pressures from federal guidelines, why did serial eviction filing patterns differ across organizations? Differences in rent collection and eviction policies stand out in how filings were used differently between the PHAs.

CMHA: Turning More Quickly to the Courts

In CMHA, site managers oversee daily operations, such as rent collection and maintenance, in one or two developments; of all CMHA staff, they interact most directly with tenants. They report to AMP leaders, who manage multiple sites. When appropriate, AMP leaders refer cases to other departments, including resident services or the CMHA police, which are overseen by their respective directors. When a case escalates to an eviction filing, site managers and AMP leaders work with the general counsel office, which represents CMHA at housing court. Rent is due on the first of each month, with late fees charged starting on the tenth. There is a $10 late fee ($6.25 for renters with hardship who qualify to pay only the minimum rent). After the eleventh day, managers send out a 14-day letter reminding tenants they were late on rent.[18] By the end of the month, property managers begin eviction proceedings with the legal office.

All property managers emphasize repayment agreements as a key part of their rent collection strategies. Property managers offer payment plans to tenants who bring in a portion of the amount owed; such plans allow tenants to pay the remaining balance in multiple installments across a few months. The maximum monthly payment on the agreement is set in such

18. This policy is consistent with HUD regulations and 42 USC 1437d(l).

a way that a family never has to pay more than 40 percent of their income toward rent. These arrangements can take place even if legal proceedings have begun. As a result, managers do not always expect that an eviction filing will go through to judgment and removal. In fact, they see serial eviction filings as an example of how they are open to working with tenants. Jillian Eckhart, CMHA's general counsel, works with property managers on eviction cases and represents CMHA at housing court. She observed that "a lot of our cases are . . . mediated just by a property manager and a resident appearing for their hearing and they have a conversation and [see if] the resident wants to and is able to get on some sort of repayment plan or make their payments."

Under this model, property managers understand serial eviction filings as evidence of cooperation. "That's great if they had multiple and they didn't get evicted. That means we were working with them and at some point we helped them. And then at some point they fell off and we turned around and helped them again," explained Darlene Sledge, an AMP leader who oversees property managers at multiple CMHA developments. However, property managers acknowledge that eviction filings are meant to be reserved as a means of motivating tenants to show up only after exhausting other possible strategies. Phillip Ransey, an assistant site property manager, commented:

> I think that sometimes that is the only thing that will motivate certain tenants to pay, when they get to that point. Especially those that we're reaching out to, opening up our doors for the 14-day notice of needing the conferences, and they don't respond or don't call. Once they get that payment set-out notice, or that notice of court, then they're like, "OK, now it's time."

By the time a case gets to court, if the tenant was able to bring in some of the back rent due, property managers also see a payment arrangement as a more financially sound decision than eviction. Lisa Lindsay, AMP leader, explained the tension she sometimes feels:

> I want to be like, "Mm-mm, you're going to make me do all this. I've come to your door four times, I've had to knock and inquire, I've had to write these notices and all that. Now you gonna come up with the money? Mm-um, no." [But] then we've got to look at our occupancy and all those things; you've just got to bite that bullet. . . . We've got to take that money, we've got to.

Furthermore, Aaron Cooper, director of asset management at CMHA and main administrator of the public housing program, explained, "If it does get to eviction, it may be six months' worth of rent that has built up that turns into what we call the 'write-off.'" If the tenant can pay the rent back in full or partially, the housing authority has more incentive to keep them than let them leave with little hope of collecting arrears through the courts. However, for the tenant, whose circumstance already led them to be behind on rent, the payment agreement means they would be paying 40 percent of their household income until the debt was settled. With little support, this requirement leaves them vulnerable to circumstances that could lead to further arrearages and violation of the repayment agreement, thus restarting the cycle.

The local court system plays a major role in shaping these decisions. The Cleveland Municipal Housing Court, with six judges, a mediator, a social service worker, and housing specialists, is a specialized court dedicated to hearing housing cases. Embracing a mediation approach, judges often ask landlord representatives whether they were willing to settle the case with the tenant, and property managers are aware of pressure from the court to work with tenants. Site manager Julia Houston remarked,

> There's been cases where the magistrate will say, "You must work [with] them, we're the last [resort] of housing, give them another chance. They have the money today. Let's not put them out." And we have no choice but to work with them.

AMHA: Eviction as a Last Resort

The structure and chain of command at AMHA are similar to those at CMHA. Lead property managers oversee the daily operations of multiple sites, assisted by and coordinating with site-specific property managers. Lead property managers sometimes coordinate with the resident services department for assistance. If property managers decide to file an eviction, the filing is sent and processed through the legal counsel, who represents AMHA in court.

However, compared with CMHA, AMHA has more stringent and rigid policies in place for rent collection and evictions. Rent is due on the first of the month, with a grace period up to the eighth. The number of "second chances" tenants are allowed is explicitly laid out and monitored: for every 12 months, tenants can ask for one extension past the eighth of the month

from the property manager (or the director of operations or the deputy director, if past the fifteenth). Those still not paid after the fifteenth receive delinquency letters or a 14-day notice of lease termination if they have already received a delinquency letter within the last 12 months. The notice of lease termination, according to Michelle Ballentine, one of the lead property managers, serves the purpose of getting people's attention,

> [The notice of lease termination] scares them when they get it, so you would get some people that will call you as soon as they get that because they're freaking out. . . . But usually that lease termination is one thing that'll get their attention, and they'll contact you or they'll come to the office.

AMHA does not offer repayment plans that allow tenants to spread out arrears across multiple months, nor are tenants allowed to submit partial payment. AMHA allows for settlement only if the tenant can pay full back rent, and even then, only once with the property manager and once with the legal department every 12 months. These settlement plans are—as James Casey, the legal counsel who processes eviction filings and represents AMHA at court, put it—"just to memorialize that we have resolved the matter," that the tenant has caught up to all amounts due and AMHA has accepted their entire payment this time. Casey further explained the housing authority's logic in assigning limits to the number of extensions and agreements allowed:

> Circumstances happen, life happens, so we understand that and try to work with them, but on a repetitive basis? . . . Ultimately, legally we have to be able to enforce our lease, which means that we just, we can't accept rent anytime, and by course of conduct change the terms of those lease, so we're going to try to enforce, in a fair way, the due deadline, the rent due dates, as they are imposed and then work with them if problems arise, but we're not going to be able to do that over, year after year after year.

AMHA officers view these allowances through extensions, notices, and settlement agreements as opportunities and second chances for tenants. They see eviction as a last resort after these opportunities have been granted. As Allan Thomas, director of operations who oversees property management across all AMHA public housing units, said:

> Because we have all of these settlement possibilities built into our process, we're not taking it to court until we're at that point where we're saying, "We've exhausted every other possibility, every other effort." Again, it truly is a last resort. . . . We're using our legal office as that settlement instead of the court.

Because AMHA requires tenants to pay in full to settle and stay, eviction proceedings are likely to lead to eviction judgments. By the time a case has reached the court, the tenant either would be evicted or need to produce the full back rent owed, without the option of catching up over several months.[19] In the rare situation when a resident has an eviction filed against them for a second time, they are unlikely to be able to stay. Jonathan Lindsey, the mixed finance compliance manager, commented,

> If we do take someone to court multiple times, I believe you might take it to court and settle it once, but you're not going to take it to court and settle it again. If they make it all the way back to court with all the safety nets, more than once, the likelihood of them being evicted on the second time is going [to] probably [be] very high.

Compared with housing court in Cleveland, the magistrate court in Akron has less discretion and fewer resources to encourage mediation between landlords and tenants. One of Akron's magistrate judges for small claims court, who also hears eviction cases, described her role:

> As a neutral magistrate, when I hear these cases, . . . I can't give legal advice and I can't force parties to settle and I can't really even negotiate settlement agreements in my courtroom because I don't really have the time to do it. . . . I can't force a landlord to work with [tenants who have breached the lease]. So we don't really do a lot of settlement negotiation in our court.

19. Upon paying back rent in full, the only fee they still owe is court costs, for which AMHA helps set up a repayment plan. The minimum monthly payment is $25, and they would pay until the entire amount is paid in full. However, if they neglect to pay the court costs back, it could be grounds for lease termination as well.

Rather, as James Casey observed, discretion over whether to continue with an eviction or to settle rests more on AMHA than on the magistrate:

> If [tenants] . . . come to court and just say, "Hey, I've got the money." That's generally what will resolve the matter. . . . And if the writ is authorized, that's when that court official, magistrate judge has said, "Hey, you didn't pay your rent, under the law I pretty much have to grant this writ, but AMHA has flexibility," so we won't file the writ. . . . We won't do that, we have up to 60 days under the Ohio law and local rules to file that writ, . . . and so, we can do that, hold off. They say, "I'll have the rent on this date," or "I have it with me now." . . . So, yeah, we certainly do work with them.

CONCLUSION

This study investigated the use of eviction filings in public housing, with a focus on serial eviction filing. We found that, despite paying much lower rents, residents of public housing were at equal risk of facing an eviction filing as their neighbors living in private market housing. Moreover, public housing residents who were filed against were significantly more likely to be filed against repeatedly than those living in private market housing. Across both types of housing, these rates varied between states, often in lockstep: states with higher serial eviction filing rates on the private market also tended to have higher serial eviction rates in public housing. Previous research has explored the pressures that larger private market property managers are under to meet rent collection benchmarks and protect their financial bottom line (Leung et al. 2021). We show here that PHAs face the same constraints and play by similar rules as private market housing providers. Property managers in both classes are responsive to the legal and regulatory structures surrounding the eviction process. Incentives that lead private market property managers to turn to serial eviction filing as a rent collection technique also hold for PHA property managers. From a policy perspective, solutions aimed at revising these incentives should have meaningful benefits for renters living in both markets.

We found large differences among PHAs in the extent to which they file evictions serially, and smaller variations among the developments that make up PHAs. Whereas some large PHAs filed repeatedly against more than half of the tenants that received an eviction filing, others did so less than one-fifth of the time. We found no association between PHA serial

eviction filing rates and PHAS scores: housing authorities that turned repeatedly to the courts to manage tenants scored no better or worse in these formal evaluations than authorities that used the eviction process sparingly. Among the large housing authorities displayed in figure 2, the average overall PHAS score for PHAs with low serial eviction filing rates (less than 20 percent) was *higher* than among those with high serial eviction filing rates (greater than 50 percent). Simply put, there was no evidence that serial eviction filing results in better property management metrics.

In-depth interviews with two housing authorities, the CMHA and the AMHA, demonstrate how rent collection approaches differ across organizations and, in turn, influence repeated eviction filings. CMHA, which has higher serial eviction filing rates, offers settlements and repayment plans up to the point of a court hearing. Although this practice makes it easier for tenants to stay, it also leaves them vulnerable to repeated filings as they struggle with repayment. On the other hand, AMHA rarely has repeated eviction filings. Although tenants are offered other forms of extensions and settlements in place, property managers are also more stringent in how often they allow such assistance. Furthermore, tenants can only stop an eviction if they are able to pay all amounts due in full, making it difficult for them to stay once the process has begun. Although CMHA's approach might seem to offer more flexibility and more engagement with tenants, the more liberal use of the threat of eviction proceedings and higher volume of eviction filings trickle down and translate to higher rates of eviction judgments: 6.1 percent in CMHA, compared with 2.9 percent in AMHA, in 2015. Although a smaller proportion of eviction filings translate to eviction judgments, ultimately, CMHA's approach leads to more displaced households.

We found no evidence that CMHA's more aggressive use of the threat of eviction resulted in better operational outcomes. Indeed, PHAS scores for both housing authorities suggest the opposite. Out of 100 possible points, AMHA received a score of 92 (high performer designation) in 2014, compared with 72 (standard performer designation) for CMHA. On the management subcomponent that reflects rent collection metrics, AMHA also outperforms CMHA (22 points vs. 16 points, out of a maximum possible 25). We do not have access to detailed rent ledgers that would allow us to assess the link between eviction filing and collection of arrearages, but these aggregate data suggest that CMHA's reliance on repeated eviction filings does not result in better performance.

Public housing authorities regularly wield the threat of removal as a property management technique. Exploratory interviews with tenants at each PHA suggest the burden these practices place on them. Although extended timelines in CMHA give residents more time to find assistance, they still constantly feel pressured to make rent and figure things out on their own. Cassandra Ward, a CMHA tenant, recalled,

> They'll send you notices the whole time, within that time. And then, they'll send you a letter saying you've got to come meet me in the office, and you go talk to them and explain why. . . . I mean, they go through processes and steps before they actually get there, but once you get there you've got to figure it out or they're going to put you out.

Another tenant recalled, "All the time, I see these green stickers on peoples' doors. I've literally seen people evicted with all their furniture outside. . . . It happens quite a lot around the complex." CMHA residents saw their relationship with property managers as primarily a transactional one. As tenant Verdell Bendien put it, "You're talking about money. Their thing is, all they want to know is, are you working or [are you] not working, basically. 'If you're working, we want our money. If you're not working, we're going to reevaluate your financial situation, and put you at $25 rent.' That's it."

Similarly, in AMHA, tenant Shawn Richardson noted that "the only thing they want to know is you got that money. There's no cushion or nothing like that. It's strictly business. Either you pay or you don't." Nonetheless, the much stricter rent collection timeline at AMHA was a source of stress. Tiffany Robinson, another AMHA tenant, explained that she

> didn't get paid until the ninth, and my rent was due no later than the eighth. They'll only give you an extension until the eighth to pay your rent. . . . I managed it, but I mean I don't want to ever experience that, going to lose my place. . . . So, I just try to maintain to where that never happens.

For Tiffany, managing those timelines required seeking assistance from family and selling plasma, in addition to working.

At root, the problem of affordability and nonpayment remains central. Property managers and other officials in both CMHA and AMHA repeatedly

emphasized that they do their best to work with tenants. Indeed, compared with the private market, there are long processes, additional notices, and resident services in place that provide a considerable financial cushion and safety net for tenants behind on rent.[20] However, the operations of PHAs still center around eviction as a rent collection tool. Although PHAs are willing to work with residents, they still view budgeting and the prioritization of rent payment as the responsibility of tenants—a position that parallels their private market counterparts (Rosen and Garboden 2022). As one of AMHA's lead property managers commented,

> Sometimes you can lead somebody to the help, but you can't make them. So, it's just all about, in my opinion, it's all about them prioritizing. Housing is, if they want to keep their apartment, I mean that's gotta be a priority to pay the rent.

Rent collection was established as a criterion that the federal government must use to evaluate PHA management in the US Housing Act of 1937 (Lead the Way 2015; HUD 2021). By contrast, these housing authorities are not required to systematically record or report eviction cases. Such data do not factor into PHAS scores and are not reported through POSH or any other publicly available data source (Office of Policy Development and Research 2021). In so doing, HUD has prioritized rent collection and occupancy levels over tenant stabilization, hiding the scale of displacement from public housing and the frequent reliance on eviction by PHA management. Given the emphasis PHA staff places on these scores, changes to evaluations and reporting can play a key role in shaping PHA priorities and approaches to property management. More oversight is required to ensure that PHAs are not disproportionally subjecting marginalized groups to evictions or uncritically reproducing the eviction patterns that prevail in the housing markets in which they are embedded.

Research to date has analyzed state-, neighborhood-, individual-, and property-level variations in and correlates of eviction (Desmond and Gershenson 2017; Gomory 2021; Goodspeed et al. 2021). Our findings highlight

20. In the private market, Ohio landlords can file evictions for nonpayment of rent after they have issued a 3-day notice. In comparison, both housing authorities have to at least issue a 14-day notice before they can file a nonpayment of rent.

the need to take an organization-level approach. We found large variations between PHAs in the frequency of serial eviction filing but considerably less within developments of the same public housing program. As our interviews indicate, rent collection policies and strategies are often set at the level of the housing authority. Our findings suggest that attempts to reform public housing rent collection and eviction practices could be efficiently targeted at PHAs rather than their subsidiary developments.

Interviews also highlight the ways that courts affected PHAs' use of the eviction process. Because Cleveland's Housing Court encourages mediation between landlords and tenants, CMHA property managers are sometimes more open to working with residents even after cases are filed. However, this practice still adds avoidable eviction filings to tenants' records. The City of Philadelphia's Eviction Diversion Program, established in response to the COVID-19 pandemic, could serve as a model for mediation outside of court. The program coordinates and facilitates mediation between landlords and tenants before any court case is filed. The advent of a right-to-counsel program in Cleveland may have further shifted court dynamics toward encouraging resolutions between property managers and tenants that do not entail displacement (Right to Counsel 2021).

Our findings are limited in a number of ways. First, our analysis was based on a purposive, nonrepresentative sample of eviction filing records covering less than one-third of US counties. There were 282,360 public housing units in the tracts in our restricted sample, only a quarter of all units nationwide in 2015 (Schwartz 2021). We lack data from a number of the biggest PHAs, including the nation's largest: New York City. We do not have data from Philadelphia, so we cannot replicate or directly compare our findings with those produced by Preston and Reina (2021). Second, because we do not have household sociodemographic data, we cannot control for a variety of factors that may—at least in part—explain the observed differences in risk of eviction between public housing and private market housing. Those living in public housing are relatively disadvantaged in a number of ways that may increase their risk of being filed against, and they might be at even greater risk if they were to find housing on the private market. We cannot assess whether a given household is, ceteris paribus, at lower or higher risk of (serial) eviction filing if living in public housing than private market housing. Nevertheless, the fact that PHAs are turning so frequently to landlord-tenant courts is significant. The absolute differences in risk matter even if they pertain to a select population—indeed, they matter

all the more because they pertain to a select population. Furthermore, our individual-level data do not identify other forms of housing subsidies, such as HCVs, to compare with public housing. Future research could investigate how different subsidy programs operating across different PHAs vary in displacement outcomes.

Our findings pertain to the period in which data were collected: court records covered 2010–16, and qualitative interviews were conducted in 2019. Under the administration of Joseph Biden, HUD has taken a number of steps designed to mitigate the potential for evictions. Specifically, the department clarified and recommended that PHAs take advantage of flexibilities available to establish less aggressive repayment agreements; undertook two revisions to the eviction prevention tool kit to help PHAs and tenants understand program requirements, flexibilities, and available resources; and published an interim rule extending the advance notification of termination of tenancy for nonpayment of rent from 14 to 30 days. The latter policy is designed to ensure that public housing residents have adequate time to address arrearages and enter into repayment agreements ahead of eviction filings. It remains to be seen what effect these policies have had on eviction and serial eviction filing rates within PHAs.

What is limited in this account—and, we argue, a critical area for future study—is a thorough investigation of public housing tenants' perspectives. Whereas our interviews with tenants provide preliminary glimpses of the stress caused by repeated threats of displacement and financial pressures, future research could systematically and thoroughly account for the costs and consequences of serial eviction filings for public housing residents. Serial eviction filings and associated fees and fines increase cost burdens for those on the private market (Leung et al. 2021) and presumably have similar effects for residents of public housing. Given their already low incomes, what effect does this additional housing cost burden have on their ability to make ends meet and care for their families? For those looking to leave the public housing system, how significant a barrier are repeated eviction filings in finding safe, stable housing on the private market?

NOTE

Lillian Leung is a doctoral student in sociology and social policy at Princeton University. Her research applies mixed methods to understand urban poverty and inequality in America.

Peter Hepburn is an assistant professor of sociology at Rutgers University–Newark and associate director of the Eviction Lab. His research explores how changes to the institutions of work, criminal justice, and housing serve to produce and perpetuate inequality.

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APPENDIX

TABLE A1. Assignment Strategies of Public Housing Cases to a Public Housing Development

	All Records, 2010 and 2016		Larger Sample, 2010 and 2016		Focal Year	
Assignment Strategy	*N*	%	*N*	%	*N*	%
Assignment by address and plaintiff name match	18,992	4.3	1,860	2.9	645	3.1
Assignment by address match only	344,994	77.9	54,994	86.4	18,112	87.5
Assignment by plaintiff match only	1,401	.3	116	.2	81	.4
Assignment by tract-level match with one operating development	22,618	5.1	3,157	5.0	1,016	4.9
Total cases with developments assigned	388,005		60,127		19,854	
Unassigned	55,030	12.4	3,517	5.5	839	4.1
Total cases with PHA assigned	443,035	100	63,644	100	20,693	100

Note.—PHA = public housing authority. Percentages are out of number cases with PHA assigned.

TABLE A2. Key Interview Participants, by Public Housing Authority and Grouping

Public Housing Authority	Name(s) and Role(s) of Participants in Each Interview Set
Cuyahoga Metropolitan Housing Authority	Dorivette Nolan, Director of Policy Planning and Housing Mobility Nancy Eakins, AMP Leader Julia Houston, Site Manager
	Tekisha Ruffin, Deputy Director of Resident Services Darlene Sledge, AMP Leader Valerie James, Senior Services Manager
	Sharhonda Greer, Deputy Director of Asset Management Phillip Ransey, Assistant Site Manager Lisa Lindsay, AMP Leader
	Andy Gonzalez, Chief of CMHA Police Aaron Cooper, Director of Asset Management Kristie Groves, Director of Resident Services
	Jillian Eckart, Associate General Counsel Jeffrey Wade, Chief of Staff and Special Counsel to the CEO Amanda Mehlman, Section 504/ADA Manager
Akron Metropolitan Housing Authority	Debbie Barry, Deputy Director Christina Hodgkinson, Director of Resident Services James Casey, Legal Counsel
	Jonathan Lindsey, Mixed Finance Compliance Manager Jennifer Kollar, Lead Manager, Mixed Finance Portfolio
	Rachel Braswell, Program Coordinator, Residential Services Brenna Herman, Senior Manager, Resident Services
	[anonymous]
	Allan Thomas, Director of Operations
	Debbie Bromley, Lead Property Manager
	Tina Morris, Lead Property Manager
	Michelle Ballentine, Lead Property Manager
	[anonymous]

Note.—Name and role listed are as of the time of the interview (2019).

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