# Eviction Regime Severity and Household Formation*

Natalia Kovrijnykh,[†] Igor Livshits,[‡] and Jacob Shepard[§]

Preliminary and Incomplete

February 13, 2026

Click here for the most recent version

**Abstract**

This paper studies how eviction policy affects rental housing choices and welfare across the income distribution. We develop a model of rental housing with limited commitment in which eviction policy affects tenants' ability to commit to rent payments, shaping rental prices and housing availability. Stricter eviction regimes expand the set of available rental housing and facilitate household formation, as more individuals are able to rent, and the effect is strongest among individuals with intermediate income levels. Heterogeneity is central to welfare assessment: the poorest individuals are always excluded from the rental market; those with intermediate incomes benefit from stricter eviction policy because it allows them to enter the rental market or rent larger housing; richer tenants are worse off because they face a higher likelihood of eviction following adverse income shocks. To test the model, we construct a novel index of eviction regime severity across U.S. jurisdictions. We show that stricter eviction regimes are associated with lower cohabitation with parents and greater household formation among young people, with the strongest effects among individuals with intermediate incomes, consistent with the model's predictions.

**Keywords:** Evictions, Eviction Regime Severity, Rental Housing, Household Formation

**JEL Codes:** D14, D86, G51, R21, R31

*We have benefited from comments and suggestions by Kyle Herkenhoff, Bariş Kaymak, Ben Lester, Ned Prescott, Nick Pretnar, seminar participants at the Federal Reserve Bank of Cleveland, and conference participants at Demographic Heterogeneity in Aggregate Economics Conference, Midwest Macro Meetings Spring 2025, BEROC Annual Conference 2025, Barcelona Summer Forum 2025, SAET 2025, and the Econometric Society World Congress 2025. The views expressed here are those of the authors and do not necessarily reflect those of the Federal Reserve Bank of Philadelphia or the Federal Reserve System.

[†]Department of Economics, Arizona State University. Email: natalia.kovrijnykh@asu.edu.

[‡]Federal Reserve Bank of Philadelphia and BEROC. Email: igor.livshits@phil.frb.org.

[§]Department of Economics, Arizona State University. Email: jpshepard@asu.edu.

# 1 Introduction

Eviction is one of the most traumatic economic shocks individuals can experience, with lasting adverse effects that extend beyond the residential and financial spheres to physical and mental health, parenting, and other aspects of life.[1] Yet designing policy around eviction prevention is far from straightforward.[2] Protecting unlucky tenants from eviction must be balanced against ensuring that landlords are adequately compensated; otherwise, they may be unwilling to supply rental housing.[3]

In this paper, we develop a parsimonious model of the rental market that provides a sharp theoretical characterization of how eviction policy affects the housing supply landlords are willing to offer, rental market outcomes, and welfare. Stricter eviction regimes improve rental housing availability for relatively poor individuals and, thus, lead to greater household formation. Yet, stricter eviction regimes can be harmful for infra-marginal renters, even to those who choose to rent larger housing units. Thus, we highlight that measuring the success of a policy by its effect on rental outcomes can be misleading. Moreover, household heterogeneity is central to policy design and welfare assessment. To test the model's implications empirically, we construct a novel index of eviction regime severity across U.S. jurisdictions. The model's predictions for the effects of eviction policy on household formation are consistent with cross-sectional data.

Our simple one-period model has the following main ingredients. Individuals cannot commit to paying rent and failure to pay leads to eviction with some probability, forcing the individual to their outside housing option (which can be interpreted as homelessness or living with friends or relatives). This outside option is also available as a free alternative to renting. Individuals differ in productivity, observed at the time of contracting, which determines stochastic income realized after the rental contract is signed. Landlords are risk neutral, competitive, and operate a linear technology for providing rental housing. The rental market is segmented, with prices depending on both housing size and the prospective renter's productivity. In equilibrium, rental prices incorporate the risk of nonpayment.

In the illustrative model, we assume that individuals' preferences over consumption and housing are quasi-linear in consumption. This stark assumption allows us to ex-

[1] See Desmond and Kimbro (2015) and Collinson, Humphries, Mader, Reed, Tannenbaum, and van Dijk (2024) among others.

[2] See, e.g., Abramson (forthcoming), Abramson and Van Nieuwerburgh (2025) and Imrohoroglu and Zhao (2022).

[3] A similar trade-off between partial insurance and commitment was highlighted by Zame (1993) for credit markets and quantified by Chatterjee, Corbae, Nakajima, and Ríos-Rull (2007) and Livshits, MacGee, and Tertilt (2007) for the institution of personal bankruptcy.

plicitly characterize the equilibrium and highlights the key tradeoff by abstracting from consumption smoothing and complementarities between housing and non-housing consumption. (We establish the robustness of our findings by numerically analyzing a more general model specification in Section 4.) Under quasi-linear utility, rent repayment is determined by both an individual's willingness to pay and their ability to pay. For any rental contract, willingness to pay depends on the severity of the eviction regime but not on income, while the opposite is true for ability to pay. This dichotomy makes the theoretical analysis tractable.

We characterize the set of rental housing that landlords are willing to offer, the individual's rental choice, and welfare. The set of available houses is larger under a stricter eviction regime, modeled as a higher probability of eviction conditional on nonpayment. Our model delivers a testable implication: household formation—defined as the set of individuals who rent rather than take the outside option—is larger under a stricter eviction regime (as long as the probability of eviction conditional on nonpayment and/or utility costs from nonpayment and eviction are not too high). Moreover, we show that the effect of eviction severity on household formation is strongest among individuals with intermediate income levels. Heterogeneity is also central to welfare assessment. The poorest individuals are excluded from the rental market regardless of the eviction policy and are therefore unaffected by it. Stricter eviction regimes benefit individuals with intermediate incomes by allowing them to enter the rental market, but they harm richer tenants who are unconstrained in their housing choices yet face a higher likelihood of eviction following adverse income shocks. Interestingly, stricter eviction regimes can be harmful even to those who choose to rent larger housing units as the benefits of larger housing are more than offset by the greater losses in the event of rental nonpayment. Thus, we highlight that judging the success of a policy by its effect on rental outcomes can be misleading.

To test our model's predictions empirically, we propose a novel measure of eviction regime severity across U.S. states and counties. We construct the "Eviction Regime Severity Index" (ERSI) as the fraction of eviction filings that result in eviction judgments—that is, the fraction of filings reaching the final stage of the judicial process.[4] We validate the measure, showing that it is negatively associated with rental delinquencies after controlling for other determinants. Moreover, we find that the ERSI serves well as a proxy for state fixed effects, capturing about half of the variation explained by including state fixed effects directly. We then use our index to test the model's predictions. We find that evic-

[4] We also examine an alternative measure: the number of "threatened" households who receive at least one eviction filing divided by the number of eviction filings in that jurisdiction. All of our results are robust to using this alternative measure (see Appendix B.3).

tion severity is negatively correlated with living with parents and positively correlated with being a household head among young individuals. The effect is strongest among individuals with intermediate income levels, consistent with the model's predictions.

The rest of the paper is organized as follows. The next subsection reviews the related literature. Section 2 presents the theoretical model and derives analytical results and testable implications. Section 3 describes the data, the construction and validation of the eviction regime severity index, and the empirical tests of the model's predictions. Section 4 illustrates numerically that our theoretical results extend to more general preferences. Section 5 concludes. Proofs and additional figures and tables are provided in the Appendix.

## 1.1 Related Literature

Since mortgage performance—particularly missed mortgage payments—was central to the Great Financial Crisis, a large body of research has examined mortgages and foreclosures. By contrast, evictions have received far less attention. Although sociologists have long studied evictions, with the seminal work of Desmond, 2017 as a prime example, the economics literature on the topic remains nascent.[5] Relatedly, there is limited research on rental nonpayment and its determinants and consequences.[6]

The economics literature on evictions falls broadly into two categories. The first consists of quantitative theory papers calibrated to aggregate data (e.g., Imrohoroglu and Zhao, 2022 and Corbae, Glover, and Nattinger, 2023) or micro-level data (e.g., Abramson, forthcoming and Abramson and Van Nieuwerburgh, 2025). The second comprises empirical studies that use bespoke datasets from specific rental markets (e.g., Humphries, Nelson, Nguen, van Dijk, and Waldinger, 2024, Collinson, Humphries, Kestelman, Neslon, van Dijk, and Waldinger, 2024, and Ellen, O'Regan, House, and Brenner, 2021). Relative to this literature, our contribution is threefold. First, we develop a parsimonious model with sharp analytical predictions. Second, we construct a novel measure of eviction regime severity across U.S. jurisdictions, enabling us to test the model's predictions in cross-sectional data. Third, we focus on how eviction policies affect household formation.

Among the quantitative studies, two that are especially relevant to our work are Corbae, Glover, and Nattinger (2023) and Abramson (forthcoming). Corbae, Glover, and Nattinger develop a dynamic model with search frictions and study landlords' eviction

[5] See Ahmad and Livshits (2024) for a detailed discussion of the state of the eviction literature.

[6] Two notable exceptions are Pattison (2024), who uses the Survey of Income and Program Participation (SIPP) to document patterns of missed rental payments, and Humphries, Nelson, Nguen, van Dijk, and Waldinger (2024), who do so using a proprietary dataset on low-income rental properties in the Midwest.

decisions—a margin we abstract from entirely. In our setting, eviction conditional on nonpayment is exogenous. Instead, we focus on landlords' decisions over which housing units to offer and at what prices, taking into account tenants' endogenous repayment choices. Abramson calibrates a dynamic model of evictions using data from San Diego County and, consistent with our findings, shows that policies that make eviction more difficult can harm renters by increasing equilibrium rents and homelessness.

Importantly, whereas in Corbae, Glover, and Nattinger and Abramson rental nonpayment is effectively exogenous and triggered solely by unemployment events, in our model—with a continuous distribution of income shocks—the probability of nonpayment is endogenous and depends on the rent level. This endogeneity creates a key analytical challenge for equilibrium pricing (relative to loan pricing in, e.g., Eaton and Gersovitz, 1981): the rental price affects the probability of nonpayment, which in turn feeds back into pricing, rendering price determination a fixed-point problem.[7] As a result, a central contribution of our paper is to characterize a tractable equilibrium in which nonpayment risk is endogenous to the rental price itself.

A recurring finding in the empirical eviction literature is that tenant-protection policies can backfire by reducing the affordability or availability of rental housing, a mechanism that is central to our paper. On the theoretical side, we formalize this mechanism through a sharp analytical characterization of equilibrium outcomes. On the empirical side, rather than focusing on a specific policy intervention—such as the "right-to-counsel" programs studied by Ellen, O'Regan, House, and Brenner (2021), Abramson (forthcoming), and Collinson, Humphries, Kestelman, Neslon, van Dijk, and Waldinger (2024), or eviction moratoria studied by Arefeva, Jowers, Hu, and Timmins (2024)—we exploit cross-sectional variation in eviction policies across U.S. jurisdictions to examine how eviction regime severity affects household formation.

Another strand of the housing literature that examines unintended consequences of policy interventions focuses on rent control.[8] To our knowledge, only two papers study the interaction between rent control and eviction policies. Geddes and Holz (2025) and Gardner and Asquith (2025) both examine the case of San Francisco and find that the introduction of rent control significantly increased eviction filings by strengthening landlords' incentives to evict.

[7] Abramson (forthcoming) circumvents this issue by assuming that the probability of repayment is *unaffected* by the rent level.

[8] The literature on how rent control can distort housing markets is longstanding and includes papers such as Glaeser and Luttmer (2003). More recent empirical studies of the causal impacts of rent control include Diamond, McQuade, and Qian (2019), Autor, Palmer, and Pathak (2014), and Sims (2007). Kholodilin (2024) reviews the empirical literature on rent control, which generally finds that rent controls lead to higher rents for uncontrolled units and lower housing construction.

Lastly, there is a large literature on household formation that studies young adults' decisions of whether to remain with their parents or move out.[9] Our contribution to this literature is to examine how the decision to form a household is shaped by eviction policy. Notably, this decision is affected both directly—through the perceived likelihood of eviction following rent nonpayment—and indirectly—through the resulting affordability and availability of rental housing.

# 2 The Model

## 2.1 Environment

We consider a one-period model of the rental housing market with limited commitment. The economy is populated by a continuum of heterogeneous individuals and competitive landlords. Individuals derive utility from consumption $c$ and housing $h$, with utility function $U(c, h)$, strictly increasing and concave in both arguments. Each individual receives exogenous stochastic income $zy$. Productivity $z > 0$, heterogeneous across individuals, is publicly observed at the beginning of the period and drawn from a continuous distribution. The stochastic component $y$ is i.i.d. across individuals, drawn from a continuous distribution, and realized at the end of the period.

Landlords are risk neutral and operate a linear technology that produces rental housing at cost $\delta > 0$ units of the consumption good per unit of housing. They offer contracts that depend on an individual's productivity $z$. A contract specifies the housing size $h$ and the corresponding rental price $P(h, z)$. Since prices depend explicitly on productivity, the housing market is fully segmented. Competition ensures that landlords break even in expectation in each submarket.

Individuals cannot commit to paying rent. Default entails a stigma cost $\chi \geqslant 0$. With probability $\rho \in (0, 1)$, the defaulter is evicted, incurring an additional utility loss $\gamma \geqslant 0$, losing access to the rented housing $h$, and instead consuming the outside option $\underline{h} > 0$, which can be interpreted as homelessness or living with friends or relatives. With probability $1 - \rho$, eviction does not occur, and the individual enjoys $h$ without paying rent. As an alternative to entering the rental market, individuals may choose the outside option $\underline{h}$ at no cost.

[9] See, for example, Haurin, Hendershott, and Kim (1993), Whittington and Peters (1996), and Ermisch and Di Salvo (1997), who find that housing costs and wage opportunities play an important role in the decision to form a household. More recently, Paciorek (2016) and Cooper and Luengo-Prado (2018) examine the short- and long-run determinants of household formation and how these vary with economic and demographic conditions.

The timing is as follows. At the beginning of the period, productivity $z$ is publicly observed and landlords offer contracts. Given $z$, each individual chooses a rental contract from the set of offered contracts, or selects the outside option. Income shock $y$ is then realized, after which the renter decides whether to pay or default. If default occurs, eviction is realized. Finally, the individual consumes.

To keep the analysis tractable and to highlight the core mechanism, in this section we impose the following simplifying assumptions. We assume that utility is quasi-linear in consumption, $U(c, h) = c + \theta \ln h$, where $c \geqslant 0$, and that income $y$ is uniformly distributed on $[0, \bar{y}]$. In addition to yielding sharp analytical predictions, quasi-linearity allows us to isolate the housing-specific mechanism from other considerations, such as state-contingent smoothing of non-housing consumption and complementarities between housing and non-housing consumption. In Section 4, we show that our main results extend to more general and empirically relevant utility specifications.

## 2.2 Agents' Problems and Rental Pricing

We now set up the agents' problems and derive the equilibrium pricing of rental housing.

Let $V^r(z, \rho)$ denote the expected utility of an individual with productivity $z$ conditional on renting when the eviction regime severity equals $\rho$, and $V^{out}(z) = z\bar{y}/2 + \theta \ln \underline{h}$ denote the value of taking the outside option. Then the individual's overall expected utility is $V(z, \rho) = \max \left\{ V^r(z, \rho),\ V^{out}(z) \right\}$.[10]

Let $\mathcal{H}(z, \rho)$ denote the set of rental housing options available to an individual with productivity $z$ when the eviction regime severity equals $\rho$. This set is determined endogenously in equilibrium (see the next subsection). Since partial repayment results in the same punishment as full default, renters optimally choose only between full repayment and default. The renter's problem can thus be written as

$$V^r(z, \rho) = \frac{z\bar{y}}{2} + \max_{h \in \mathcal{H}(z,\rho)} E_y \begin{cases} (1-\rho)\theta \ln h + \rho(\theta \ln \underline{h} - \gamma) - \chi, & \text{if } zy < P(h, z), \\ \max\{-P(h, z) + \theta \ln h,\ (1-\rho)\theta \ln h + \rho(\theta \ln \underline{h} - \gamma) - \chi\}, & \text{otherwise.} \end{cases}$$

If $zy < P(h, z)$, paying rent would result in negative consumption, which is infeasible, so the tenant defaults. If instead

$$zy \geqslant P(h, z), \tag{1}$$

the tenant is *able to pay*. However, repayment occurs only if the tenant is also *willing to*

[10]Without loss of generality, we assume that if the individual is indifferent between renting and taking the outside option, they choose to rent.

*pay*, which requires

$$\theta\rho\ln\frac{h}{\underline{h}}+\chi+\rho\gamma \geqslant P(h,z). \tag{2}$$

Note that condition (2) does not depend on $y$; it restricts the set of contracts landlords are willing to offer, since any contract violating it would *never* be honored by a tenant. By contrast, the ability-to-pay condition (1) depends on realized income and may be violated for low realizations of $y$. On the other hand, condition (2) depends on $\rho$, while condition (1) is independent of it. This dichotomy is a result of quasi-concavity of the utility function, and is what makes our theoretical analysis tractable.

Competition among landlords implies that in each submarket $(h, z)$ contracts must satisfy the break-even condition $\Pr(zy \geqslant P(h,z))P(h,z) = \delta h$, where the left-hand side is expected repayment and the right-hand side is the cost of providing housing.[11] With a uniform distribution of $y$, this condition simplifies to a quadratic equation in $P(h,z)$: $\left(1-\frac{P(h,z)}{z\bar{y}}\right)P(h,z) = \delta h$. The equilibrium price, if it exists, is the left root of this equation (otherwise a landlord can profitably undercut at a lower price):

$$P(h,z) = \frac{z\bar{y}}{2}\left(1-\sqrt{1-\frac{4\delta h}{z\bar{y}}}\right), \text{ where } h \leqslant \bar{h}(z) \equiv \frac{z\bar{y}}{4\delta}. \tag{3}$$

We immediately have the following simple property of the pricing function:

**Lemma 1 (Lower Price for Richer Tenants)** *The equilibrium price* $P(h,z)$ *defined by (3) is strictly decreasing in* $z$ *for every* $h \leqslant \bar{h}(z)$.

The intuition is straightforward. Higher productivity $z$ increases the range of income realizations under which rent repayment is feasible, reducing default risk. As a result, landlords offer lower break-even prices to more productive individuals.

Notice that as $h$ approaches $\bar{h}(z)$, $\partial P(h,z)/\partial h$ approaches $+\infty$. Hence it is never optimal for an individual to rent the largest house satisfying (3), $\bar{h}(z)$.

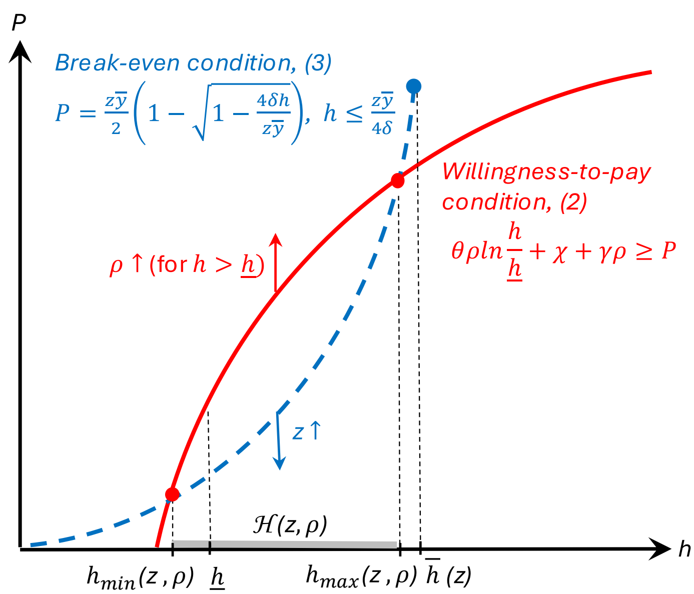
**Lemma 2 (Never Rent $\bar{h}(z)$)** *The optimal rental housing choice, denoted by* $h^r(z,\rho)$, *satisfies* $h^r(z,\rho) < \bar{h}(z)$.

[11] Note that the price $P(h,z)$ directly enters the probability of repayment. This complication relative to the seminal paper by Eaton and Gersovitz (1981) makes equilibrium price determination a fixed-point problem—probability of default is directly impacted by the price, which is in turn affected by the default probability. To get around this conceptual problem, Abramson (forthcoming) simplifies the analysis by restricting to environments where the probability of default is independent of P. The binary nature of the income distribution in Corbae, Glover, and Nattinger (2023) yields a similar simplification.

## 2.3 Rental Housing Availability

We now use the above analysis to characterize the set of houses $\mathcal{H}(z, \rho)$ that landlords are willing to offer to a tenant with productivity $z$ under the eviction regime severity $\rho$. Figure 1 graphically illustrates this characterization. The solid red line in Figure 1 plots the willingness-to-pay condition (2) at equality, so all contracts lying weakly below this line satisfy condition (2). The dashed blue line plots the landlord break-even condition (3). The right endpoint of this line represents the largest house size consistent with the break-even condition, $\bar{h}(z)$. For a house $h$ to be offered to an individual with productivity $z$ in equilibrium, its price must satisfy both the willingness-to-pay condition (2) and the break-even condition (3). Graphically, this requires the contract $(h, P(h, z))$ to lie on the blue line and weakly below the red line. If the two lines do not intersect, no houses are offered to the individual.

**Figure 1:** Determination of the Set of Available Houses, $\mathcal{H}(z)$




To obtain the analytical counterpart of this characterization, we need to identify the smallest and the largest houses offered to tenant $z$. We do so by identifying the house sizes for which (2) holds with equality and (3) is satisfied, that is,

$$\theta\rho \ln\frac{h}{\underline{h}} + \chi + \rho\gamma = \frac{z\bar{y}}{2}\left(1 - \sqrt{1 - \frac{4\delta h}{z\bar{y}}}\right). \tag{4}$$

If there is no $h$ solving (4) (e.g., when $z$, $\chi$, and $\gamma$ are sufficiently small), then no houses are offered to individual $z$. Equation (4) has at most two roots. The smallest house offered to individual $z$, denoted by $h_{\min}(z, \rho)$, is the left root of (4). Denote the largest house offered to individual $z$ by $h_{\max}(z, \rho)$. If $\bar{h}(z)$ and its corresponding break-even price satisfy the willingness-to-pay condition (2), then $h_{\max}(z, \rho) = \bar{h}(z)$. Otherwise, $h_{\max}(z, \rho)$ is the right root of (4) (this is the case depicted on Figure 1). Thus, $\mathcal{H}(z, \rho) = [h_{\min}(z, \rho), h_{\max}(z, \rho)]$, as indicated by the shaded region in Figure 1. The following lemma summarizes this analysis.

**Lemma 3 (The Set of Available Houses)** *(i) If* (4) *has no solution, then* $\mathcal{H}(z, \rho) = \emptyset$. *Otherwise,* $\mathcal{H}(z, \rho) = [h_{\min}(z, \rho), h_{\max}(z, \rho)]$.

*(ii)* $h_{\min}(z, \rho)$ *is the left root of* (4).

*(iii) If* $\bar{h}(z)$ *satisfies the willingness-to-pay condition* (2)*, then* $h_{\max}(z, \rho) = \bar{h}(z)$. *Otherwise,* $h_{\max}(z, \rho)$ *is the right root of* (4).

It is worth noting that the absence of very small houses, $h < h_{\min}(z, \rho)$, in the set of offered rentals is driven by the tenant's incentives to pay rent, which in turn are limited by $\underline{h}$.[12] While the landlords' break-even condition can in principle price arbitrarily small houses, individuals are not willing to pay the break-even price for them, which eliminates such houses from the offered set.

We now turn to comparative statics. Our first result states that more productive individuals face a larger set of housing options. Graphically, this result follows from the fact that the blue line in Figure 1 moves down with $z$, while the red line is unaffected.

**Proposition 1 (More Houses Available to Richer Tenants)** *If* $\mathcal{H}(z, \rho) \neq \emptyset$ *then* $\mathcal{H}(z, \rho)$ *is strictly increasing in z:* $h_{\min}(z, \rho)$ *is strictly decreasing in z and* $h_{\max}(z, \rho)$ *is strictly increasing in z.*

Thus, poor individuals face especially limited housing options and might be more constrained in their choice of housing.

Since individuals will never pay for a house weakly smaller than their free outside option, the relevant set of choices is $\hat{\mathcal{H}}(z, \rho) = \mathcal{H}(z, \rho) \cap (\underline{h}, \infty)$. We refer to $\hat{\mathcal{H}}(z, \rho)$ as the set of relevant available houses. When $\chi = \gamma = 0$, any $h$ satisfying (2) must strictly exceed $\underline{h}$, so $\hat{\mathcal{H}}(z, \rho) = \mathcal{H}(z, \rho)$. Graphically, the value $\underline{h}$ is located at the intersection of the red line with the horizontal axis if $\chi = \gamma = 0$, and to the right of it otherwise (as depicted on Figure 1).

We next study how the severity of the eviction regime affects the set $\hat{\mathcal{H}}(z, \rho)$.

[12] In the limit as $\underline{h} \to 0$, the left-hand side of (2) approaches $+\infty$, and the willingness-to-pay condition is therefore always satisfied.

**Theorem 1 (More Houses Available in Stricter Eviction Regimes)** *If $\hat{\mathcal{H}}(z, \rho) \neq \emptyset$, then $\hat{\mathcal{H}}(z, \rho)$ is increasing in $\rho$. If $h_{\max}(z, \rho) < \bar{h}(z)$, then $\hat{\mathcal{H}}(z, \rho)$ is strictly increasing in $\rho$.*

Theorem 1 shows that stricter eviction regimes expand the set of relevant available housing options. Graphically, an increase in $\rho$ shifts the red willingness-to-pay curve in Figure 1 upward for $h > \underline{h}$, thereby expanding the interval $[h_{\min}(z, \rho), h_{\max}(z, \rho)]$. Intuitively, a higher $\rho$ raises the expected cost of default, which raises tenants' willingness to pay and makes a wider range of contracts sustainable.

We now establish that sufficiently poor individuals are excluded from the rental market. Define $\underline{z} \equiv 4\delta\underline{h}/\bar{y}$, which is the productivity level at which $\bar{h}(\underline{z}) = \underline{h}$. For $z \leqslant \underline{z}$, landlords are only willing to offer houses $h \leqslant \underline{h}$. Graphically, this corresponds to the right endpoint of the blue curve lying weakly to the left of $\underline{h}$. Hence, individuals with $z \leqslant \underline{z}$ are necessarily excluded from the rental market. Notice that the lower bound $\underline{z}$ does not depend on the eviction regime severity $\rho$.

Proposition 2 establishes the existence of a threshold productivity $\hat{z}(\rho)$ below which no relevant rental options are offered. First, note that $\hat{z}$ must exceed $\underline{z}$. Second, when the outside option is very attractive, no houses might be acceptable regardless of $z$, and hence $\hat{z}$ might be infinite. Proposition 2 provides a sufficient condition for $\hat{z}$ to be finite.

**Proposition 2 (Poor Are Excluded from the Rental Market)** *(i) There exists a threshold productivity $\hat{z}(\rho) \in (\underline{z}, \infty]$ such that $\hat{\mathcal{H}}(z, \rho) = \emptyset$ if and only if $z < \hat{z}$.*

*(ii) The threshold is finite, $\hat{z}(\rho) < \infty$, if and only if* $\theta\rho\left(\ln\frac{\theta\rho}{\delta\underline{h}} - 1\right) + \chi + \rho\gamma > 0$.

The next result shows how the threshold $\hat{z}(\rho)$ varies with $\rho$: when the eviction regime is stricter, the marginal renter who is just offered a relevant rental option has lower productivity.

**Proposition 3 (More Potential Renters in Stricter Eviction Regimes)** *The threshold $\hat{z}(\rho)$ is strictly decreasing in $\rho$.*

Although individuals with $z \geqslant \hat{z}(\rho)$ are offered rental contracts, they may still prefer the outside option. Using the willingness-to-pay condition (2), we can show that if $\chi$ and $\gamma$ are low enough, then the individual who is offered houses is always better off renting than taking the outside option. Define $\Delta(z, \rho) \equiv V^r(z, \rho) - V^{out}(z)$.

**Proposition 4 (All Who Can Rent Do)** *If $\chi$ and $\gamma$ are small enough, then $\Delta(z, \rho) \geqslant 0$ for all $z \geqslant \hat{z}(\rho)$ and all $\rho < 1$.*

Thus, when the utility costs associated with nonpayment and eviction are small, all individuals offered a rental contract choose to rent. Those with $z < \hat{z}$ are excluded from the rental market, while those with $z \geqslant \hat{z}$ rent. Propositions 3 and 4 together imply the following result:

**Corollary 1 (Household Formation for Low Utility Cost of Nonpayment and Eviction)** *Suppose $\chi$ and $\gamma$ are small enough. Then household formation—defined as the set of individuals who rent rather than taking the outside option $\underline{h}$ in equilibrium—is strictly increasing in $\rho$.*

Corollary 1 is a special case of Theorem 3 that we will state in subsection 2.5 for general values of $\chi$ and $\gamma$. Before we can state this result generally, we need to characterize the individual's housing choice and welfare as functions of the eviction regime severity.

## 2.4 Equilibrium Housing Choice and Welfare

We begin by characterizing the individual's housing choice conditional on renting and then analyze the decision between renting and the outside option. The analysis of the rental housing choice depends on whether the willingness-to-pay constraint (2) binds at the optimal choice. When it does not bind, the choice of $h$ is *unconstrained* (by the willingness-to-pay); when it binds, the individual is restricted to the largest house landlords are willing to offer.

If (2) does not bind at the optimal rental choice, this optimal choice is

$$h^u(z,\rho) = \arg\max_{h \leqslant \bar{h}(z)} \frac{P(h,z)}{z\bar{y}}\Big(\theta(1-\rho)\ln h + \theta\rho\ln \underline{h} - \rho\gamma - \chi\Big) + \left(1 - \frac{P(h,z)}{z\bar{y}}\right)(\theta \ln h - P(h,z)),$$

where $P(h,z)$ is given by (3). Note that an increase in $\rho$ hurts the individual in this case because the price is independent of $\rho$, and the individual loses the house with a larger probability. As a result, $h^u(z,\rho)$ strictly decreases in $\rho$.

If (2) is violated at $h^u(z,\rho)$, the unconstrained choice is not available. In this case, the optimal choice conditional on renting satisfies $h^r(z,\rho) < h^u(z,\rho)$, and the renter selects the largest house landlords are willing to offer, $h^r(z,\rho) = h_{max}(z,\rho)$ (which is strictly smaller than $\bar{h}(z)$) by Lemma 2). In this case, the chosen housing size is strictly increasing in $\rho$. Interestingly, the individual's utility does not necessarily increase in $\rho$ in this case, as we will discuss below. The threshold $\rho^u(z)$ is the level of $\rho$ at which the unconstrained and constrained choices coincide, $h^u(z,\rho) = h_{max}(z,\rho)$. The constrained case arises below this threshold, while the unconstrained case arises above it.

We next discuss when the individual rents as opposed to taking the outside option as we vary $\rho$. Define $\hat{\rho}(z) = \hat{z}^{-1}(z)$ as the level of $\rho$ at which an individual with productivity

$z$ is just offered relevant rental options (see Proposition 2). For $\rho < \hat{\rho}(z)$, $\hat{\mathcal{H}}(z, \rho) = \emptyset$, and thus the individual has to take the outside option $\underline{h}$. Even when $\hat{\mathcal{H}}(z, \rho) \neq \emptyset$, the individual may still prefer $\underline{h}$ if $\chi$ and $\gamma$ are sufficiently high. Let $\rho^{in}$ denote the threshold at which the individual switches from taking the outside option to renting. When $\chi$ and $\gamma$ are low, Proposition 4 implies $\rho^{in} = \hat{\rho}$. In general, $\rho^{in} \geqslant \hat{\rho}$.[13]

Finally, since the individual's utility conditional on renting decreases with $\rho$ when (2) does not bind, it eventually can fall below the value of the outside option. We denote the threshold for $\rho$ when the individual switches from renting to taking $\underline{h}$ by $\rho^{out}(z)$. Note that $\rho^{out}(z) \geqslant 1$ if $\chi$ and $\gamma$ are low.

Combining these cases and denoting the equilibrium housing choice of an individual with productivity $z$ at the level of eviction regime severity $\rho$ by $h^*(z, \rho)$, we have the following result:

**Theorem 2 (Equilibrium Housing Choice and Welfare)** *There exist thresholds* $\rho^{in}(z)$, $\rho^*(z)$, $\rho^u(z)$, *and* $\rho^{out}(z)$ *satisfying* $\hat{\rho}(z) \leqslant \rho^{in}(z) \leqslant \rho^*(z) \leqslant \rho^u(z) \leqslant \rho^{out}(z)$ *and* $\rho^*(z) < \rho^u(z)$ *if* $\rho^{in}(z) < \rho^u(z)$, *such that*

*(i) If* $\rho < \rho^{in}$ *or* $\rho > \rho^{out}$ *then* $h^*(z, \rho) = \underline{h}$ *and* $V(z, \rho) = V^{out}(z)$ *is independent of* $\rho$.

*(ii) If* $\rho \in [\rho^{in}, \max\{\rho^{in}, \rho^u\})$ *then* $h^*(z, \rho) = h_{max}(z, \rho)$, *strictly increasing in* $\rho$. *Moreover,* $V(z, \rho)$ *is strictly increasing in* $\rho$ *on* $(\rho^{in}, \rho^*)$ *and is strictly decreasing on* $(\rho^*, \max\{\rho^{in}, \rho^u\})$.

*(iii) If* $\rho \in [\max\{\rho^{in}, \rho^u\}, \rho^{out}]$ *then* $h^*(z, \rho) = h^u(z, \rho)$, *strictly decreasing in* $\rho$. *Moreover,* $V(z, \rho)$ *is strictly decreasing in* $\rho$.

The key welfare trade-off in eviction policy design is between stronger commitment under a stricter regime and greater insurance under a laxer regime that allows delinquent tenants to remain housed with higher probability. Theorem 2 shows that the commitment effect dominates at low levels of $\rho$, when access to rental housing is the primary concern, whereas the insurance effect dominates at higher levels of $\rho$, when ex-ante housing affordability is less of a concern. This is reflected in housing choices and in individual welfare, both of which are hump-shaped in $\rho$. Commitment and insurance considerations exactly offset at $\rho^*$, where indirect utility is maximized.

Interestingly, there is an intermediate range of $\rho$ for which the individual's utility decreases even though their chosen housing size continues to increase with $\rho$. This can be seen from part (ii) of Theorem 2, which shows that for $\rho \in (\rho^*, \max\{\rho^{in}, \rho^u\})$, $V(z, \rho)$ decreases in $\rho$ while $h^*(z, \rho) = h_{max}(z, \rho)$ increases in $\rho$ (i.e., the maximizer $\rho^*$ of indirect utility lies strictly to the left of the maximizer of the housing size).

[13] When $\chi$ and $\gamma$ are large enough, $\rho^{in} \geqslant \rho^u$. In this case, when the individual chooses to rent, the optimal housing choice is always $h^u(z, \rho)$ (and never $h_{max}(z, \rho)$).

This observation has important implications for policy analysis: evaluating a policy by whether it enables individuals to rent larger housing units can be misleading. The increase in housing size reflects greater availability of housing arising from the tenant's higher willingness to pay. However, this comes at the cost of larger expected losses in the event of nonpayment, which are not fully offset by the additional utility from larger rental units.

Notice further that the thresholds in Theorem 2 depend on $z$. This means that the effects of an increase in eviction regime severity on housing choices and welfare are potentially heterogeneous across income groups. In particular, the level of eviction regime severity that maximizes the welfare of an individual with productivity $z$, $\rho^*(z)$, varies with $z$. In the case of quasi-linear utility, $\rho^*(z)$ can either increase or decrease with $z$, depending on parameter values. The main reason is the absence of an income effect. We illustrate numerically in Section 4 that under a more general utility function, $\rho^*(z)$ decreases with $z$. When there is an income effect, richer individuals consume substantially more housing than poorer individuals. As a result, they suffer more from eviction and therefore prefer a laxer eviction regime than poorer individuals.

## 2.5 Household Formation

We now turn to our final main result and the model's key testable implication.

**Theorem 3 (Household Formation)** *(i) There exists a threshold $z^{\text{in}}(\rho)$ such that individuals with $z \geqslant z^{\text{in}}(\rho)$ enter the rental market, while those with $z < z^{\text{in}}(\rho)$ take the outside option. Moreover, there exists $\bar{\rho}$ such that $z^{\text{in}}(\rho)$ is strictly decreasing for $\rho < \bar{\rho}$ and strictly increasing for $\rho > \bar{\rho}$. That is, household formation—the set of individuals who rent rather than take the outside option—is strictly increasing in $\rho$ for $\rho < \bar{\rho}$ and strictly decreasing in $\rho$ for $\rho > \bar{\rho}$. When $\chi$ and $\gamma$ are sufficiently low, $\bar{\rho} = 1$.*

The value $\bar{\rho}$ is given by $\rho^{\text{in}}(\underline{z}^{\text{in}})$, where $\underline{z}^{\text{in}}$ denotes the productivity of the marginal renter at their most preferred $\rho$, that is, the individual for whom $\rho^{\text{in}}(\underline{z}^{\text{in}}) = \rho^{\text{out}}(\underline{z}^{\text{in}}) = \rho^*(\underline{z}^{\text{in}})$. Such an individual is indifferent between renting and taking the outside option at their most preferred $\rho$, and does not rent for any other $\rho$. The value $\bar{\rho}$ is the level of eviction regime severity at which participation in the rental market (household formation) is maximized. We then define the threshold $z^{\text{in}}(\rho) = (\rho^{\text{in}})^{-1}(\rho)$ for $\rho \leqslant \bar{\rho}$, and $z^{\text{in}}(\rho) = (\rho^{\text{out}})^{-1}(\rho)$ for $\rho > \bar{\rho}$. When $\chi$ and $\gamma$ are sufficiently low, all individuals who are offered housing choose to rent. In this case, $z^{\text{in}}(\rho) = \hat{z}(\rho)$ and $\bar{\rho} = 1$.

Theorem 3 provides a testable implication for how eviction regime severity affects household formation. Importantly, our analysis further indicates that the impact of stricter eviction regimes on household formation is heterogeneous across the income distribution. The poorest individuals, with productivity below $\underline{z}^{\text{in}}(\geqslant \hat{z}(1))$, are excluded from the rental market regardless of $\rho$. On the other hand, relatively rich individuals who rent at $\rho$ continue to rent at $\rho' > \rho$ as long as $\rho' \leqslant \bar{\rho}$. Thus, neither group changes its renting decision as eviction severity increases. The margin of adjustment when eviction regime severity increases from $\rho$ to $\rho'$ comes from individuals with intermediate productivity, $z \in (z^{\text{in}}(\rho'), z^{\text{in}}(\rho)]$. Consequently, we expect the effect of eviction severity on household formation to be strongest among middle-income groups. Our empirical analysis suggests that this pattern indeed holds in the data.

Finally, recall our discussion at the end of Subsection 2.4 that, in the presence of the income effect (which is absent in the quasi-linear case studied in this section), we expect $\rho^*(z)$ to be decreasing in $z$, a conjecture confirmed numerically in Section 4. Notice that this implies that for $\rho \geqslant \bar{\rho}$, an increase in $\rho$ decreases the welfare of all individuals. The reason is that fewer individuals enter the rental market, and each existing renter is made strictly worse off (since their expected utility as a function of $\rho$ is decreasing in that region). In that sense, having eviction regime severity above $\bar{\rho}$ is akin to being on the "wrong side" of the Laffer curve. As we show in the next section, our empirical analysis indicates that an increase in eviction regime severity in the U.S. cross-sectional data is associated with greater household formation. This finding is consistent with eviction regime severity levels being to the left of $\bar{\rho}$.

We now take the model's prediction on household formation to the data.

# 3 Empirical Analysis

In this section, we first describe the data used in our empirical analysis. We then introduce our eviction regime severity index and explain why it provides an economically meaningful measure of eviction policies. Finally, we show that the data confirm the predictions of our theoretical model.

## 3.1 Data Description

To construct our measure of eviction regime severity, we use data from the Eviction Lab, which reports annual eviction filings, threatened households, and eviction judgments at the census-tract level.[14] In this dataset, eviction "filings" are the number of cases landlords file in court to remove tenants from a property in a given year. It is common for

[14] See Gromis, Fellows, Hendrickson, Edmonds, Leung, Porton, and Desmond (2022) for the data source.

a landlord to issue a series of eviction filings against the same household. To account for this, "threatened" households are defined as the number of unique households that receive at least one eviction filing in a given year. "Judgments" are the number of court-enforced evictions in which renters were ordered to leave, counted once per household that received an eviction judgment. Filing, threatened, and judgment rates are calculated as the corresponding numbers per 100 renter households.[15] We use data from 2000 to 2018, the years covered in the publicly available Eviction Lab data.

To test the predictions for household formation, we use data from the American Community Survey (ACS) conducted by the U.S. Census Bureau. For individual-level variables, we use annual data from 2014 to 2019. For census-tract-level variables, we use four consecutive five-year ACS samples—2011–2015, 2012–2016, 2013–2017, and 2014–2018.

To validate our index, we use data on rental nonpayment from the Survey of Income and Program Participation (SIPP) from the 2014, 2018, and 2019 panels. While the 2014 and 2018 panels contain multiple waves, we restrict attention to the first wave of each to avoid issues of attrition, which are likely correlated with rental nonpayments and evictions. In the resulting sample, 10% of renters report having been behind on rent in the past 12 months, indicating that nonpayment is a relatively common phenomenon.[16]

## 3.2 Eviction Regime Severity Index

To enable empirical analysis of eviction policies, we construct a simple and accessible measure of eviction regime severity across U.S. jurisdictions. We define the Eviction Regime Severity Index (ERSI) as the ratio of eviction judgments to eviction filings in a jurisdiction.[17] To construct the index, we sum each jurisdiction's annual counts of judgments and filings over 2000–2018 and compute ERSI as the total judgments divided by the total filings.[18]

Our preferred notion of a jurisdiction is a U.S. state, but we also present analysis using the county-level ERSI (see Appendix B.2). There are compelling arguments for treating

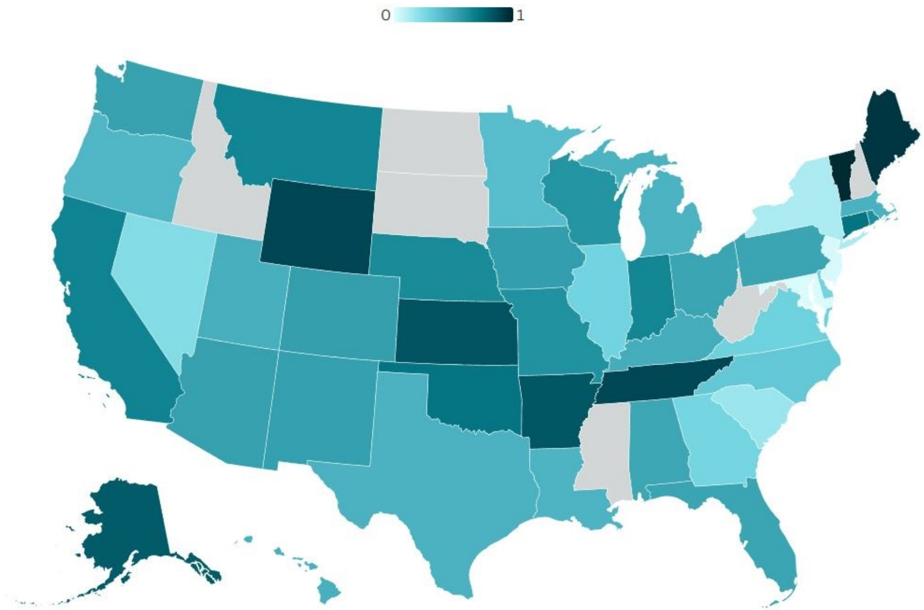
[15] In our sample, the average filing rate is 8%, the average threatened rate is 6.1%, and just under half of threatened households (2.8% of all renters) received an eviction judgment.

[16] For comparison, the share of homeowners who report missing a housing payment in that sample is 4%.

[17] There are several categorizations of states' eviction regimes based on the *letter of the law* in the legal literature—see, e.g., Rabin (1983), Mercer-Falkoff (1980), and Hatch (2017). We have also attempted constructing our own index based on the data from LawAtlas Project (Policy Surveillance Program, 2023). However, the legalistic indexes do not appear successful at quantitatively capturing the severity of the eviction regimes as they do not correlate with the outcomes of interest—for example, regressions in Merritt and Farnworth (2021) show that the categorization in Hatch (2017) does not have a clear relation with eviction filing rates across states. The correlation of our ERSI with Hatch (2017)'s categorization—indexing pro-tenant as 0, pro-landlord as 1, and in between as 0.5—is 0.07.

[18] Our index is robust to changes in the range of years used to construct it.

**Figure 2:** Eviction Regime Severity Index by U.S. States




*Note:* Missing data for some states are due to the lack of coverage in the Eviction Lab data.

both states and counties as the relevant jurisdiction for eviction regimes: while most legislation is enacted at the state level, many counties and cities have their own regulations and legal practices. State-level ERSI values are mapped in Figure 2 and listed in Table B1 in Appendix B.1, while county-level values are mapped in Figure B1 in Appendix B.2.

Because of concerns about the quality of the judgment data (for example, the implausibly low numbers reported for New Jersey) and as a robustness check, we also examine an alternative measure: the ratio of threatened households to eviction filings. "Threatened" can be interpreted as correcting for multiple-counting, since many tenants receive several filings in the same year at the same address. This alternative measure captures the idea that jurisdictions with laxer eviction regimes have landlords filing more aggressively, resulting in more filings per threatened household. The correlation between this alternative index and our original index is 0.81 at the state level and 0.63 at the county level. Most of our results are robust to using this alternative measure (see Appendix B.3).

## 3.3 Index Validation

In this section, we validate the index by testing whether higher ERSI is negatively related to rent nonpayment, conditional on observables. We perform two exercises. First, using the SIPP data, we regress an indicator for being behind on rent on ERSI. Table 1 reports the results. Column (1) presents estimates without controls, while column (2) adds controls for income, rent, and other variables. The coefficient on ERSI is negative in both specifications and becomes significant at the 10% level once controls are included.

**Table 1:** Regression of Rental Nonpayment on ERSI Using SIPP

| | (1) | (2) |
|---|---|---|
| Eviction Regime Severity Index | -0.015 | -0.021* |
| | (0.013) | (0.013) |
| Log Monthly Household Income | | -0.007*** |
| | | (0.002) |
| Log Monthly Rent | | -0.001 |
| | | (0.002) |
| College Degree | | -0.060*** |
| | | (0.005) |
| Unemployment Spell | | 0.020*** |
| | | (0.006) |
| Age | | 0.007*** |
| | | (0.001) |
| Age$^2$ | | -0.000*** |
| | | (0.000) |
| Year Fixed Effect | | X |
| Mean | 0.100 | 0.100 |
| Obs | 17,852 | 17,852 |
| $R^2$ | 0.000 | 0.016 |

*Note:* The outcome variable is a binary variable that equals 1 if the household has been behind on rent payment in the past 12 months and 0 otherwise. Observations only include renter households, individual characteristics are of the household head. Column (2) includes year fixed effects. Regressions are weighted using the SIPP sample weights. Income is winsorized at zero before adding one and taking log. Robust standard errors are reported in parentheses.

While the advantage of the SIPP is that it contains information on rental nonpayments, the dataset is small and there are limitations in the quality of the data. We therefore turn to the Eviction Lab data and use the threatened rate as a proxy for rental nonpayment. Specifically, we regress threatened rates at the census-tract level on the state ERSI, controlling for tract-level characteristics such as median rent and unemployment. Table 2 reports the results.[19] We find that locations with higher ERSI values tend to have significantly lower threatened rates. In addition, the ERSI serves as a useful proxy for state fixed effects, capturing roughly half of the variation in the regression R-squared explained by including state fixed effects directly.

We also compute the ERSI at the county level, for all counties in which the Eviction Lab reports tract-level data. While we cannot re-run the regression on rental nonpayments because of SIPP data limitations, we do re-run the regression on threatened rates using

[19] Using the filing rate instead of the threatened rate as a proxy for rental nonpayment produces similar results, see Table B2 in Appendix B.1.

**Table 2:** Regression of Census Tract Average Threatened Rates on ERSI Using ACS

| | (1) | (2) | (3) | (4) |
|---|---|---|---|---|
| Eviction Regime Severity Index | -13.510*** | -12.964*** | | |
| | (2.071) | (1.349) | | |
| Log Median Rent | | 0.725 | 1.116*** | 2.062*** |
| | | (0.468) | (0.348) | (0.655) |
| Log Median Renter Household Income | | 0.347 | 0.068 | 0.581 |
| | | (0.309) | (0.261) | (0.397) |
| Unemployment Rate | | 0.063** | 0.095*** | 0.085** |
| | | (0.033) | (0.020) | (0.034) |
| Log Median Home Value | | -2.288*** | -0.888*** | -1.069** |
| | | (0.520) | (0.318) | (0.578) |
| State Fixed Effect | | | X | |
| Year and Demographic Controls | | X | X | X |
| Mean | 6.062 | 6.042 | 6.042 | 6.042 |
| Number of Observations | 37,200 | 29,239 | 29,239 | 29,239 |
| $R^2$ | 0.135 | 0.399 | 0.518 | 0.299 |

*Note:* The outcome variable is the average eviction threatened rate of the census tract for the previous five years, conditional on availability. Only one observation is used per census tract, the last year it is observed. Tracts with average filing rates above 100 are excluded. The control variables consist of the 5-year tract variables from the ACS, as well as the state ERSI. Demographic controls include tract education and age compositions. Column (2) includes the state ERSI, while (3) includes state fixed effects. Column (4) includes only the control variables. Regressions are weighted by number of renting households per the census tract, and standard errors are clustered at the county level. Robust standard errors are reported in parentheses.

county-level ERSIs. The results, reported in Table B4 in Appendix B.2, closely mirror those in Table 2, further validating our measure of eviction regime severity.

Combined, the above findings suggest that our index is a sensible measure of the eviction regime severity, as it correlates in the way we expect to the measures of rental nonpayments.

## 3.4 Testing the Model's Predictions

We now turn to testing the model's prediction on household formation. Corollary 1 states that household formation increases with the severity of the eviction regime, $\rho$. Stricter policy allows landlords to offer more rental housing, enabling individuals who previously chose the outside option (such as living with parents) to enter the rental market. We test this prediction using two regressions.

In our first regression, we use ACS data to construct a binary variable equal to 1 if the individual lives in a household where a parent or parent-in-law is the household head, and 0 otherwise.[20] We regress this variable on the ERSI—the empirical counterpart of

[20]We cannot observe whether an unmarried individual is living with a parent of their partner due to ACS data limitations. So this construction of the dependent variable would incorrectly identify such an individual as having formed a household (i.e., not living with parents). This issue will not arise in our second regression specification, reported in Table 4.

ρ—together with additional controls. Table 3 reports the results.

**Table 3:** Regression of Living with a Parent on ERSI Using ACS

| | Ages 18-35 (1) | Ages 18-35 (2) | Ages 18-35 (3) | Ages 40-60 (4) |
|---|---|---|---|---|
| Eviction Regime Severity Index | -0.063*** | -0.048*** | -0.060*** | 0.001 |
| | (0.002) | (0.002) | (0.004) | (0.002) |
| Log Income | | -0.017*** | | |
| | | (0.000) | | |
| Income Quartile 2 | | | -0.074*** | -0.023*** |
| | | | (0.003) | (0.001) |
| Income Quartile 3 | | | -0.148*** | -0.045*** |
| | | | (0.002) | (0.001) |
| Income Quartile 4 | | | -0.242*** | -0.064*** |
| | | | (0.002) | (0.001) |
| ERSI × Income Quartile 2 | | | -0.010** | -0.006** |
| | | | (0.005) | (0.002) |
| ERSI × Income Quartile 3 | | | -0.023*** | -0.007*** |
| | | | (0.005) | (0.002) |
| ERSI × Income Quartile 4 | | | 0.023*** | -0.004* |
| | | | (0.004) | (0.002) |
| Log Average State Home Value | | 0.111*** | 0.125*** | 0.016*** |
| | | (0.002) | (0.002) | (0.001) |
| Age | | -0.021*** | -0.018*** | -0.003*** |
| | | (0.000) | (0.000) | (0.000) |
| Year and Demographic Controls | | X | X | X |
| Mean | 0.281 | 0.281 | 0.281 | 0.053 |
| Obs | 2,712,552 | 2,712,552 | 2,712,552 | 5,040,625 |
| $R^2$ | 0.001 | 0.195 | 0.213 | 0.082 |

*Note:* The outcome variable is a binary variable that equals 1 if the individual lives in a household in which their parent or a parent-in-law is the head of the household, and 0 otherwise. Columns (2) through (4) include year, race, gender, and marital status controls. Regressions include only individuals not in group quarters nor currently in school, of ages 18 to 35 for columns (1) through (3), and ages 40 to 60 for column (4). Income is winsorized at zero before adding one and taking log. Robust standard errors are reported in parentheses.

In our main specification (columns (1)–(3)), we restrict the sample to individuals ages 18 to 35, excluding students. The coefficient on the ERSI is negative and significant at the 1% level, consistent with the model's prediction. To get an idea of the magnitude of the effect, take column (1) without additional controls. Increasing the ERSI from, for example, the Illinois level (0.28) to the Indiana level (0.64) reduces the fraction of young individuals living with parents by 2.3 percentage points.[21]

Our theoretical analysis further suggests that the effect of eviction regime severity on entering the rental market is strongest among individuals with intermediate income levels. To test this, we interact the ERSI with binary indicators for income quartiles (column (3)). The estimated effects of the ERSI on living with parents are negative across all quar-

[21] The state-level ERSI values can be found in Table B1.

tiles, strongest for the third quartile, stronger for the second than for the first, and weakest for the fourth quartile. This pattern indicates that as income increases, the effect of the ERSI on living with a parent first becomes more negative and then less negative, consistent with the model's predictions for $\rho < \bar{\rho}$.[22] Taken together, these results highlight the importance of heterogeneous policy effects across the income distribution.

**Table 4:** Regression of Being a Household Head on ERSI Using ACS

| | Ages 18-35<br>(1) | Ages 18-35<br>(2) | Ages 18-35<br>(3) | Ages 40-60<br>(4) |
|---|---|---|---|---|
| Eviction Regime Severity Index | 0.072*** | 0.046*** | 0.056*** | 0.000 |
| | (0.002) | (0.002) | (0.003) | (0.002) |
| Log Income | | 0.022*** | | |
| | | (0.000) | | |
| Income Quartile 2 | | | 0.085*** | 0.088*** |
| | | | (0.002) | (0.002) |
| Income Quartile 3 | | | 0.180*** | 0.145*** |
| | | | (0.002) | (0.001) |
| Income Quartile 4 | | | 0.303*** | 0.180*** |
| | | | (0.002) | (0.001) |
| ERSI × Income Quartile 2 | | | 0.021*** | 0.005 |
| | | | (0.005) | (0.003) |
| ERSI × Income Quartile 3 | | | 0.033*** | 0.004 |
| | | | (0.005) | (0.003) |
| ERSI × Income Quartile 4 | | | -0.020*** | -0.000 |
| | | | (0.004) | (0.003) |
| Log Average State Home Value | | -0.166*** | -0.185*** | -0.079*** |
| | | (0.002) | (0.002) | (0.001) |
| Age | | 0.024*** | 0.020*** | 0.001*** |
| | | (0.000) | (0.000) | (0.000) |
| Year and Demographic Controls | | X | X | X |
| Mean | 0.623 | 0.623 | 0.623 | 0.872 |
| Obs | 2,712,552 | 2,712,552 | 2,712,552 | 5,040,625 |
| $R^2$ | 0.001 | 0.286 | 0.310 | 0.202 |

*Note:* The outcome variable is a binary variable that equals 1 if the individual is a household head or a spouse/unmarried partner/housemate of a household head, and 0 otherwise. Columns (2) through (4) include year, race, gender, and marital status controls. Regressions include only individuals not in group quarters nor currently in school, of ages 18 to 35 for columns (1) through (3), and ages 40 to 60 for column (4). Income is winsorized at zero before adding one and taking log. Robust standard errors are reported in parentheses.

Intuitively, our predictions are most relevant for younger individuals deciding whether to move out of their parents' homes, so we expect the effect of the ERSI on household formation to be smaller for older individuals. To check this, column (4) of Table 3 reports results from a "placebo" regression—the same specification as column (3), but for individuals ages 40 to 60. For this group, the estimated relationship between eviction

[22] As we discussed in Subsection 2.5, outcomes with $\rho \geqslant \bar{\rho}$ are Pareto dominated by those with $\bar{\rho}$. Our regression results suggest that such high levels of $\rho$ are not relevant empirically.

regime severity and living with parents is small and insignificant.[23] Thus, a stricter eviction regime is associated with lower cohabitation with parents among the young, while having little effect on it among middle-aged individuals.

In our second regression testing household formation, the dependent variable is a binary indicator equal to 1 if the individual is the household head or the spouse, unmarried partner, or housemate of the household head, and 0 otherwise. The rest of the specification is the same as in Table 3. The results, reported in Table 4, are consistent with those from the first regression and extend to this alternative test. In particular, stricter eviction regimes are associated with greater likelihood of being a household head among young individuals, and the effect first increases and then decreases with income.

Our results on household formation are robust both to using county-level ERSI (see Tables B5 and B6 in Appendix B.2) and to using the alternative index based on the threatened rate (see Tables B10 and B11 in Appendix B.3). Moreover, the results are robust to controlling for the individuals' college attainment and allowing for the effects of the policy to vary across the educational groups (see Tables B3 and B7)—stricter eviction regimes facilitate household formation for both educational groups.

# 4 Generalized Model: Numerical Examples

In Section 2 we considered a stark case of quasi-linear utility that made our theoretical analysis tractable. In this section, we numerically verify that our mechanism extends to the case with a more general utility function. We set the utility function to

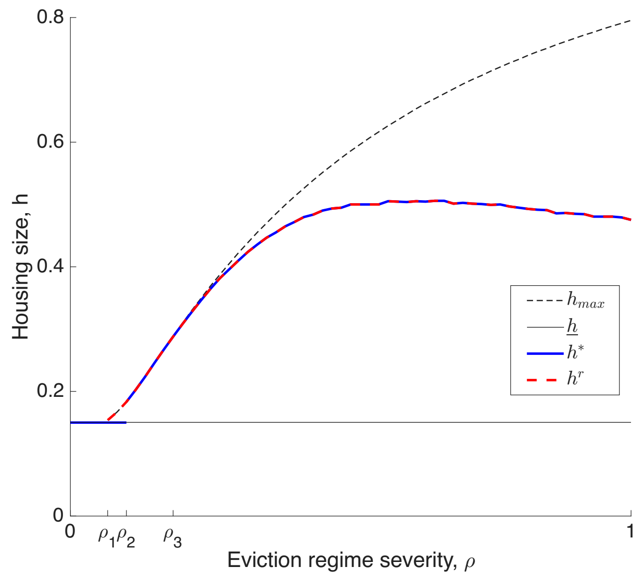
$$U(c,h) = \frac{[\alpha c^{\nu} + (1-\alpha)h^{\nu}]^{\frac{1-\sigma}{\nu}}}{1-\sigma},$$

which is standard in the housing literature.[24] The distribution of $y$ is uniform on $[\underline{y}, \bar{y}]$. We use the following parameter values: $\sigma = 1.5$, $\nu = -0.5$, $\alpha = 0.6$, $\chi = 0.1$, $\gamma = 0.25$, $\underline{h} = 0.15$, $\delta = 0.35$, $\underline{y} = 0.2$, and $\bar{y} = 1.5$.

Figure 3 plots the largest available housing and the individual's optimal housing choice as functions of $\rho$ for a fixed value of productivity $z = 0.85$. The value $h_{max}$ is strictly increasing in $\rho$, consistent with Theorem 1. For low eviction regime severity ($\rho < \rho_1$), individuals are excluded from the rental market. When $\rho$ reaches $\rho_1$, the set $\hat{\mathcal{H}}$ becomes non-empty. For $\rho \in [\rho_1, \rho_2)$ the individual's optimal choice remains the outside option. For $\rho \in [\rho_2, \rho_3)$ renting becomes preferable to the outside option but the optimal choice of

[23] As expected, the average cohabitation-with-parents rate is also lower for ages 40–60 than for ages 18–35.
[24] See, e.g., Kaplan, Mitman, and Violante (2020).

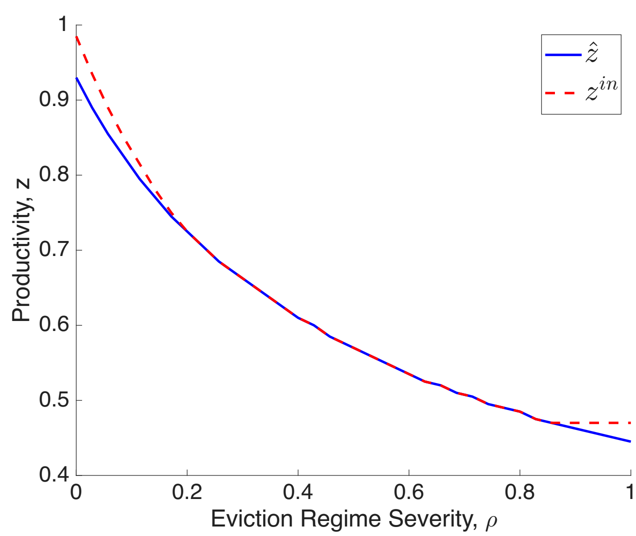
**Figure 3:** Available Housing and Optimal Housing Choice as a Function of $\rho$




*Note:* The figure depicts the maximum housing size offered, $h_{max}$, the minimum housing size offered, $h_{min}$, the choice of rental housing conditional on renting, $h^r$, and the optimal choice of housing (either renting or choosing $\underline{h}$), $h^*$, as functions of eviction regime severity, $\rho$ (right panel). The value of $z$ is set to 0.85.

housing is constrained by $h_{max}$. Finally, for $\rho \geqslant \rho_3$, the choice of housing is unconstrained by $h_{max}$. Notice that $h^*$ eventually starts decreasing with $\rho$ in this range. As the expected cost of nonpayment and eviction rises, the individual may choose to decrease their house size to partially lower that cost.

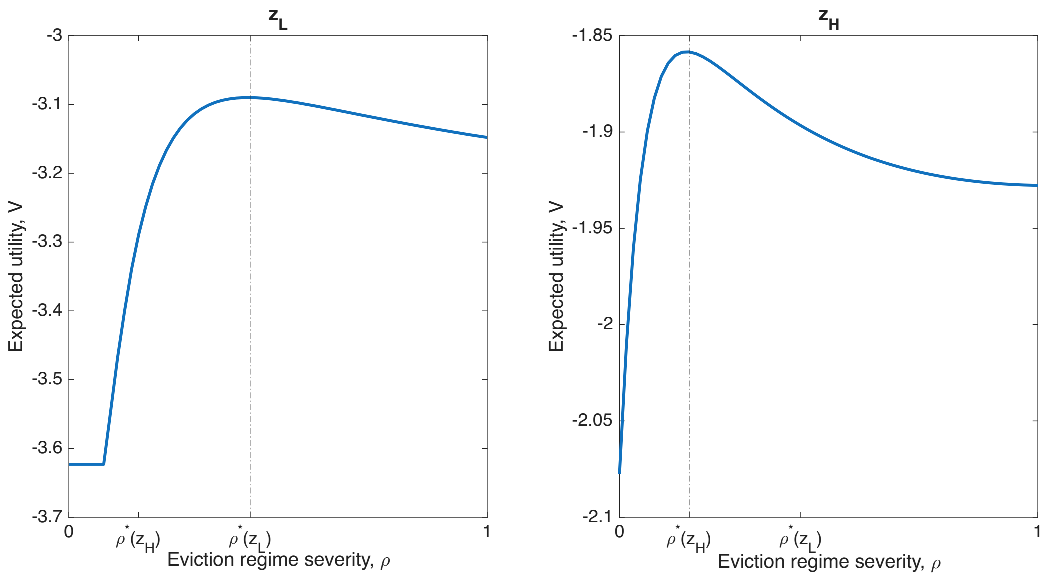
**Figure 4:** Productivity Thresholds for Housing Availability and Household Formation




*Note:* The figure depicts the productivity thresholds for housing availability, $\hat{z}$, and household formation, $z^{in}$, as functions of $\rho$.

We next turn to our results on how housing availability and household formation are affected by eviction regime severity. Figure 4 plots the productivity thresholds above which individuals are offered relevant housing options, $\hat{z}$, and choose to rent, $z^{in}$, as functions of $\rho$. The threshold $\hat{z}$ is strictly decreasing in $\rho$, consistent with Proposition 3. The threshold $z^{in}$ decreases (and hence household formation increases) in $\rho$ to the left of some threshold, consistent with Theorem 3.

**Figure 5:** Expected Utility as a Function of $\rho$.




*Note:* The figure depicts the expected utility, $V(z, \rho)$, as a function of $\rho$ for two productivity levels, $z_L = 0.85$ (left panel) and $z_H = 2.35$ (right panel). The value $\rho^*(z_i)$ corresponds to the utility maximizing level of $\rho$ of an individual with productivity $z_i$.

Finally, we examine how eviction regime severity affects welfare. Figure 5 plots the expected utilities of individuals with productivities $z_L = 0.85$ and $z_H = 2.35$ (left and right panels, respectively) as functions of $\rho$. The shape of the expected utility as a function of $\rho$ is consistent with Theorem 2. Moreover, the level eviction regime severity most preferred by individual with productivity $z$, $\rho^*(z)$, moves to the left with $z$. This means in particular that between $\rho^*(z_H)$ and $\rho^*(z_L)$, the individual with $z_L$ benefits from stricter eviction policy, and while the individual with $z_H$ prefers a laxer one.

Overall, our numerical examples demonstrate that the model's key mechanisms are not dependent on the strong functional form assumptions used for the analytical results. Furthermore, the interaction between eviction severity and the rental market generates differential outcomes when accounting for individual heterogeneity.

# 5 Conclusion

We constructed a tractable model of evictions and examined how eviction regime severity affects availability and affordability of rental housing to prospective tenants across the income distribution. Our main finding is that a stricter eviction regime enlarges the set of available rental housing, leading to greater household formation among relatively poor—but not the poorest—individuals. This prediction is consistent with our empirical findings. To conduct the empirical analysis, we constructed a novel index of eviction regime severity using data from the Eviction Lab. This index is negatively correlated with available measures of rental nonpayment.

Future empirical research could investigate the extent to which eviction regimes in the United States are shaped by state laws versus local (city or county) regulations. Our index can be constructed at either jurisdictional level.

An interesting direction for further theoretical analysis is to model the supply of rental housing more explicitly. While our framework assumes a perfectly elastic, constant-marginal-cost supply of rental units, a more realistic approach could allow for increasing marginal costs, for example due to a fixed factor such as land. Such a model would generate equilibrium price effects from the entry of additional renters in response to a stricter eviction regime. These price spillovers would further harm richer tenants and attenuate the positive effects of stricter regimes on poorer ones.

# References


ABRAMSON, B. (forthcoming): "The Equilibrium Effects of Eviction Policies," *Journal of Finance*.

ABRAMSON, B., AND S. VAN NIEUWERBURGH (2025): "Rent Guarantee Insurance," NBER Working Paper 32582.

AHMAD, O., AND I. LIVSHITS (2024): "Missed Rent: Path to Eviction or Loan from Landlord?," *Economic Insights*, 9(4).

AREFEVA, A., K. JOWERS, Q. HU, AND C. TIMMINS (2024): "Discrimination During Eviction Moratoria," NBER Working Paper 32289.

AUTOR, D. H., C. J. PALMER, AND P. A. PATHAK (2014): "Housing Market Spillovers: Evidence from the End of Rent Control in Cambridge, Massachusetts," *Journal of Political Economy*, 122(3), 661–717.

CHATTERJEE, S., D. CORBAE, M. NAKAJIMA, AND J.-V. RÍOS-RULL (2007): "A Quantitative Theory of Unsecured Consumer Credit with Risk of Default," *Econometrica*, 75(6), 1525–1589.

COLLINSON, R., J. E. HUMPHRIES, S. KESTELMAN, S. NESLON, W. VAN DIJK, AND D. WALDINGER (2024): "Equilibrium Effects of Eviction Protections: The Case of Legal Assistance," Mimeo.

COLLINSON, R., J. E. HUMPHRIES, N. MADER, D. REED, D. TANNENBAUM, AND W. VAN DIJK (2024): "Eviction and Poverty in American cities," *The Quarterly Journal of Economics*, 139(1), 57–120.

COOPER, D., AND M. J. LUENGO-PRADO (2018): "Household Formation over Time: Evidence from Two Cohorts of Young Adults," *Journal of Housing Economics*, 41, 106–123.

CORBAE, D., A. GLOVER, AND M. NATTINGER (2023): "Equilibrium Evicitons," Federal Reserve Bank of Kansas City Working Paper 23-03.

DESMOND, M. (2017): *Evicted: Poverty and Profit in the American city*. Crown.

DESMOND, M., AND R. T. KIMBRO (2015): "Eviction's Fallout: Housing, Hardship, and Health," *Social Forces*, 94(1), 295–324.

DIAMOND, R., T. MCQUADE, AND F. QIAN (2019): "The Effects of Rent Control Expansion on Tenants, Landlords, and Inequality: Evidence from San Francisco," *American Economic Review*, 109(9), 3365–3394.

EATON, J., AND M. GERSOVITZ (1981): "Debt with Potential Repudiation: Theoretical and Empirical Analysis," *Review of Economic Studies*, 48(2), 289–309.

ELLEN, I. G., K. O'REGAN, S. HOUSE, AND R. BRENNER (2021): "Do Lawyers Matter? Early Evidence on Eviction Patterns after the Rollout of Universal Access to Counsel in New York City," *Housing Policy Debate*, 31(3-5), 540–561.

ERMISCH, J., AND P. DI SALVO (1997): "The Economic Determinants of Young People's Household Formation," *Economica*, 64(256), 627–644.

GARDNER, M., AND B. ASQUITH (2025): "The Effect of Rent Control Status on Eviction Filing Rates: Causal Evidence from San Francisco," *Housing Policy Debate*, 35(2), 334–354.

GEDDES, E., AND N. HOLZ (2025): "Rational Eviction: How Landlords Use Evictions in Response to Rent Control," *Journal of Housing Economics*, 68, 102047.

GLAESER, E. L., AND E. F. P. LUTTMER (2003): "The Misallocation of Housing under Rent Control," *American Economic Review*, 93(4), 1027–1046.

GROMIS, A., I. FELLOWS, J. R. HENDRICKSON, L. EDMONDS, L. LEUNG, A. PORTON, AND M. DESMOND (2022): "Estimating Eviction Prevalence across the United States," Princeton University Eviction Lab. https://data-downloads.evictionlab.org/#estimating-eviction-prevalance-across-us/. Deposited May 13, 2022.

HATCH, M. E. (2017): "Statutory Protection for Renters: Classification of State Landlord–Tenant Policy Approaches," *Housing Policy Debate*, 27(1), 98–119.

HAURIN, D. R., P. H. HENDERSHOTT, AND D. KIM (1993): "The Impact of Real Rents and Wages on Household Formation," *The Review of Economics and Statistics*, pp. 284–293.

HUMPHRIES, J. E., S. NELSON, D. L. NGUEN, W. VAN DIJK, AND D. WALDINGER (2024): "Nonpayment and Eviction in the Rental Housing Market," Mimeo.

IMROHOROGLU, A., AND K. ZHAO (2022): "Homelessness," SSRN Working Paper 4308222.

KAPLAN, G., K. MITMAN, AND G. L. VIOLANTE (2020): "The Housing Boom and Bust: Model Meets Evidence," *Journal of Political Economy*, 128(9), 3285–3345.

KHOLODILIN, K. A. (2024): "Rent Control Effects through the Lens of Empirical Research: An Almost Complete Review of the Literature," *Journal of Housing Economics*, 63, 101983.

LIVSHITS, I., J. MACGEE, AND M. TERTILT (2007): "Consumer Bankruptcy: A Fresh Start," *American Economic Review*, 97(1), 402–418.

MERCER-FALKOFF, R. D. (1980): "The Uniform Residential Landlord and Tenant Act: The Impact of Existing State Laws," *Journal of Legislation*, 7, 158.

MERRITT, B., AND M. D. FARNWORTH (2021): "State Landlord–Tenant Policy and Eviction Rates in Majority-Minority Neighborhoods," *Housing Policy Debate*, 31(3-5), 562–581.

PACIORECK, A. (2016): "The Long and the Short of Household Formation," *Real Estate Economics*, 44(1), 7–40.

PATTISON, N. (2024): "Landlords as Lenders of Last Resort? Late Housing Payments During Unemployment," Southern Methodist University, Department of Economics Working Papers 2401.

POLICY SURVEILLANCE PROGRAM (2023): "LawAtlas: State/Territory Eviction Laws," Temple University Center for Public Health Law Research, Policy Surveillance Program. Accessed December 12, 2023.

RABIN, E. H. (1983): "Revolution in Residential Landlord-Tenant Law: Causes and Consequences," *Cornell Law Review*, 69, 517.

SIMS, D. P. (2007): "Out of Control: What Can We Learn from the End of Massachusetts Rent Control?," *Journal of Urban Economics*, 61(1), 129–151.

WHITTINGTON, L. A., AND E. H. PETERS (1996): "Economic Incentives for Financial and Residential Independence," *Demography*, 33(1), 82–97.

ZAME, W. R. (1993): "Efficiency and the Role of Default When Security Markets are Incomplete," *American Economic Review*, 83(5), 1142–1164.

# Appendices

## A Proofs

**Proof of Lemma 1:** Denote $t = \sqrt{1 - \frac{4\delta h}{z\bar{y}}}$. Differentiating (3) with respect to $z$, we have

$$\frac{\partial P}{\partial z} = \frac{\bar{y}}{2}\left[1 - t - \frac{4\delta h}{2tz\bar{y}}\right] = \frac{\bar{y}}{2}\left[1 - t - \frac{1-t^2}{2t}\right] = \frac{\bar{y}(1-t)}{2}\left[1 - \frac{1+t}{2t}\right] = -\frac{\bar{y}}{4t}(1-t)^2 < 0. \quad \square$$

**Proof of Lemma 2:** Differentiating (3) with respect to $h$, $\partial P/\partial h = \delta\left(1 - \frac{4\delta h}{z\bar{y}}\right)^{-1/2} \to +\infty$ as $h \to \bar{h}(z)$. Hence a marginal decrease in $h$ from $\bar{h}(z)$ strictly increases the individual's utility, which implies that $h^r(z, \rho) < \bar{h}(z)$. $\square$

**Proof of Lemma 3:** (i) Since the blue line in Figure 1 is above the red curve at $h = 0$, the only way that (4) has no solution is that the blue curve is everywhere above the red curve, meaning no house can be offered in equilibrium.

(ii) Since for $h < h_{\min}(z, \rho)$ the red curve is below the blue curve, such $h$ do not satisfy (2) at the equilibrium price.

(iii) Since the blue curve is convex and the red curve is concave, they cross at most twice. If at $\bar{h}(z)$ condition (2) holds with strict inequality, then there is no second crossing and $h_{\max}(z, \rho) = \bar{h}(z)$. Otherwise, $h_{\max}(z, \rho)$ is the right root of (4). $\square$

**Proof of Proposition 1:** The upper bound of $\mathcal{H}(z, \rho)$ is either the right root of (4) or $\bar{h}(z)$. The latter is strictly increasing in $z$. The left-hand side of (4) is independent of $z$, while the right-hand side is strictly decreasing in $z$ by Lemma 1. This means that the blue curve in Figure 1 moves downward, while the red curve remains unchanged. Hence, the right root of (4) shifts to the right and the left root ($h_{\min}(z, \rho)$) moves to the left. $\square$

**Proof of Theorem 1:** The upper bound of $\hat{\mathcal{H}}(z, \rho)$ is either the right root of (4) or $\bar{h}(z)$. The latter does not vary with $\rho$. Since $\hat{\mathcal{H}}(z, \rho) \neq \emptyset$, the right root exceeds $\underline{h}$. The right-hand side of (4) is independent of $\rho$, while the left-hand side is strictly increasing in $\rho$ for $h > \underline{h}$. This means that the red curve in Figure 1 moves upward while the blue curve remains unchanged. Hence the left root of (4) ($h_{\min}(z, \rho)$) moves to the left while the right root moves to the right. Thus the fact that $h_{\max}(z, \rho)$ is strictly increasing in $\rho$ follows from (4).

The lower bound of $\hat{\mathcal{H}}(z, \rho)$ is either $h_{\min}(z, \rho)$ or $\underline{h}$. The latter does not vary with $\rho$. If the lower bound is $h_{\min}(z, \rho)$ then $h_{\min}(z, \rho) > \underline{h}$, and thus is strictly decreasing in $\rho$. $\square$

**Proof of Proposition 2:** (i) The threshold $\hat{z}(\rho)$ is defined as the level of $z$ for which $\hat{\mathcal{H}}(z,\rho)$ is a singleton. Let $z_0(\rho)$ be the level of $z$ for which (4) has only one solution. If this solution weakly exceeds $\underline{h}$, then $\hat{z} = z_0$. Otherwise, $\hat{z} = z$ for which $h_{max}(z,\rho) = \underline{h}$. Since the right-hand side of (4) is strictly decreasing in $z$ (Lemma 1), $\hat{\mathcal{H}}(z,\rho) = \emptyset$ for any $z < \hat{z}$, and for $z > \hat{z}$, it becomes an interval. If $\bar{h}(z) < \underline{h}$, then $\hat{\mathcal{H}}(z,\rho) = \emptyset$. Since $\bar{h}(\underline{z}) = \underline{h}$, $\hat{z} > \underline{z}$.

(ii) We first show that $P(h,z)$ given by (3) approaches $\delta h$ as $z \to \infty$. Recall that $P(h,z)$ is defined by $\left(1 - \frac{P(h,z)}{z\bar{y}}\right) P(h,z) = \delta h$. Hence $\lim_{z\to\infty} P(h,z) = \delta h$. Moreover, $P(h,z) > \delta h$ for finite $z$. Graphically, it means that in the limit the blue line on Figure 1 becomes $\delta h$. If the red line is tangent to $\delta h$ (rather than intersecting it), then $\hat{\mathcal{H}}(\infty)$ is singleton and hence $\hat{z} = \infty$. For $\hat{z}$ to be finite, we need that the red line intersects $\delta h$ twice. Thus, we need that at the point $h$ at which the slope of the red line equals $\delta$, the red line is strictly above $\delta h$. The slope of the red line is $\theta\rho/h$, which equals $\delta$ at $h = \theta\rho/\delta$. At this point, the vertical coordinate of the red line is $\theta\rho \ln \frac{\theta\rho}{\delta\underline{h}} + \chi + \gamma\rho$. It exceeds the vertical coordinate of $\delta h$ evaluated at $h = \theta\rho/\delta$ if $\theta\rho\left(\ln \frac{\theta\rho}{\delta\underline{h}} - 1\right) + \chi + \gamma\rho > 0$. □

**Proof of Proposition 3:** The result follows from the construction of $\hat{z}$ (see the proof of Proposition 2) and the fact that since $h > \underline{h}$, the left-hand side of (4) is strictly increasing in $\rho$ (see the proof of Theorem 1). □

**Proof of Proposition 4:** Denote by $h^r(z) \in \hat{\mathcal{H}}(z,\rho)$ the optimal choice of $h$ by individual $z$ conditional on renting, and by $P^r(z) = P(h^r(z); z)$ the corresponding equilibrium price. The expected utility of a renter is

$$\begin{aligned} V^r(z,\rho) &= \frac{z\bar{y}}{2} + \frac{P^r(z)}{z\bar{y}}\left[(1-\rho)\theta \ln h^r(z) + \rho(\theta \ln \underline{h} - \gamma) - \chi\right] + \left[1 - \frac{P^r(z)}{z\bar{y}}\right](\theta \ln h^r(z) - P^r(z)) \\ &= \frac{z\bar{y}}{2} + \theta \ln h^r(z) - \frac{P^r(z)}{z\bar{y}}\left[\rho\theta \ln \frac{h^r(z)}{\underline{h}} + \rho\gamma + \chi\right] - \left[1 - \frac{P^r(z)}{z\bar{y}}\right] P^r(z). \end{aligned} \tag{5}$$

Then

$$\begin{aligned} \Delta(z,\rho) &= \theta \ln \frac{h^r(z)}{\underline{h}} - \frac{P^r(z)}{z\bar{y}}\left[\rho\theta \ln \frac{h^r(z)}{\underline{h}} + \rho\gamma + \chi\right] - \left[1 - \frac{P^r(z)}{z\bar{y}}\right] P^r(z) \\ &\geqslant (1-\rho)\theta \ln \frac{h^r(z)}{\underline{h}} - \rho\gamma - \chi, \end{aligned}$$

where the inequality follows from (2). For $\chi = \gamma = 0$, $\Delta(z,\rho) \geqslant (1-\rho)\theta \ln(h^r/\underline{h})$. Since the individual will never pay for a house $h \leqslant \underline{h}$, $h^r > \underline{h}$, and thus $\Delta(z,\rho) > 0$, unless $\rho = 1$, in which case $\Delta(z,\rho) = 0$. By continuity, $\Delta(z,\rho) \geqslant 0$ also holds for $\chi$ and $\gamma$ are small enough. □

**Proof of Corollary 1:** Using Proposition 4, an individual rents iff $z \geqslant \hat{z}$, where $\hat{z}$ is defined in Proposition 2. Then the result follows from Proposition 3. □

**Lemma 4** $\Delta(z, \rho)$ *is strictly increasing in* $z$.

**Proof:** Suppose not, i.e., $\Delta(z, \rho) \geqslant \Delta(z')$ for $z < z'$. The individual $z$'s optimal house is available to individual $z'$ by Proposition 1. Then the individual $z'$ can rent $h^*(z)$, and by (3) would get a strictly lower rent for that house compared to individual $z$. That would give them a strictly higher $\Delta$, which is a contradiction. □

**Lemma 5** *Define*

$$F(h, z, \rho) = \theta \ln h - P(h, z) - \frac{P(h, z)}{z\bar{y}} \left[ \rho\theta \ln \frac{h}{\underline{h}} + \rho\gamma + \chi - P(h, z) \right],$$

*where* $P(h, z)$ *is defined by* (3). *The function* $F(\cdot, z, \rho)$ *is strictly concave on* $(\underline{h}, \bar{h}(z))$.

**Proof:** Denote $t = t(h) = \sqrt{1 - \frac{4\delta h}{z\bar{y}}} \in (0, 1)$. Differentiating $F$ with respect to $h$,

$$\frac{\partial F(h, z, \rho)}{\partial h} = \frac{\theta}{h} - \frac{\partial P}{\partial h} - \frac{P}{z\bar{y}} \left( \frac{\rho\theta}{h} - \frac{\partial P}{\partial h} \right) - \frac{1}{z\bar{y}} \frac{\partial P}{\partial h} \left[ \theta\rho \ln \frac{h}{\underline{h}} + \rho\gamma + \chi - P \right].$$

Using $P/(z\bar{y}) = (1 - t)/2$ and $\partial P / \partial h = \delta / t$,

$$\frac{\partial F(h, z, \rho)}{\partial h} = \frac{\theta}{h} \left( 1 - \frac{\rho(1 - t)}{2} \right) - \frac{1}{z\bar{y}} \frac{\delta}{t} \left( \theta\rho \ln \frac{h}{\underline{h}} + \rho\gamma + \chi \right) - \delta. \tag{6}$$

This expression is strictly decreasing in $h$ for a given $t$, and is strictly increasing in $t$, where $t$ is strictly decreasing in $h$. Thus $\partial^2 F(h, z, \rho)/\partial h^2 < 0$ for all $h \in (\underline{h}, \bar{h}(z))$. □

**Lemma 6** *For a given* $z$*, define* $\rho^u = \rho^u(z)$ *such that* $h_{max}(\rho^u) = h^u(\rho^u)$*. Then* $F(h_{max}(\rho), z, \rho)$ *is strictly decreasing in* $\rho$ *at* $\rho^u$*. Moreover, there exists* $\rho^* < \rho^u$ *such that* $dF(h_{max}(\rho), z, \rho)$ *is strictly increasing for* $\rho < \rho^*$ *and strictly decreasing for* $\rho > \rho^*$.

**Proof:** We need to show that $(dF(h_{max}(\rho), z, \rho)/d\rho)|_{\rho = \rho^u} < 0$. Denote

$$WTP = \rho\theta \ln(h/\underline{h}) + \rho\gamma + \chi$$

so that $F = \theta \ln h - P - \frac{P}{z\bar{y}}(WTP - P)$. Recall that $h_{max}$ is defined by $WTP - P = 0$. Differentiating it, we have

$$\frac{\partial(WTP - P)}{\partial h} \frac{dh_{max}}{d\rho} + \frac{\partial(WTP - P)}{\partial \rho} = 0.$$

Differentiating $F$ with respect to $\rho$ at $h = h_{max}$ and using the above condition, we have

$$\begin{aligned}
\left.\frac{dF}{d\rho}\right|_{h=h_{max}} &= \frac{\partial F}{\partial h}\frac{dh_{max}}{d\rho} + \frac{\partial F}{\partial \rho} \\
&= \left[\frac{\theta}{h} - \frac{\partial P}{\partial h} - \frac{P}{z\bar{y}}\frac{\partial(WTP-P)}{\partial h} - \frac{1}{z\bar{y}}\frac{\partial P}{\partial h}\underbrace{(WTP-P)}_{=0}\right]\frac{dh_{max}}{d\rho} - \frac{P}{z\bar{y}}\frac{\partial(WTP-P)}{\partial \rho} \\
&= \left(\frac{\theta}{h} - \frac{\partial P}{\partial h}\right)\frac{dh_{max}}{d\rho}
\end{aligned}$$

evaluated at $h = h_{max}$. At $h = h^u$,

$$\left.\frac{\partial F}{\partial h}\right|_{h=h^u} = \frac{\theta}{h} - \frac{\partial P}{\partial h} - \frac{P}{z\bar{y}}\frac{\partial(WTP-P)}{\partial h} - \frac{1}{z\bar{y}}\frac{\partial P}{\partial h}(WTP-P) = 0.$$

At $\rho^u$ the last term is zero, and hence

$$\left.\frac{\partial F}{\partial h}\right|_{h^u=h_{max}} = \frac{\theta}{h} - \frac{\partial P}{\partial h} - \frac{P}{z\bar{y}}\left(\frac{\rho\theta}{h} - \frac{\partial P}{\partial h}\right) = 0.$$

Since $\rho \in [0,1]$ and $P/(z\bar{y}) \in (0,1)$, it must be the case that $\theta/h - \partial P/\partial h < 0$ at $h = h^u = h_{max}$. Hence $(dF/d\rho)|_{\rho=\rho^u} < 0$ since $dh_{max}/d\rho > 0$.

Notice that

$$f(h) \equiv \frac{\theta}{h} - \frac{\partial P}{\partial h} = \frac{\theta}{h} - \frac{\delta}{\sqrt{1-\frac{4\delta h}{z\bar{y}}}}$$

is strictly decreasing in $h$. Define $\rho^*(z)$ such that $f(h_{max}(z,\rho^*(z))) = 0$. Then we have that $(dF(h_{max}(z,\rho),z,\rho)/d\rho)|_{\rho=\rho^*} = 0$, and $F(h_{max}(z,\rho),z,\rho)$ is strictly increasing in $\rho$ to the left of $\rho^*$ and strictly decreasing to the right of it, and $\rho^* < \rho^u$. □

**Proof of Theorem 2**: We first consider the housing choice conditional on renting.

We next show that $h^u(z,\rho)$ is strictly decreasing in $\rho$. The unconstrained housing choice $h^u(z,\rho)$ is defined as $\arg\max_{h\leqslant\bar{h}(z)} F(h,z,\rho)$, where $F$ is defined in Lemma 5. Given that the solution is interior, the first-order condition is $F_h(h^u,z,\rho) = 0$. Hence $\partial h^u/\partial\rho = -F_{h\rho}(h^u,z,\rho)/F_{hh}(h^u,z,\rho)$. Differentiating $F_h$ in (6) with respect to $\rho$, we have

$$F_{h\rho} = -\frac{\theta}{2h}\left[1-\sqrt{1-\frac{4\delta h}{z\bar{y}}}\right] - \frac{\delta}{z\bar{y}\sqrt{1-\frac{4\delta h}{z\bar{y}}}}\left(\theta\ln\frac{h}{\underline{h}}+\gamma\right) < 0.$$

Since $F_{hh} < 0$ by Lemma 5, we have $\partial h^u/\partial\rho < 0$.

We now show that when $h^*(z,\rho) = h_{max}(z,\rho)$, it is strictly increasing in $\rho$. Since

$h^*(z,\rho) < \bar{h}(z)$ by Lemma 2, we have $h_{max}(z,\rho) < \bar{h}(z)$, and thus $h^*(z,\rho) = h_{max}(z,\rho)$ is strictly increasing in $\rho$ by Theorem 1.

The threshold $\rho^u$ is defined as the level of $\rho$ such that $h^u(z,\rho) = h_{max}(z,\rho)$. If $\rho^{in} \geqslant \rho^u$ (which can happen if $\chi$ and $\gamma$ are large enough), then the renter always chooses $h^u(z)$. If $\rho^{in} < \rho^u$, then the individual rents $h_{max}(z,\rho)$ between $\rho^{in}$ and $\rho^u$ because their objective function is strictly concave by Lemma 5.

We next analyze the individual's utility conditional on renting. When (2) does not bind, the equilibrium price is pinned down by (3) and is independent of $\rho$. Thus, differentiating (5) with respect to $\rho$ and using the Envelope theorem for the optimal choice $h^r(z,\rho)$, we have

$$\frac{\partial V^r(z,\rho)}{\partial \rho} = -\frac{P^r(z)}{z\bar{y}}\left(\theta \ln \frac{h^r(z,\rho)}{\underline{h}} + \gamma\right) < 0.$$

If $\chi$ and $\gamma$ are high enough, it is possible that as $\rho$ increases, $V^r(z,\rho)$ eventually falls below the outside option. In that case, the threshold for switching from renting to the outside option $\rho^{out} < 1$. However, if $\chi$ and $\gamma$ are low enough, the individual will remain a renter all $\rho$, and hence $\rho^{out} \geqslant 1$.

The fact that $V^r(z,\rho)$ is strictly increasing in $\rho$ for $\rho < \rho^*$, is strictly decreasing for $\rho > \rho^*$, and that $\rho^* < \rho^u$ follows from Lemma 6 and the fact that $h^r = h_{max}$ for $\rho < \rho^u$.

Finally, consider the threshold $\rho^{in}(z)$ for switching from the outside option to renting. It equals zero if $\hat{\mathcal{H}}(z,0) \neq \emptyset$ and $V^r(z,0) \geqslant V^{out}(z)$, and $\rho^{in}(z) > 0$ if either $\hat{\mathcal{H}}(z,0) = \emptyset$ or $V^r(z,0) < V^{out}(z)$.[25] Of course, $\rho^{in}(z)$ can equal one if $V^r(z,\rho) < V^{out}(z)$ for all $\rho$, which happens if $\underline{h}$, $\chi$ and/or $\gamma$ are large enough. □

**Proof of Theorem 3**: Consider all $z$ such that $\Delta(z,\rho) > 0$ for some $\rho$. For those individuals, consider thresholds $\rho^{in}(z)$ and $\rho^{out}(z)$ defined in Theorem 2. Define $\underline{z}^{in}$ as the productivity of the marginal renter at their most preferred $\rho$, that is, the one for whom $\rho^{in}(\underline{z}^{in}) = \rho^{out}(\underline{z}^{in}) = \rho^*(\underline{z}^{in})$, so that $\Delta(\underline{z}^{in}, \rho^*(\underline{z}^{in})) \geqslant 0$ and $\Delta(\underline{z}^{in}, \rho) < 0$ for all $\rho \neq \rho^{in}(\underline{z}^{in})$.[26] Define $\bar{\rho} = \rho^{in}(\underline{z}^{in})$. If $\chi$ and $\gamma$ are low enough, then all those for whom $\hat{\mathcal{H}} \neq \emptyset$ rent, and hence $\underline{z}^{in} = \hat{z}(1)$ and $\bar{\rho} = 1$. Finally, construct $z^{in}(\rho)$ as follows. For $\rho \leqslant \bar{\rho}$, $z^{in}(\rho) = (\rho^{in})^{-1}(\rho)$, and for $\rho > \bar{\rho}$, $z^{in}(\rho) = (\rho^{out})^{-1}(\rho)$. By Lemma 4, $\rho^{in}(z)$ is strictly decreasing and $\rho^{out}(z)$ is strictly increasing in $z$. Thus $(\rho^{in})^{-1}(\rho)$ is strictly decreasing and $(\rho^{out})^{-1}(\rho)$ is strictly increasing in $\rho$. □

[25] When $\chi$ and $\gamma$ are large enough, $\rho^{in} \geqslant \rho^u$. In this case, $\rho^{in} = 0$ if $h^u(z,0) \in \hat{\mathcal{H}}(z,0)$ and $V^r(z,0) \geqslant V^{out}(z)$, and $\rho^{in} > 0$ if $\mathcal{H}(z,0) = \emptyset$.

[26] Following the mathematical convention, we assume that if $\hat{\mathcal{H}}(z,\rho) = \emptyset$, then $V^r(z,\rho) = -\infty$ and thus $\Delta(z,\rho) < 0$.

# B Additional Tables and Figures

## B.1 State-Level ERSI

**Table B1:** ERSI by State

| State | ERSI | State | ERSI | State | ERSI |
|---|---|---|---|---|---|
| Alabama | 0.504 | Louisiana | 0.438 | Ohio | 0.511 |
| Alaska | 0.809 | Maine | 0.932 | Oklahoma | 0.715 |
| Arizona | 0.525 | Maryland | 0.017 | Oregon | 0.426 |
| Arkansas | 0.825 | Massachusetts | 0.451 | Pennsylvania | 0.510 |
| California | 0.653 | Michigan | 0.446 | Rhode Island | 0.607 |
| Colorado | 0.534 | Minnesota | 0.395 | South Carolina | 0.174 |
| Connecticut | 0.712 | Mississippi | *NA* | South Dakota | *NA* |
| Delaware | 0.281 | Missouri | 0.597 | Tennessee | 0.876 |
| Florida | 0.509 | Montana | 0.648 | Texas | 0.447 |
| Georgia | 0.273 | Nebraska | 0.625 | Utah | 0.463 |
| Hawaii | 0.460 | Nevada | 0.235 | Vermont | 0.968 |
| Idaho | *NA* | New Hampshire | *NA* | Virginia | 0.292 |
| Illinois | 0.280 | New Jersey | 0.025 | Washington | 0.520 |
| Indiana | 0.641 | New Mexico | 0.533 | West Virginia | *NA* |
| Iowa | 0.540 | New York | 0.138 | Wisconsin | 0.585 |
| Kansas | 0.834 | North Carolina | 0.343 | Wyoming | 0.883 |
| Kentucky | 0.471 | North Dakota | *NA* | | |

*Note:* Missing data for some states are due to lack of coverage in the Eviction Lab data.

**Table B2:** Regression of Census Tract Average Filing Rates on ERSI Using ACS

| | (1) | (2) | (3) | (4) |
|---|---|---|---|---|
| Eviction Regime Severity Index | -23.755*** | -21.728*** | | |
| | (3.166) | (2.568) | | |
| Log Median Rent | | 0.400 | 0.982* | 2.525** |
| | | (0.664) | (0.587) | (1.010) |
| Log Median Renter Household Income | | 1.035** | 0.565 | 1.529** |
| | | (0.520) | (0.394) | (0.674) |
| Unemployment Rate | | 0.052 | 0.090*** | 0.067 |
| | | (0.045) | (0.030) | (0.053) |
| Log Median Home Value | | -3.324*** | -0.988** | -1.272 |
| | | (0.729) | (0.415) | (0.788) |
| State Fixed Effect | | | X | |
| Year Fixed Effect | | X | X | X |
| Demographic Fixed Effects | | X | X | X |
| Mean | 7.846 | 7.793 | 7.793 | 7.793 |
| Number of Observations | 37,207 | 29,239 | 29,239 | 29,239 |
| $R^2$ | 0.152 | 0.338 | 0.498 | 0.218 |

*Note:* The outcome variable is the average eviction filing rate of the census tract for the previous five years, conditional on availability. Only one observation is used per census tract, the last year it is observed. Tracts with average filing rates above 100 are excluded. The control variables consist of the 5-year tract variables from the ACS, as well as the state ERSI. Demographic controls include tract education and age compositions. Column (2) includes the state ERSI, while (3) includes state fixed effects. Column (4) includes only the control variables. Regressions are weighted by number of renting households per the census tract, and standard errors are clustered at the county level. Robust standard errors are reported in parentheses.

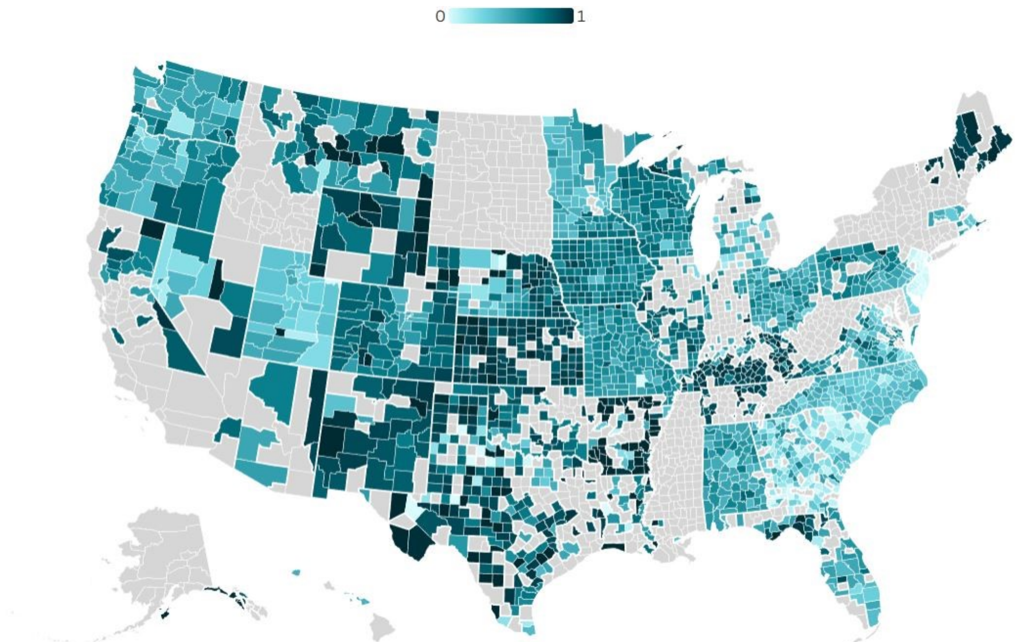
**Table B3:** Regressions of HH Formation on ERSI by College Degree Using ACS

| | Living with a Parent (1) | Being a Household Head (2) |
|---|---|---|
| ERSI | -0.062*** | 0.063*** |
| | (0.004) | (0.004) |
| Income Quartile 2 | -0.074*** | 0.083*** |
| | (0.003) | (0.003) |
| Income Quartile 3 | -0.145*** | 0.173*** |
| | (0.003) | (0.003) |
| Income Quartile 4 | -0.237*** | 0.279*** |
| | (0.002) | (0.002) |
| ERSI × Income Quartile 2 | -0.004 | 0.017*** |
| | (0.005) | (0.005) |
| ERSI × Income Quartile 3 | -0.012** | 0.026*** |
| | (0.005) | (0.005) |
| ERSI × Income Quartile 4 | 0.040*** | -0.024*** |
| | (0.005) | (0.005) |
| College Degree | -0.006*** | 0.043*** |
| | (0.002) | (0.002) |
| ERSI × College Degree | -0.023*** | 0.005 |
| | (0.004) | (0.004) |
| Log Average State Home Value | 0.131*** | -0.193*** |
| | (0.002) | (0.002) |
| Age | -0.015*** | 0.017*** |
| | (0.000) | (0.000) |
| Year and Demographic Controls | X | X |
| Mean | 0.254 | 0.656 |
| Obs | 2,537,006 | 2,537,006 |
| $R^2$ | 0.186 | 0.274 |

*Note:* The outcome variable in column (1) is a binary variable that equals 1 if the individual lives in a household in which their parent (or a parent-in-law) is the head of the household, and 0 otherwise. The outcome variable in column (2) is a binary variable that equals 1 if the individual is a household head or a spouse/unmarried partner/housemate of a household head, and 0 otherwise. Regressions include year, race, gender, and marital status controls. Regressions include only individuals not in group quarters nor in school, of ages 21 to 35. Income is winsorized at zero before adding one and taking log. Robust standard errors are reported in parentheses.

## B.2 County-Level ERSI

**Figure B1:** Eviction Regime Severity Index by U.S. County




*Note:* Missing data for some counties are due to the lack of coverage in the Eviction Lab data.

**Table B4:** Regression of Census Tract Average Threatened Rates on County ERSI

| | (1) | (2) | (3) | (4) |
|---|---|---|---|---|
| County ERSI | -11.337*** | -10.998*** | | |
| | (1.532) | (0.962) | | |
| Log Median Rent | | 0.052 | -0.201 | 2.062*** |
| | | (0.572) | (0.302) | (0.655) |
| Log Median Renter Household Income | | 0.602 | -0.170 | 0.581 |
| | | (0.376) | (0.265) | (0.397) |
| Unemployment Rate | | 0.057* | 0.078*** | 0.085** |
| | | (0.032) | (0.017) | (0.034) |
| Log Median Home Value | | -2.168*** | -0.916*** | -1.069* |
| | | (0.551) | (0.327) | (0.579) |
| County Fixed Effect | | | X | |
| Year Fixed Effect | | X | X | X |
| Demographic Controls | | X | X | X |
| Mean | 6.062 | 6.043 | 6.054 | 6.043 |
| Obs | 37,200 | 29,239 | 29,107 | 29,239 |
| $R^2$ | 0.140 | 0.398 | 0.638 | 0.299 |

*Note:* The outcome variable is the average eviction filing rate of the census tract for the previous five years, conditional on availability. Only one observation is used per census tract, the last year it is observed. Tracts with average filing rates above 100 are excluded. The control variables consist of the 5-year tract variables from the ACS, as well as the county ERSI. Column (2) includes the county ERSI, while (3) includes county fixed effects. Column (4) includes only the control variables. Regressions are weighted by number of renting households per the census tract, and standard errors are clustered at the county level. Robust standard errors are reported in parentheses.

**Table B5:** Regression of Living with a Parent on County ERSI Using ACS

| | Ages 18-35 (1) | Ages 18-35 (2) | Ages 18-35 (3) | Ages 40-60 (4) |
|---|---|---|---|---|
| County ERSI | -0.056*** | -0.084*** | -0.101*** | 0.010*** |
| | (0.003) | (0.003) | (0.006) | (0.003) |
| Log Income | | -0.018*** | | |
| | | (0.000) | | |
| Income Quartile 2 | | | -0.085*** | -0.024*** |
| | | | (0.004) | (0.002) |
| Income Quartile 3 | | | -0.153*** | -0.039*** |
| | | | (0.004) | (0.002) |
| Income Quartile 4 | | | -0.261*** | -0.062*** |
| | | | (0.003) | (0.001) |
| County ERSI × Income Quartile 2 | | | -0.018** | -0.009** |
| | | | (0.009) | (0.004) |
| County ERSI × Income Quartile 3 | | | -0.056*** | -0.032*** |
| | | | (0.008) | (0.004) |
| County ERSI × Income Quartile 4 | | | 0.041*** | -0.017*** |
| | | | (0.007) | (0.003) |
| Log Average County Home Value | | -0.129*** | -0.115*** | -0.016*** |
| | | (0.003) | (0.003) | (0.001) |
| Age | | -0.022*** | -0.018*** | -0.003*** |
| | | (0.000) | (0.000) | (0.000) |
| Year and Demographic Controls | | X | X | X |
| Mean | 0.269 | 0.269 | 0.269 | 0.052 |
| Obs | 1,047,123 | 1,047,123 | 1,047,123 | 1,825,953 |
| $R^2$ | 0.001 | 0.192 | 0.212 | 0.081 |

*Note:* The outcome variable is a binary variable that equals 1 if the individual lives in a household in which their parent (or a parent-in-law) is the head of the household, and 0 otherwise. Columns (2) through (4) include year, race, gender, and marital status controls. Regressions include only individuals not in group quarters nor in school, of ages 18 to 35 for columns (1) through (3), and ages 40 to 60 for column (4). Income is winsorized at zero before adding one and taking log. Robust standard errors are reported in parentheses.

**Table B6:** Regression of Being a Household Head on County ERSI Using ACS

| | Ages 18-35 (1) | Ages 18-35 (2) | Ages 18-35 (3) | Ages 40-60 (4) |
|---|---|---|---|---|
| County ERSI | 0.086*** | 0.097*** | 0.113*** | 0.026*** |
| | (0.003) | (0.003) | (0.005) | (0.001) |
| Log Income | | 0.23*** | | |
| | | (0.000) | | |
| Income Quartile 2 | | | 0.089*** | 0.083*** |
| | | | (0.004) | (0.003) |
| Income Quartile 3 | | | 0.183*** | 0.142*** |
| | | | (0.004) | (0.002) |
| Income Quartile 4 | | | 0.325*** | 0.189*** |
| | | | (0.003) | (0.002) |
| County ERSI × Income Quartile 2 | | | 0.039*** | 0.010* |
| | | | (0.008) | (0.006) |
| County ERSI × Income Quartile 3 | | | 0.075*** | 0.011** |
| | | | (0.008) | (0.005) |
| County ERSI × Income Quartile 4 | | | -0.045*** | -0.029*** |
| | | | (0.007) | (0.005) |
| Log Average County Home Value | | 0.123*** | 0.104*** | 0.009*** |
| | | (0.003) | (0.003) | (0.002) |
| Age | | 0.025*** | 0.021*** | 0.001*** |
| | | (0.000) | (0.000) | (0.000) |
| Year and Demographic Controls | | X | X | X |
| Mean | 0.636 | 0.636 | 0.636 | 0.875 |
| Obs | 1,047,123 | 1,047,123 | 1,047,123 | 1,825,953 |
| $R^2$ | 0.001 | 0.276 | 0.303 | 0.185 |

*Note:* The outcome variable is a binary variable that equals 1 if the individual is a household head or a spouse/unmarried partner/housemate of a household head, and 0 otherwise. Columns (2) through (4) include year, race, gender, and marital status controls. Regressions include only individuals not in group quarters nor in school, of ages 18 to 35 for columns (1) through (3), and ages 40 to 60 for column (4). Income is winsorized at zero before adding one and taking log. Robust standard errors are reported in parentheses.

**Table B7:** Regressions of HH Formation on County ERSI by College Degree Using ACS

| | Living with a Parent | Being a Household Head |
|---|---|---|
| | (1) | (2) |
| County ERSI | -0.123*** | 0.148*** |
| | (0.006) | (0.006) |
| Income Quartile 2 | -0.081*** | 0.084*** |
| | (0.004) | (0.004) |
| Income Quartile 3 | -0.142*** | 0.166*** |
| | (0.004) | (0.004) |
| Income Quartile 4 | -0.235*** | 0.275*** |
| | (0.004) | (0.004) |
| County ERSI × Income Quartile 2 | -0.015* | 0.039*** |
| | (0.009) | (0.009) |
| County ERSI × Income Quartile 3 | -0.057*** | 0.080*** |
| | (0.008) | (0.009) |
| County ERSI × Income Quartile 4 | 0.029*** | -0.012*** |
| | (0.008) | (0.008) |
| College Degree | -0.045*** | 0.091*** |
| | (0.003) | (0.003) |
| County ERSI × College Degree | 0.041*** | -0.076*** |
| | (0.006) | (0.006) |
| Log Average County Home Value | -0.109*** | 0.097*** |
| | (0.003) | (0.003) |
| Age | -0.015*** | 0.017*** |
| | (0.000) | (0.000) |
| Year and Demographic Controls | X | X |
| Mean | 0.243 | 0.667 |
| Obs | 986,858 | 986,858 |
| $R^2$ | 0.184 | 0.268 |

*Note:* The outcome variable in column (1) is a binary variable that equals 1 if the individual lives in a household in which their parent (or a parent-in-law) is the head of the household, and 0 otherwise. The outcome variable in column (2) is a binary variable that equals 1 if the individual is a household head or a spouse/unmarried partner/housemate of a household head, and 0 otherwise. Regressions include year, race, gender, and marital status fixed effects. Regressions include only individuals not in group quarters, of ages 21 to 35. Income is winsorized at zero before adding one and taking log. Robust standard errors are reported in parentheses.

## B.3 Alternative ERSI: Threatened/Filings, State Level

**Table B8:** Regression of Rental Nonpayment on Threatened ERSI Using SIPP

| | (1) | (2) |
|---|---|---|
| Threatened ERSI | -0.035* | -0.038* |
| | (0.020) | (0.020) |
| Log Monthly Household Income | | -0.007*** |
| | | (0.002) |
| Log Monthly Rent | | -0.001 |
| | | (0.002) |
| College Degree | | -0.060*** |
| | | (0.005) |
| Unemployment Spell | | 0.020*** |
| | | (0.006) |
| Age | | 0.007*** |
| | | (0.001) |
| $Age^2$ | | -0.000*** |
| | | (0.000) |
| Year Fixed Effect | | X |
| Mean | 0.100 | 0.100 |
| Obs | 17,852 | 17,852 |
| $R^2$ | 0.000 | 0.023 |

*Note:* The outcome variable is a binary variable that equals 1 if the household has been behind on rent payment in the past 12 months and 0 otherwise. Observations only include renter households, individual characteristics are of the household head. Column (2) includes year fixed effects. Regressions are weighted using the SIPP sample weights. Income is winsorized at zero before adding one and taking log. Robust standard errors are reported in parentheses.

**Table B9:** Regression of Census Tract Average Threatened Rates on Threatened ERSI

| | (1) | (2) | (3) | (4) |
|---|---|---|---|---|
| Threatened ERSI | -27.514*** | -24.742*** | | |
| | (2.379) | (1.516) | | |
| Log Median Rent | | 0.999** | 1.116*** | 2.062*** |
| | | (0.405) | (0.348) | (0.655) |
| Log Median Renter Household Income | | 0.202 | 0.068 | 0.581 |
| | | (0.301) | (0.261) | (0.397) |
| Unemployment Rate | | 0.101*** | 0.095*** | 0.085** |
| | | (0.023) | (0.020) | (0.034) |
| Log Median Home Value | | -1.370*** | -0.888*** | -1.069** |
| | | (0.475) | (0.318) | (0.578) |
| State Fixed Effect | | | X | |
| Year and Demographic Controls | | X | X | X |
| Mean | 6.062 | 6.042 | 6.042 | 6.042 |
| Number of Observations | 37,200 | 29,239 | 29,239 | 29,239 |
| $R^2$ | 0.219 | 0.460 | 0.518 | 0.299 |

*Note:* The outcome variable is the average eviction threatened rate of the census tract for the previous five years, conditional on availability. Only one observation is used per census tract, the last year it is observed. Tracts with average filing rates above 100 are excluded. The control variables consist of the 5-year tract variables from the ACS, as well as the state threatened ERSI. Demographic controls include tract education and age compositions. Column (2) includes the state ERSI, while (3) includes state fixed effects. Column (4) includes only the control variables. Regressions are weighted by number of renting households per the census tract, and standard errors are clustered at the county level. Robust standard errors are reported in parentheses.

**Table B10:** Regression of Living with a Parent on Threatened ERSI

| | Ages 18-35<br>(1) | Ages 18-35<br>(2) | Ages 18-35<br>(3) | Ages 40-60<br>(4) |
|---|---|---|---|---|
| Threatened ERSI | -0.041*** | -0.038*** | -0.068*** | -0.012*** |
| | (0.003) | (0.003) | (0.006) | (0.003) |
| Log Income | | -0.017*** | | |
| | | (0.000) | | |
| Income Quartile 2 | | | -0.087*** | -0.026*** |
| | | | (0.007) | (0.003) |
| Income Quartile 3 | | | -0.180*** | -0.059*** |
| | | | (0.007) | (0.003) |
| Income Quartile 4 | | | -0.257*** | -0.073*** |
| | | | (0.006) | (0.003) |
| Threatened ERSI × Income Quartile 2 | | | 0.010 | 0.001 |
| | | | (0.008) | (0.003) |
| Threatened ERSI × Income Quartile 3 | | | 0.025*** | 0.014*** |
| | | | (0.008) | (0.003) |
| Threatened ERSI × Income Quartile 4 | | | 0.030*** | 0.008*** |
| | | | (0.007) | (0.003) |
| Log Average State Home Value | | 0.117*** | 0.133*** | 0.017*** |
| | | (0.002) | (0.002) | (0.001) |
| Age | | -0.021*** | -0.018*** | -0.003*** |
| | | (0.000) | (0.000) | (0.000) |
| Year and Demographic Controls | | X | X | X |
| Mean | 0.281 | 0.281 | 0.281 | 0.053 |
| Obs | 2,712,552 | 2,712,552 | 2,712,552 | 5,040,625 |
| $R^2$ | 0.000 | 0.195 | 0.212 | 0.082 |

*Note:* The outcome variable is a binary variable that equals 1 if the individual lives in a household in which their parent or a parent-in-law is the head of the household, and 0 otherwise. Columns (2) through (4) include year, race, gender, and marital status controls. Regressions include only individuals not in group quarters nor in school, of ages 18 to 35 for columns (1) through (3), and ages 40 to 60 for column (4). Income is winsorized at zero before adding one and taking log. Robust standard errors are reported in parentheses.

**Table B11:** Regression of Being a Household Head on Threatened ERSI

| | Ages 18-35<br>(1) | Ages 18-35<br>(2) | Ages 18-35<br>(3) | Ages 40-60<br>(4) |
|---|---|---|---|---|
| Threatened ERSI | 0.050*** | 0.045*** | 0.081*** | 0.011*** |
| | (0.003) | (0.003) | (0.005) | (0.004) |
| Log Income | | 0.022*** | | |
| | | (0.000) | | |
| Income Quartile 2 | | | 0.100*** | 0.098*** |
| | | | (0.007) | (0.005) |
| Income Quartile 3 | | | 0.221*** | 0.158*** |
| | | | (0.006) | (0.004) |
| Income Quartile 4 | | | 0.325*** | 0.181*** |
| | | | (0.006) | (0.004) |
| Threatened ERSI × Income Quartile 2 | | | -0.007 | -0.009* |
| | | | (0.008) | (0.005) |
| Threatened ERSI × Income Quartile 3 | | | -0.029*** | -0.014*** |
| | | | (0.008) | (0.005) |
| Threatened ERSI × Income Quartile 4 | | | -0.038*** | -0.000 |
| | | | (0.006) | (0.004) |
| Log Average State Home Value | | -0.173*** | -0.233*** | -0.080*** |
| | | (0.002) | (0.002) | (0.001) |
| Age | | 0.024*** | 0.017*** | 0.001*** |
| | | (0.000) | (0.000) | (0.000) |
| Year and Demographic Controls | | X | X | X |
| Mean | 0.623 | 0.623 | 0.623 | 0.872 |
| Obs | 2,712,552 | 2,712,552 | 2,712,552 | 5,040,625 |
| $R^2$ | 0.000 | 0.286 | 0.309 | 0.202 |

*Note:* The outcome variable is a binary variable that equals 1 if the individual is a household head or a spouse/unmarried partner/housemate of a household head, and 0 otherwise. Columns (2) through (4) include year, race, gender, and marital status controls. Regressions include only individuals not in group quarters nor in school, of ages 18 to 35 for columns (1) through (3), and ages 40 to 60 for column (4). Income is winsorized at zero before adding one and taking log. Robust standard errors are reported in parentheses.