

The State of Homelessness in America



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Executive Summary

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Due to decades of misguided and faulty policies, homelessness is a serious problem. Over half a million people go homeless on a single night in the United States. Approximately 65 percent are found in homeless shelters, and the other 35 percent—just under 200,000—are found unsheltered on our streets (in places not intended for human habitation, such as sidewalks, parks, cars, or abandoned buildings). Homelessness almost always involves people facing desperate situations and extreme hardship. They must make choices among very limited options, often in the context of extreme duress, substance abuse disorders, untreated mental illness, or unintended consequences from well-intentioned policies. Improved policies that address the underlying causes of the problem and more effectively serve some of the most vulnerable members of society are needed.

This report (i) describes how homelessness varies across States and communities in the United States; (ii) analyzes the major factors that drive this variation; (iii) discusses the shortcomings of previous Federal policies to reduce homeless populations; and (iv) describes how the Trump Administration is improving Federal efforts to reduce homelessness.

We first document how homelessness varies across the United States. Homelessness is concentrated in major cities on the West Coast and the Northeast. Almost half (47 percent) of all unsheltered homeless people are found in the State of California, about four times as high as California's share of the overall U.S. population. Rates of sheltered homelessness are highest in Boston, New York City, and Washington, D.C., with New York City alone containing over one-fifth of all sheltered homeless people in the United States.

In the context of a simple supply and demand framework, we analyze the major causes of this variation in homelessness across communities: (i) the higher price of housing resulting from overregulation of housing markets; (ii) the conditions for sleeping on the street (outside of shelter or housing); (iii) the supply of homeless shelters; and (iv) the characteristics of individuals in a community that make homelessness more likely.

The first cause we consider is the overregulation of housing markets, which raises homelessness by increasing the price of a home. Using external estimates of the effect of regulation on home prices and of home prices on homelessness, we simulate the impact of deregulation on homeless populations in individual metropolitan areas. We estimate that if the 11 metropolitan areas with significantly supply-constrained housing markets were deregulated, overall homelessness in the United States would fall by 13 percent. Homelessness

would fall by much larger amounts in these 11 large metropolitan areas, for example by 54 percent in San Francisco, by 40 percent in Los Angeles, and by 23 percent in New York City. On average, homelessness would fall by 31 percent in these 11 metropolitan areas, which currently make up 42 percent of the United States homeless population.

Second, more tolerable conditions for sleeping on the streets (outside of shelter or housing) increases homelessness. We show that warmer places are more likely to have higher rates of unsheltered homelessness, but rates are nonetheless low in some warm places. For example, Florida and Arizona have unsheltered homeless populations lower than what would be expected given the temperatures, home prices and poverty rates in their communities. Meanwhile, the unsheltered homeless population is over twice as large as expected—given the temperatures, home prices and poverty rates in their communities—in States including Hawaii, California, Nevada, Oregon, and Washington State. Policies such as the extent of policing of street activities may play a role in these differences.

A larger supply of substitutes to permanent housing through shelter provision also increases homelessness. Boston, New York City, and Washington, D.C. are each subject to right-to-shelter laws that guarantee shelter availability of a given quality. These places each have rates of sheltered homelessness at least 2.7 times as high as the rate in every other city, and this difference cannot be explained by their weather, home prices, and poverty rates. Boston, New York City, and Washington, D.C. also have substantially higher rates of overall homelessness than almost every other city, suggesting that most people being sheltered would not otherwise sleep on the street. While shelter is an absolutely necessary safety net of last resort for some people, right-to-shelter policies may not be a cost-effective approach to ensuring people are housed.

The final cause we consider is the prevalence of individual-level demand factors in the population. Severe mental illness, substance abuse problems, histories of incarceration, low incomes, and weak social connections each increase an individual's risk of homelessness, and higher prevalence in the population of these factors may increase total homelessness.

After analyzing the fundamental causes of homelessness, we next discuss the record of previous Federal policies to reduce it. The Federal Government has supported a major expansion of permanent supportive housing (often under a Housing First approach that does not have service participation requirements) and rapid rehousing. While these policies increase the demand for homes and thus reduce homelessness in the short-run, this short-run reduction can be reversed in the long-run through unintended consequences. In fact, it is not clear that this strategy has been successful in reducing homeless populations. Research suggests that previous Federal policy is not capable of explaining a substantial portion of the reported

decline in homelessness between 2007 and 2018. In addition, we show that contrary to reported trends, it is unclear whether homelessness in the United States has actually decreased since 2007, due to an inconsistent definition of homelessness and miscounting of unsheltered homeless populations.

To reverse the failed policies of the past, the Trump Administration is addressing the root causes of homelessness. President Trump signed an executive order that will seek to remove regulatory barriers in the housing market, which would reduce the price of homes and reduce homelessness. Individual risk factors that shift the demand for homes inward are being addressed as well, through successful efforts to stem the drug crisis, improve the Federal response to mental illness, improve the chances of people exiting prison, and increase incomes for people at the bottom of the distribution. The administration has also consistently supported the police in promoting safe cities. Finally, the U.S. Department of Housing and Urban Development has improved Federal homeless assistance programs by providing flexibility for communities to utilize service participation requirements and more strongly encouraging self-sufficiency. These reforms may more successfully reduce homelessness and address the underlying problems that people experiencing homelessness face.

Introduction

Over half a million Americans go homeless on a single night in the United States.¹ About 35 percent (just under 200,000) are found sleeping unsheltered on our streets in places not intended for human habitation, such as sidewalks, parks, cars, or abandoned buildings. Meanwhile, over 350,000 sheltered homeless people are found in emergency shelters and transitional housing programs. Homelessness almost always involves people facing desperate situations and extreme hardship. They must make choices among very limited options, often in the context of extreme duress, substance abuse disorders, untreated mental illness, or unintended consequences from well-intentioned policies. Improved policies that address the underlying causes of the problem and more effectively serve some of the most vulnerable members of society are needed.

This report (i) describes how homelessness varies across States and communities in the United States; (ii) analyzes the major factors that drive this variation; (iii) discusses the shortcomings of previous Federal policies to reduce homeless populations; and (iv) describes how the Trump Administration is improving Federal efforts to reduce homelessness.

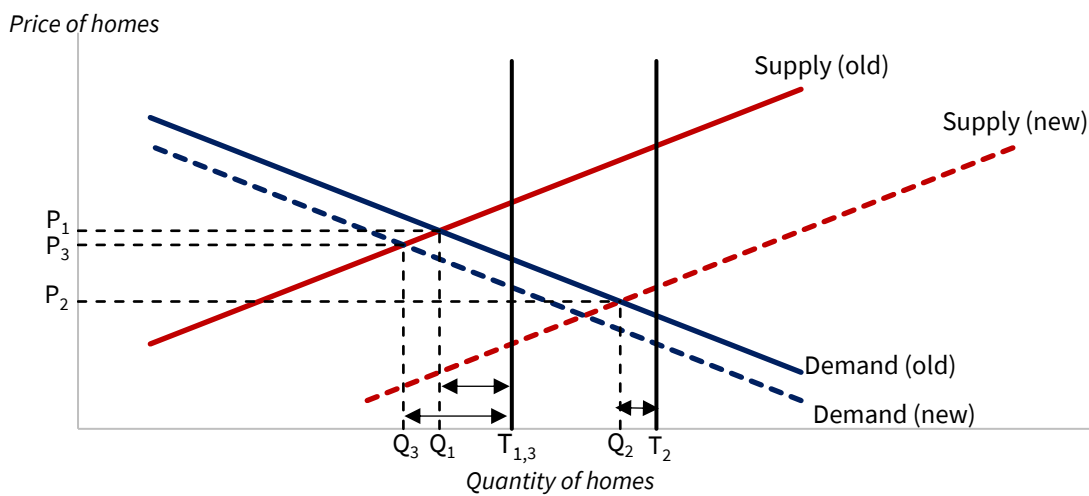
We first document how homelessness, both unsheltered and sheltered, varies across communities in the United States. Almost half (47 percent) of all unsheltered homeless people in the United States are found in California, about four times as high as their share of the overall United States population. Among the five cities with the highest rates of unsheltered homelessness, four are in California (San Francisco, Los Angeles, Santa Rosa, and San Jose), and the other is Seattle. The three cities with the highest rates of sheltered homelessness are all located in the Northeast: Boston, New York City, and Washington, D.C. The rate of sheltered homelessness in each of these cities is over 2.7 times as high as in San Francisco, the city with the fourth highest rate of sheltered homelessness. New York City alone has over one fifth of all sheltered homeless people in the United States.

In the context of a simple supply and demand framework, we next assess the major factors that explain variation in homelessness across communities in the United States. Figure 1 shows how the supply and demand for homes determine the number of homeless people. Once the equilibrium quantity of homes (or more precisely, people living in homes) is determined, the equilibrium number of homeless people is the total (non-institutionalized) population minus the number of homes. In figure 1, the initial equilibrium number of homes is given by Q_1 . The total population is given by T_1 , and so the equilibrium number of homeless people is simply

¹ For two recent reviews of the literature and evidence on homelessness, see Evans et al. (2019) and O’Flaherty (2019).

$T_1 - Q_1$. When the supply of homes shifts outward, the equilibrium number of homes increases to Q_2 . Many of these homes are filled by people who move in from other areas, thus increasing total population to T_2 . The other homes are filled by formerly homeless people, and so the new equilibrium number of homeless people, $T_2 - Q_2$, is smaller than the original equilibrium, $T_1 - Q_1$. If alternatively, the demand for homes shifts inward due, for example, to an increased supply of homeless shelters, the equilibrium quantity of homes falls to Q_3 . Assuming people do not migrate into the area to fill the homeless shelters, the total population T_1 remains constant. Thus, the equilibrium number of homeless people increases to $T_1 - Q_3$. (See O’Flaherty 2003 for an alternative supply and demand framework for understanding the market-level determinants of homelessness.)

Figure 1. How the Supply and Demand for Homes Determines Homelessness



Note: P denotes the price of a home. Q denotes the quantity of homes (expressed in terms of number of people housed). T denotes the total population. The number of homeless people is represented by the difference between T and Q.

On the basis of this supply and demand framework, we consider four major drivers of homeless populations: (i) the higher price of housing resulting from overregulation of housing markets; (ii) the tolerability of sleeping on the street (outside of shelter or housing); (iii) the supply of homeless shelters; and (iv) the characteristics of individuals in a community that make homelessness more likely.

The first factor that explains variation in homelessness across the United States is the high cost of housing in certain areas, in large part due to regulations that drive up home prices above the cost to produce a home. Overregulation of housing markets shifts the supply of homes inward, increasing home prices and homelessness. Consistent with this prediction, research consistently finds that areas with higher home prices tend to have higher rates of overall

homelessness. We simulate the impact of deregulation on homeless population sizes in individual metropolitan areas. To do so, we rely on estimates of the ratio of home prices to home production costs produced by Glaeser and Gyourko (2018). We assume that deregulation would reduce prices until reaching production costs, and then translate these lower home prices into lower rents. Finally, we use estimates of the response of homelessness to rents to simulate the impact of deregulation on homeless populations. We find that for the 11 metropolitan areas with housing regulations that drive home prices significantly above home production costs (which contain 42 percent of the United States homeless population), deregulation would reduce homelessness by an average of 31 percent. Homelessness would fall by 54 percent in San Francisco, 40 percent in Los Angeles, and 23 percent in New York City. Overall homelessness in the United States would fall by just under 72,000 people, or 13 percent.

The second factor that explains variation in homelessness across the United States is the tolerability of sleeping on the streets (outside of shelter or housing). A higher tolerability of sleeping on the streets shifts the demand for homes inward and increases homelessness. Climate is a key component of street tolerability but not the only one. Colder areas uniformly exhibit low rates of unsheltered homelessness in January, while warmer areas exhibit wide variation. For example, Florida and Arizona have unsheltered homeless populations lower than what would be expected given the temperatures, home prices and poverty rates in their communities. Meanwhile, the unsheltered homeless population is over twice as large as expected—given the temperatures, home prices and poverty rates of their communities—in States including Hawaii, California, Nevada, Oregon, and Washington State. The extent of policing of street activities may play a role in these differences.

The third factor that explains variation in homelessness is the supply of substitutes to housing through the provision of homeless shelters. Expanding the supply of homeless shelters shifts the demand for homes inward and increases homelessness. A larger supply of shelter entails a higher shelter quality (i.e., characteristics of a shelter that make it more desirable as a place to stay) at any given number of beds. Mandating a right-to-shelter with a sufficiently high minimum quality level could thus substantially increase sheltered homeless populations. In fact, Boston, New York City, and Washington, D.C. are the three cities with the highest rates of sheltered homelessness, and each of these cities is subject to a right-to-shelter law that guarantees shelter availability of a given quality (although shelter quality certainly varies within each city, and shelters do not always meet standards). After adjusting for January temperature, home prices, and poverty rates, right-to-shelter places have average rates of sheltered homelessness over three times as high as places without a right to shelter. Boston, New York City, and Washington, D.C. also have substantially higher rates of overall homelessness than almost every other city, suggesting that most people being sheltered would not otherwise sleep on the street. There of course may be other characteristics beyond

weather, home prices and poverty rates that drive the dramatically different rates of sheltered homelessness in these three cities, but the framework in figure 1 suggests that right-to-shelter laws may play an important role, especially if the mandated quality level is substantially higher than quality levels achieved in non-right-to-shelter places. While shelter is an absolutely necessary safety net of last resort for some people, right-to-shelter policies may not be a cost-effective approach to ensuring people are housed.

The fourth factor is a higher prevalence of individual-level demand factors in the population which affect overall homelessness. An increased prevalence of risk factors for homelessness within the population shifts the demand for homes inward and increases the number of homeless people. Research has shown that individuals with severe mental illness, substance abuse problems, a history of incarceration, low incomes, and weak social ties are more likely to become homeless. Thus, when the prevalence of these factors grows in a community, the rate of homelessness may grow as well.

After analyzing the fundamental causes of homelessness, we next discuss the record of previous Federal policies in reducing homelessness over the past decade. During this period, the Federal Government supported a major expansion in permanent housing assistance directed toward people experiencing homelessness. Between 2007 and 2018, the stock of permanent supportive housing (long-term housing with supportive services) and rapid rehousing (short-term rental subsidies) increased by just under 282,000 beds, a 149 percent increase. The Federal Government also increasingly emphasized a Housing First approach, which in the context of permanent supportive housing provides housing with no preconditions or service participation requirements after people are stabilized. While the direct effect in the short-run of placing a homeless person in housing shifts the demand for homes outward and thus reduces homelessness, this effect can be reversed through supply responses (for example if home prices rise or the quality of shelter adjusts upward as shelter operators try to fill beds) or if demand shifts back in as people remain in housing programs longer than they would have otherwise remained homeless.

In fact, research suggests that previous Federal policy is not capable of explaining a large portion of the reported decline in homelessness between 2007 and 2018. In addition, we show that contrary to reported trends that suggest a more than 94,000 person (15 percent) reduction in homelessness since 2007, it is unclear whether homelessness in the United States has actually decreased. At least in part, the reported decline in homelessness may be a result of an inconsistent definition of people living in transitional housing versus rapid rehousing, and miscounting of the unsheltered homeless population.

In order to address the problem, the Trump Administration is addressing the root causes of homelessness. President Trump signed an executive order that will seek to remove regulatory barriers in the housing market, which would reduce homelessness due to an outward shift in the supply of homes. Individual risk factors that shift the demand for homes inward are being addressed as well. The President's policies have contributed to the first reduction in total drug overdose deaths in decades through the expansion of drug treatment and reduction in the supply of illicit drugs. An increased emphasis on serious mental illness and helping formerly incarcerated individuals reconnect with society via the First Step Act will help reduce the individual risk of entering homelessness as well. The administration has also consistently supported the police in promoting safe cities. Finally, the U.S. Department of Housing and Urban Development has improved Federal homeless assistance programs by providing flexibility for communities to utilize service participation requirements and more strongly encouraging self-sufficiency. These reforms may reduce homelessness more in the long-run than previous policies to the extent that they more successfully address the underlying problems that homeless people face and thus, more successfully transition people out of homeless assistance programs which can free up these programs for other people living on the streets or in shelter.

The Geography of Homelessness in America

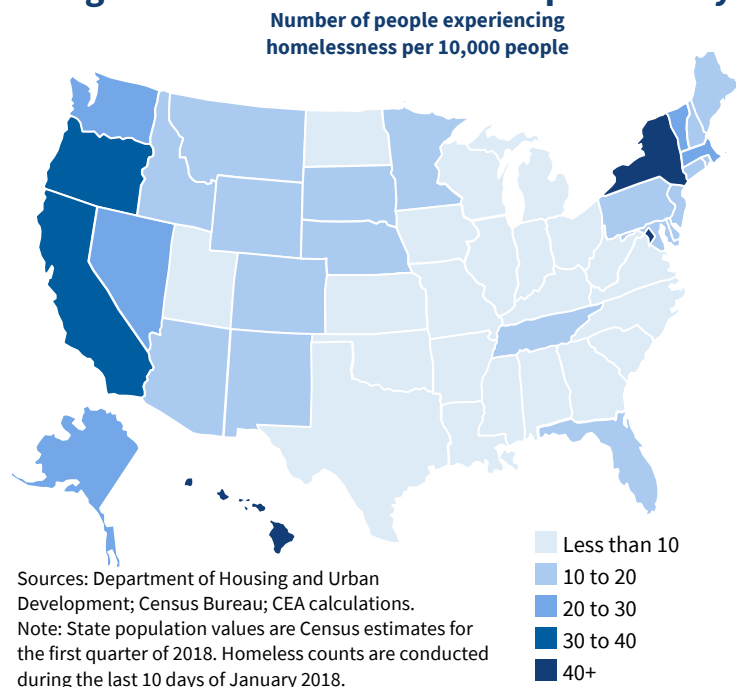
The U.S. Department of Housing and Urban Development (HUD) defines a person as homeless if he or she “lacks a fixed, regular, and adequate nighttime residence” (HUD 2018b, p. 2). On a single night each year, communities count and report their homeless population to HUD, including people who are unsheltered (in places not intended for human habitation such as sidewalks, parks, cars or abandoned buildings) and people who are sheltered (in emergency shelter or transitional housing programs).² Counts are conducted by Continuums of Care (CoCs), which comprise a single city, a single county, a group of counties or an entire state. CoCs are designed to coordinate a community's response to homelessness by integrating shelter, services, and housing programs for homeless and formerly homeless people. In 2018, there were 398 CoCs. Counts are generally conducted on a single night during the last ten days of January. While this practice likely produces unsheltered counts that are lower than counts would be in warmer months, it likely produces higher sheltered counts which are believed to be more reliable than unsheltered counts. In general, these homeless counts are highly imperfect, but they nonetheless represent the best available national snapshot of the homeless population at a point in time.

² Point-in-time counts are required only in every other year for unsheltered populations, although many communities conduct counts every year.

In January 2018, 552,830 people were counted as homeless in the United States. Of those, 194,467 (35 percent) were unsheltered, and 358,363 (65 percent) were sheltered. The overall homeless population on a single night represents 0.2 percent of the U.S. population, or 17 people per 10,000 in the population.

Rates of overall homelessness are highly uneven across States (figure 2). The States and District of Columbia with the highest overall rates of homelessness per 10,000 are the District of Columbia (5.8 times the U.S. rate), New York (2.8 times the U.S. rate), Hawaii (2.7 times the U.S. rate), Oregon (2.0 times the U.S. rate), and California (1.9 times the U.S. rate). These four States and the District of Columbia contain 45 percent of the entire homeless population in the United States, despite containing just 20 percent of the overall population.

Figure 2. Overall Homeless Population by State, 2018



Within States, some cities have especially high rates of homelessness. Compared to a national rate of 17 homeless people per 10,000, the cities (and their larger CoCs) with the highest rates of overall homelessness are Washington, DC (103 per 10,000), Boston, MA (102 per 10,000), and New York, NY (101 per 10,000), as shown in table 1. These cities each have homelessness rates that are over 6 times as high as the overall U.S. rate.

Table 1. Rate of Homelessness per 10,000 in Continuums of Care (CoCs) with Top Five Highest Rates, 2018

Overall		Sheltered		Unsheltered	
CoC	Rate	CoC	Rate	CoC	Rate
Washington, DC	103.3	Boston, MA	99.1	San Francisco, CA	59.8
Boston, MA	101.8	New York, NY	96.7	Los Angeles, CA	40.4
New York, NY	101.5	Washington, DC	94.3	Santa Rosa, CA	38.5
San Francisco, CA	94.3	San Francisco, CA	34.4	Seattle, WA	30.9
Santa Rosa, CA	59.8	Baltimore, MD	32.2	San Jose, CA	30.3

Sources: Department of Housing and Urban Development, Point-in-Time Counts and Shapefiles, 2018; American Community Survey 2013-2017; CEA calculations.

Note: Excludes CoCs with population below 500,000 and “balance of state” CoCs.

Unsheltered homelessness rates vary substantially across the United States as well and tend to be highest in cities on the West Coast. In fact, four out of the five cities with the highest rates of unsheltered homelessness are located in California, and the fifth is in Washington State. San Francisco has the highest rate of unsheltered homelessness at 60 per 10,000, 10 times as high as the U.S rate of 6 per 10,000. The cities with the next highest rates of unsheltered homeless are Los Angeles, Santa Rosa, Seattle, and San Jose. California is home to 47 percent of all unsheltered homeless people in the United States, and Los Angeles is home to 19 percent.

In terms of sheltered homelessness, three cities in the Northeast—New York City, Washington, D.C. and Boston—have substantially higher rates than all other cities. The rate of sheltered homelessness is at least 8 times as high in each of these cities as in the United States overall (11 per 10,000). The city with the fourth highest rate of sheltered homelessness, San Francisco, has a rate of sheltered homelessness that is just over 3 times as high as the rate in the United States overall. New York City contains over one fifth of all sheltered homeless people in the United States.

Drivers of Variation in Homelessness Across the United States

This section uses the model of supply and demand described in figure 1 to analyze the factors that explain why some places have higher rates of homelessness than others: (i) the higher price of housing resulting from overregulation of housing markets; (ii) the tolerability of sleeping on the street (outside of shelter or housing); (iii) the supply of homeless shelters; and (iv) the characteristics of individuals in a community that make homelessness more likely.

The Price of Housing

When housing prices rise, economic theory predicts that more people will have difficulty paying rent and in some cases end up homeless. This is represented in figure 1 by an inward shift in the supply of homes that increases the equilibrium number of homeless people. A large body of academic literature confirms that higher home prices are indeed associated with higher rates of homelessness. Corinth (2017) uses panel data on CoCs and finds that a 1 percent increase in median rent within a CoC is associated with a 1 percent increase in its rate of homelessness. Using similar data, Hanratty (2017) finds that a 1 percent increase in median rent is associated with a rate of homelessness that is 0.9 percent higher. Quigley et al. (2001) find similar results using variation over time within counties in California, with a one percent increase in median rent associated with a 0.9 to 1.2 percent increase in the rate of homelessness for certain specifications. Other studies find strong positive associations between rates of homelessness and rents based on variation across communities as well (e.g., Bohanon 1991; Honig and Filer 1993; Early and Olsen 2002; Byrne et al. 2013; Glynn et al. 2018), although unlike studies using panel data, these studies are unable to control for unobserved time-invariant factors (such as cultural factors that do not change over time) in communities that may be correlated with rents and homelessness.

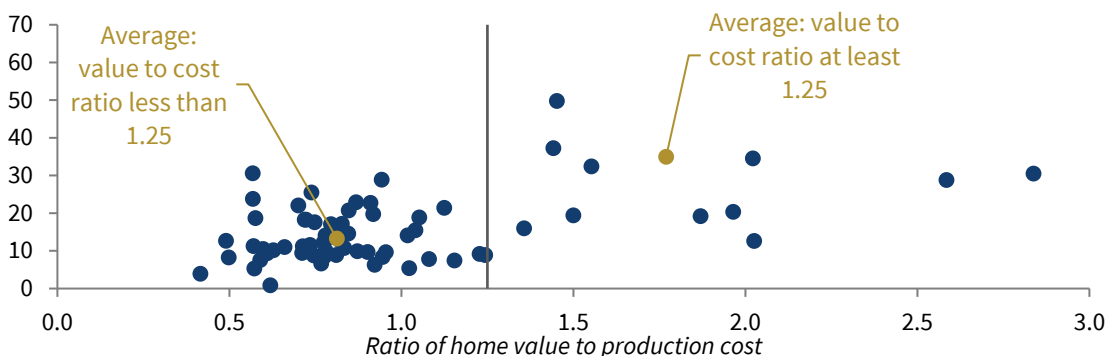
A central driver of higher home prices in some communities is the heavy regulation of housing markets by localities. For example, as stated in President Trump’s Executive Order Establishing a White House Council on Eliminating Regulatory Barriers to Affordable Housing, such regulations include: “overly restrictive zoning and growth management controls; rent controls; cumbersome building and rehabilitation codes; excessive energy and water efficiency mandates; unreasonable maximum-density allowances; historic preservation requirements; overly burdensome wetland or environmental regulations; outdated manufactured-housing regulations and restrictions; undue parking requirements; cumbersome and time-consuming permitting and review procedures; tax policies that discourage investment or reinvestment; overly complex labor requirements; and inordinate impact or developer fees.” These regulations reduce the supply of housing and as a result drive up home prices (e.g., Quigley and Raphael 2005; Quigley and Rosenthal 2005; Glaeser and Ward 2009; Saiz 2010; Gyourko and Molloy 2015).

Given that housing market regulations increase home prices and higher home prices are associated with higher rates of homelessness, areas with more regulated housing markets would be predicted to have higher rates of homelessness. We show that this prediction holds in figure 3. The extent of housing market regulation is based on data from Glaeser and Gyourko (2018). They argue that if housing regulations do not constrain the supply of housing, then home values should not exceed the cost to produce a home. After all, in a housing market

without supply constraints, new homes would be built until home values fell to their production cost. Glaeser and Gyourko (2018) identify 11 metropolitan areas where housing values exceed 125 percent of the cost of producing a home, the sum of construction costs and land costs, plus a normal profit margin.³ Figure 3 shows that these 11 supply constrained metropolitan areas have temperature-adjusted rates of homelessness (based on average January temperatures) that generally far exceed homelessness rates in other metropolitan areas. The average temperature-adjusted rate of homelessness in supply constrained areas is 35.0 per 10,000, almost three times as high as the rate of 13.3 per 10,000 in areas that are not supply constrained. Four of the five metropolitan areas with the highest home value to production cost ratios are located in California.

Figure 3. Temperature-adjusted Homelessness Rate by Ratio of Home Value to Production Cost, by Metropolitan Area

Temperature-adjusted rate of homelessness per 10,000 people



Sources: U.S. Department of Housing and Urban Development, Point-in-Time Counts and Shapefiles, 2018; U.S. Census Bureau; Glaeser and Gyourko (2018); National Oceanic and Atmospheric Administration; CEA calculations. Note: Each CoC is merged into the metropolitan area in which the majority of its overall population is found. The temperature adjusted rate of homelessness is obtained by regressing the natural logarithm of the homelessness rate on the average temperature in January, and then using the estimated coefficient on temperature to adjust the rate of homelessness in each metropolitan area according to the average temperature among all metropolitan areas.

We next provide original estimates of the extent to which stringent housing market regulation contributes to homelessness in highly regulated cities and the United States overall. To do so, we rely on the same Glaeser and Gyourko (2018) data used in figure 3. In our first step, we simulate how rents would fall if these metropolitan areas deregulated their housing markets. In our second step, we apply estimates of the responsiveness of homelessness to rent from the

³ Some have argued that this approach used by Glaeser and Gyourko could understate the value of land (see O’Flaherty 2003a). However, because we are unaware of other estimates of the ratio of home values to production costs that more accurately account for land prices, we rely on the Glaeser and Gyourko estimates.

academic literature to estimate the reduction in homelessness in each of these metropolitan areas from deregulation.

Our first step is to simulate how rents would fall if the 11 metropolitan areas identified by Glaeser and Gyourko (2018) as supply-constrained deregulated their housing markets.⁴ To do so, we assume that deregulation would reduce the ratio of home values to production costs to one in these 11 areas. We assume that annual rent is equal to annual cost broadly defined, but do not simply assume that annual cost is proportional to the home value, because deregulation that reduces the rent for a home of a given quality would not necessarily change all of the cost components to operate it. Thus, we assume that annual rent prior to deregulation, R_0 , can be written as

$$R_0 = \alpha V_0 + \gamma R_1$$

Here, α is a scalar applied to the home value V_0 prior to deregulation (reflecting property taxes, interest payments and any other cost elements proportional to the home value). For example, if the only cost element proportional to the home value was a 1 percent annual property tax, then we would have $\alpha = 0.01$. In addition, γ is a scalar proportional to the post-deregulation annual rent, R_1 , so that γR_1 reflects the constant annual cost to maintain and otherwise operate a home of a fixed quality even if the market rent exceeds R_1 due to regulation. The annual rent after deregulation, R_1 , can then be written as

$$R_1 = \alpha V_1 + \gamma R_1$$

Because the value of the home after deregulation $V_1 < V_0$, it must be the case that $R_1 < R_0$ as well. We let $r \equiv \frac{V_0}{V_1}$ denote the ratio of the home value before deregulation to the home value after deregulation. We follow Glaeser and Gyourko (2018) in assuming that V_1 is equal to the production cost of the home. Taking the ratio of rents and simplifying, we obtain

$$\frac{R_0}{R_1} = (1 - r)\gamma + r$$

Note that because $r > 1$ (i.e., the home value is higher before deregulation), a larger γ reduces the rent ratio, since the fixed cost of operating the home is larger. In the extreme cases, $\gamma = 0$ implies all costs are proportional to the home value and so the rent ratio is equal to the home value ratio, and $\gamma = 1$ implies all costs are fixed independent of the home value and so the rent ratio is equal to one. We use $\gamma = 0.33$, approximately equal to median operating costs (net of

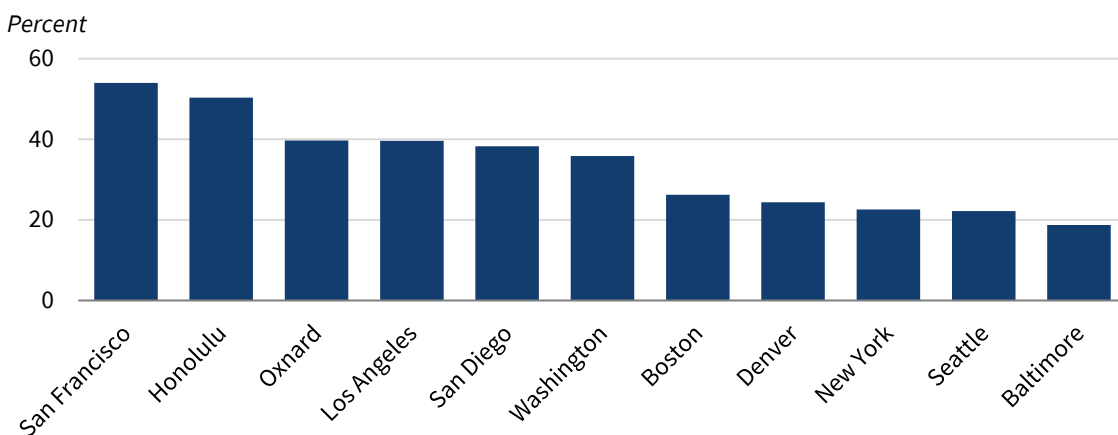
⁴ We note that Glaeser and Gyourko estimates are for 2013. Given home price increases since then, ratios of home values to production costs are likely higher in 2018.

taxes) divided by median rent in a national sample of rental units analyzed by Goodman (2004). The median unit is likely not in a supply constrained market (Glaeser and Gyourko 2018 find that 74 percent of homes have values near or below production costs) and so the median unit is appropriate to use for an estimate of operating costs as a percent of rent in deregulated markets. Our value of r for each metropolitan area is the ratio of home values to production costs estimated by Glaeser and Gyourko (2018).

Our second step is to estimate the reduction in homelessness when reducing rental home prices according to the rent ratio obtained above. To do so, we apply an elasticity of approximately one (0.967), so that a 1 percent reduction in rental home prices reduces the rate of homelessness by 1 percent. This elasticity is that estimated by Corinth (2017) and is similar to those estimated by other studies using panel data to estimate associations between rental home prices and homelessness.

Figure 4 shows how homelessness rates would fall in the 11 supply constrained metropolitan areas. The largest reductions occur in the areas with the highest ratios of home values to home production costs, since rental home prices fall by the largest amounts in these places. If housing were deregulated, homelessness would fall by 54 percent in San Francisco, by 50 percent in Honolulu, by 40 percent in Oxnard and Los Angeles, by 38 percent in San Diego, by 36 percent in Washington, D.C., and by between 19 and 26 percent in Boston, Denver, New York, Seattle and Baltimore.

Figure 4. Percent Reduction in Homelessness by Metropolitan Area from Deregulating Housing Markets



Sources: U.S. Department of Housing and Urban Development, Point-in-Time Counts and Shapefiles, 2018; U.S. Census Bureau; Corinth (2017); Glaeser and Gyourko (2018); Goodman (2004); CEA Calculations.

Note: Each CoC is merged into the metropolitan area in which the majority of its overall population is found.

Simulation assumes that deregulation reduces home value to production cost ratio to 1 for all metropolitan areas with ratio of at least 1.25. See text for further details of simulation.

The aggregate reduction in homelessness in these 11 metropolitan areas would have important effects for the United States as a whole. As shown in table 2, aggregate homelessness would fall by just under 72,000 people, or 13 percent. In Los Angeles and New York City, homelessness would fall by over 20,000 people in each metropolitan area for a combined decrease of almost 44,000 people, or 61 percent of the total United States reduction. These effects are relatively robust to different values of γ (i.e., operating costs as a percent of rent that are independent of the value of a constant-quality home). For example, assuming $\gamma = 0.5$ results in an 11 percent reduction in overall homelessness, and assuming $\gamma = 0.2$ results in a 15 percent reduction in overall homelessness.

Table 2. Reduction in Rental Home Prices and Homelessness from Deregulating Housing Markets, by Metropolitan Area

Metropolitan area	Percent change in rent	Current homeless population	Change in homeless population	Percent change in homeless population
San Francisco	-55%	16,920	-9,133	-54%
Honolulu	-51%	4,495	-2,262	-50%
Oxnard	-41%	1,308	-519	-40%
Los Angeles	-41%	57,720	-22,861	-40%
San Diego	-39%	8,576	-3,280	-38%
Washington	-37%	11,172	-4,006	-36%
Boston	-27%	13,587	-3,566	-26%
Denver	-25%	5,317	-1,296	-24%
New York	-23%	92,024	-20,768	-23%
Seattle	-23%	14,598	-3,237	-22%
Baltimore	-19%	4,163	-779	-19%
Subtotal (above 125% of cons. cost)		229,880	-71,709	-31%
Subtotal (below 125% of cons. Cost)		322,950	0	0%
Total		552,830	-71,709	-13%

Sources: Department of Housing and Urban Development, Point-in-Time Counts and Shapefiles, 2018; U.S. Census Bureau; Corinth (2017); Glaeser and Gyourko (2018); Goodman (2004); CEA calculations.

Note: Each CoC is merged into the metropolitan area in which the majority of its overall population is found.

Simulation assumes that deregulation reduces home value to production cost ratio to 1 for all metropolitan areas with ratio of at least 1.25. See text for further details of simulation.

It is important to note that housing supply responses resulting from deregulation would take many years to translate into the types of price reductions, and thus homelessness reductions,

shown here. The current housing stock is fixed according to previous regulatory regimes, and building new housing takes time. Still, these results suggest that the severe homelessness problems in a number of metropolitan areas are in large part a direct result of city-created regulations on housing.

These findings are also broadly consistent with results from Raphael (2010), who uses a different methodology to assess how housing market regulation drives up homelessness rates. Using an index of housing market regulation by metropolitan area, he finds that deregulation could reduce overall United States homelessness by 7 to 22 percent. He does not show how homelessness reductions would vary across specific areas.

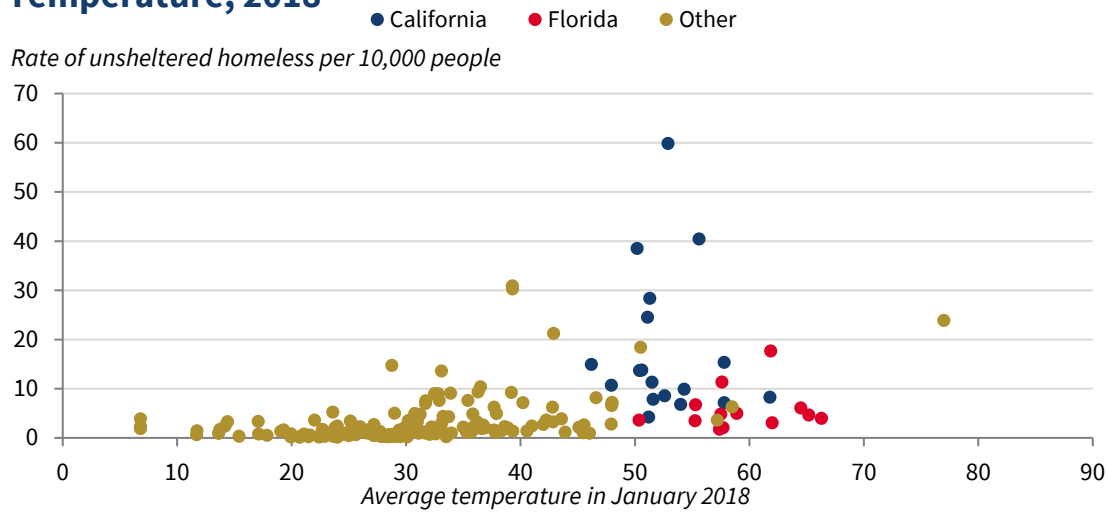
The Tolerability of Sleeping on the Street

Just as increasing the price of being housed increases homelessness, increasing the tolerability of sleeping on the streets (outside of housing or shelter) increases homelessness as well. Increasing the tolerability of living on the streets shifts the demand for homes inward, and so the number of people living on the streets increases.

One important factor that helps determine the tolerability of sleeping unsheltered on the streets is climate. Sleeping on the streets is always harmful to one's health, and can be associated with higher rates of mortality (Roncarati et al. 2018). However, sleeping unsheltered is even more harmful when it is cold. Research consistently finds that colder climates are associated with lower rates of unsheltered homelessness (Byrne et al. 2013).

In figure 5, we plot each CoC based on its rate of unsheltered homelessness and average January 2018 temperature. As Corinth and Lucas (2018) point out, rates of unsheltered homelessness are uniformly low in cold places. In other words, the difficulty of sleeping on the streets is so high during the winter in places like Minneapolis that unsheltered homelessness is extremely rare. However, there is wide variation in rates of unsheltered homelessness in warmer places. For example, Orlando, Las Vegas, and San Francisco all have average January temperatures of between 50 and 60 degrees Fahrenheit. But their rates of unsheltered homelessness are 2, 19 and 60 per 10,000 people respectively. In general, CoCs in California have higher rates of unsheltered homelessness than CoCs in Florida, despite similar January temperatures. It is clear that warm climates enable, but do not guarantee, high rates of unsheltered homelessness. Thus, factors beyond climate help determine rates of unsheltered homelessness in warm places.

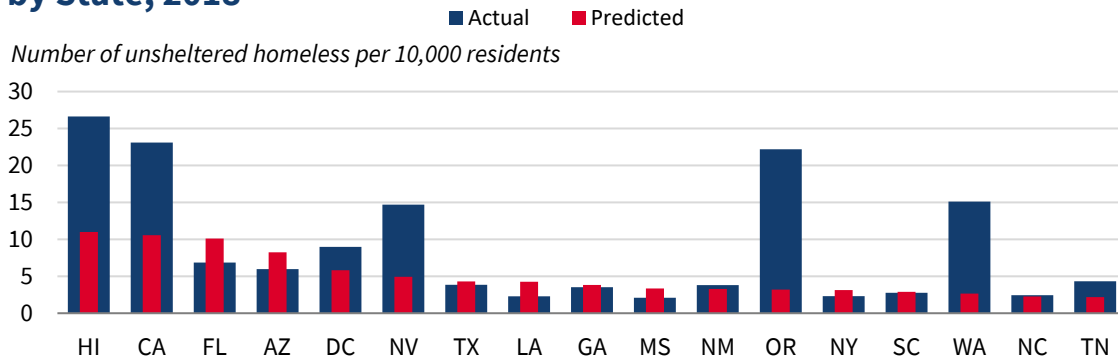
Figure 5. Unsheltered Homelessness Rate by Average January Temperature, 2018



Sources: U.S. Department of Housing and Urban Development, Point-in-Time Counts and Shapefiles, 2018; American Community Survey 2013-2017; National Oceanic and Atmospheric Administration; CEA Calculations.
 Note: Excludes CoCs with population below 500,000.

While figure 5 shows that large variation exists across CoC in rates of unsheltered homelessness, even after accounting for temperature, it does not adjust for other factors such as home prices or poverty rates that might explain some of this variation. In addition, some of the variation could be explained by variation across CoCs within each State that may not necessarily reflect policy differences. Thus, in figure 6 we compare actual rates of unsheltered homelessness in States to rates that would be expected once accounting for January temperature, home prices, and poverty rates in each CoC within each State. If the actual rate of unsheltered homelessness in a State is substantially higher than the expected rate accounting for January temperature, home prices and poverty rates, this suggests that other differences are needed to explain the remaining variation. Figure 6 includes the 17 States with the highest predicted rates of unsheltered homelessness.

Figure 6. Actual and Predicted Rates of Unsheltered Homelessness by State, 2018



Sources: U.S. Department of Housing and Urban Development, Point-in-Time Counts and Shapefiles, 2018; American Community Survey 2013-2017; National Oceanic and Atmospheric Administration; CEA calculations.

Note: We form predicted unsheltered homelessness rates by regressing the natural logarithm of unsheltered homelessness rates on average January temperature, the natural logarithm of average median rent across census tracts in each CoC, and the natural logarithm of the poverty rate in the CoC. The predicted value for each CoC is simply the predicted rate of unsheltered homelessness in the CoC given its temperature, median rent, and poverty rate. These rates are converted into total counts, the total counts are summed within each State, and then predicted State-level unsheltered homelessness rates are formed.

In fact, the actual unsheltered homelessness rate is 2.4 times as high in Hawaii, 2.2 times as high in California, 3.0 times as high as in Nevada, 6.9 times as high in Oregon, and 5.7 times as high in Washington State, compared to the rates expected given the January temperature, home prices and poverty rates of each CoC within each State. By contrast, the actual rate of unsheltered homelessness is lower in Florida, Arizona and Texas than their expected rates.

A number of potential factors could help explain the remaining variation in rates of unsheltered homelessness. One potential factor is differences in city ordinances and policing practices, as these policies would directly affect the tolerability of living on the street and predict the aggregate number of unsheltered homeless people. Some States more than others engage in more stringent enforcement of quality of life issues like restrictions on the use of tents and encampments, loitering, and other related activities. In addition, Berk and MacDonald (2010) note that the 2006 Safer Cities Initiative in Los Angeles, which intended to remove encampments in Skid Row, did so successfully, albeit temporarily:

“The immediate goals of the SCI [Safer Cities Initiative] were demonstrably achieved. The Skid Row homeless encampments were cleared. The concentration of homeless individuals was dispersed. The debris they left behind was removed.” (Berk and MacDonald 2010, p. 817)

Others have noted that policing may help determine rates of unsheltered homelessness as well. In his 1989 book, “Down and Out in America: The Origins of Homelessness”, University of

Chicago sociologist Peter Rossi explains why unsheltered homelessness may have grown in the 1980s:

“The ‘old’ homeless may have blighted some sections of the central cities, but from the perspective of urbanites they had the virtue of being concentrated on Skid Row, which one could avoid and hence ignore. Also, most of the old homeless had some shelter, although inadequate by any standards, and very few were literally sleeping on the streets. Indeed, in those earlier years, if people had tried to bed down on steam grates or in doorways and vestibules anywhere in the city, police patrols would have bundled them off to jail. The subsequent decriminalization of many status crimes, such as public inebriation and vagrancy—and the decreased emphasis on charges such as loitering has enlarged the turf homeless persons can claim.” (Rossi 1989, p. 34)

In his 1996 book, “Making Room: The Economics of Homelessness,” Columbia University economist Brendan O’Flaherty notes that nonpunitive policing that seeks to move people off the streets and into services can be effective as well:

“Aggressive but nonpunitive referral is a positive strategy; it has a record of reducing street homelessness and the attendant costs it imposes on other people” (O’Flaherty 1996, p. 280).

Of course, policies intended solely to arrest or jail homeless people simply because they are homeless are inhumane and wrong. At the same time, when paired with effective services, policing may be an important tool to help move people off the street and into shelter or housing where they can get the services they need, as well as to ensure the health and safety of homeless and non-homeless people alike. More research is needed to understand how different policing policies affect the outcomes of homeless people—including their ultimate destinations, mental health, drug use, employment and other dimensions of wellbeing—as well as outcomes for non-homeless people.

The Supply of Homeless Shelters

The third factor that explains variation in homelessness is the supply of substitutes to housing through homeless shelters. Expanding the supply of homeless shelters shifts the demand for homes inward and increases homelessness. A larger supply of shelter entails a higher shelter quality (i.e., characteristics of a shelter that make it more desirable for people who sleep there) at any given level of beds in the market. While shelter plays an extremely important role in bringing some people off the streets, it also brings in people who would otherwise be housed, thus increasing total homelessness. As Brendan O’Flaherty notes in his 1996 book:

“Free shelters that are hygienic, safe, and dignified enough to accomplish some of the goals they should accomplish are also attractive enough to bring in many people who would not otherwise be on the street.” (O’Flaherty 1996, p. 281)

To take two extreme examples, a bed on a floor in a congregate shelter may lead few people to come in off the streets or from housed situations, but a homeless shelter set up as a private apartment with a separate kitchen and bedrooms for a single family may bring in many more people from the streets and housing. New York City, for instance, provides the latter type of homeless shelter for some families in its homeless assistance system. Indeed, Cragg and O’Flaherty (1999) find that higher quality shelters increased homelessness in New York City in the 1990s. It is important to note that shelter that draws in people from housed situations may still be desirable social policy if those housed situations are abusive or otherwise harmful for spouses, partners or children. At the same time, higher quality shelters may also draw in many people who would be safely housed independently. In addition, if people who end up in homeless shelters are provided rental subsidies or other forms of assistance, this could increase the incentive for people to turn to shelters in the first place or to stay in shelters longer. O’Flaherty and Wu (2006) find that the promise of housing subsidies for shelter dwellers increased the length of time families spend in shelter in New York City.

Measuring shelter quality is difficult. But some places – including New York City, the State of Massachusetts, and the District of Columbia – provide a legal “right to shelter” that promises shelter of some minimum level of quality.⁵ While in most places shelter quality or availability may fall when the number of people requesting them increases, this is not allowed to occur in places that have a right to shelter. Thus, as long as the minimum shelter quality is set high enough (i.e., higher than equilibrium quality levels reached in other places), we would expect right-to-shelter places to have a larger supply of homeless shelters.⁶ Unfortunately, little research has studied how shelter quality varies across areas. In addition, minimum quality standards likely vary across places with a right to shelter, and actual shelter quality varies within a given city. Nonetheless, there is reason to believe that average shelter quality is higher in right-to-shelter places. After all, if minimum quality standards were set below market equilibrium levels and thus were not binding, it is unclear why cities would institute such policies in the first place.

⁵ Leopold (2014) notes that Hennepin County, MN, Columbus, OH, and Montgomery County, MD each provide a guaranteed right to shelter as well. Also, see Main (2016) for a detailed account of how the right to shelter was developed in New York.

⁶ In terms of a homeless shelter “market,” a right to shelter would be reflected by a perfectly flat supply curve set at the minimum quality level, compared to a downward sloping curve in places without a right-to-shelter, since quality would adjust downward as more people utilize shelter beds (as noted in O’Flaherty 2019).

Figure 7 shows the 5 cities with the highest rates of sheltered homelessness. As shown in table 1, the three cities with the highest rates are Boston, New York City, and Washington, D.C. In each of these three right-to-shelter cities, the rate of sheltered homelessness is over 2.7 times as high as in San Francisco, the city with the fourth highest rate of sheltered homelessness. The especially high rates of sheltered homelessness in Boston, New York and Washington, D.C. cannot be explained by their temperatures, home prices and poverty rates — as shown in figure 7, after adjusting for these factors, right-to-shelter places have sheltered homelessness rates that are three times as high as would be predicted if they had no right to shelter. It is also not the case that most people in shelters in right-to-shelter places would otherwise be on the street. Boston, New York City, and Washington, D.C. have the three highest rates of overall homeless as well (see table 1).

Figure 7. Cities with Highest Rates of Sheltered Homelessness, Actual and Predicted Rates, 2018



Sources: Department of Housing and Urban Development, Point-in-Time Counts and Shapefiles, 2018; American Community Survey 2013–2017; CEA calculations.

Note: Among CoCs with a population of at least 500,000, only the five CoCs with the highest rates of sheltered homelessness are shown. Following Leopold (2014), right-to-shelter areas include New York City, the State of Massachusetts, the District of Columbia, Hennepin County, MN, Columbus, OH, and Montgomery County, MD. We form adjusted homelessness rates by regressing the natural logarithm of sheltered homelessness rates on average January temperature, the natural logarithm of average median rent across census tracts in each CoC, the natural logarithm of the poverty rate in the CoC, and an indicator for right-to-shelter status. The sheltered homelessness rate for each right-to-shelter CoC is adjusted downward based on the coefficient on right-to-shelter status.

Of course, there may be other factors beyond a right-to-shelter that lead Boston, New York City and Washington, D.C. to have different rates of sheltered homelessness than other cities, after adjusting for weather, home prices and poverty rates. But the dramatically higher rates of sheltered homelessness in the three cities with a right to shelter than all other cities suggests that right-to-shelter policies may play an important role.

Individual-Level Factors

Finally, a higher prevalence of individual-level risk factors for homelessness within the population reduces the demand for homes and thus increases homelessness in a community.

This is especially the case when the supply of homes is lower, and the supply of shelter and the tolerability of the streets is higher (see O’Flaherty 2004 for a discussion of the interaction between individual and community-level factors in determining homeless populations). A number of individual-level factors have been studied, including mental health, substance abuse, incarceration, poverty, and social ties.

According to the 2018 homeless point-in-time count, 111,122 homeless people (20 percent) had a severe mental illness and 86,647 homeless people (16 percent) suffered from chronic substance abuse (HUD 2018b). Among all adults who used shelter at some point in 2017, 44 percent had a disability (HUD 2018a). The extent to which these estimates accurately reflect the true proportion of the homeless population with these issues is unclear, given the varying methodologies used by CoCs to count and survey their homeless populations. However, other studies similarly suggest a high prevalence of mental illness and substance abuse in the homeless population. A national survey of homeless individuals conducted in 1996 found that among single adults, 39 percent experienced mental health problems, 26 percent experienced drug use problems, and 38 percent experienced alcohol use problems in the past month (Burt et al. 1999). A history of incarceration is also relatively common among homeless individuals. Among those adults entering a homeless shelter in 2017 from a non-homeless situation, 9 percent were identified as previously staying in a correctional facility (HUD 2018). Metraux and Culhane (2006) find that 17 percent of single adults in New York City shelters spent time in jail over the previous two years, and 8 percent had spent time in prison.

People experiencing homelessness generally have low incomes and relatively weaker social ties. According to a 1996 national survey of the homeless, mean incomes were around half of the poverty line both for single adults and for families (Burt et al. 1999). Corinth and Rossi-de Vries (2018) find that the lifetime incidence of homelessness is reduced by 60 percent for individuals with strong ties to family, religious communities, and friends. Among people who entered shelter in 2017 who were not already homeless, 51 percent had previously been staying with family or friends (HUD 2018a). This suggests that homelessness may result when these social ties are exhausted.

Although mental illness, substance abuse disorders, former incarceration, poverty, and weak social ties place individuals at a higher risk of homelessness, the vast majority of people with any of these issues is not homeless (even if all half a million homeless people faced all of these problems, there are millions of non-homeless Americans who face each problem as well). Thus, other factors are important as well in determining who becomes homeless. Among those with higher risk factors, homelessness is often a case of bad luck (O’Flaherty 2010). Still, addressing these individual-level factors could in part help reduce homeless populations, especially when

pursued in conjunction with policies that address community level determinants of homelessness.

The Ineffectiveness of Previous Federal Policies in Reducing Homeless Populations

The Federal Government provides funding to communities to support homeless assistance programs, and these programs can affect homeless populations as well, typically by either reducing the demand for homes by increasing the supply of homeless shelters, or by increasing the demand for homes by expanding housing programs in which people are not defined as homeless or by preventing homelessness before it occurs. HUD is the largest source of Federal funds, providing \$2.6 billion combined via the Continuum of Care program and Emergency Solution Grant program alone in 2019. These two programs support competitive funding to communities for homeless outreach, emergency shelter, transitional housing, rapid rehousing, permanent supportive housing and homelessness prevention. The U.S. Department of Veterans Affairs (VA) provides \$1.8 billion for programs that serve homeless veterans, in addition to funding from HUD targeted specifically to homeless veterans. VA also offers a range of other programs and services for homeless and at-risk veterans enrolled in the VA health care system, including comprehensive mental health care and substance use disorder programs. Other smaller sources of funding include the U.S. Department of Health and Human Services, the U.S. Department of Education, and the U.S. Department of Labor. State and local governments and private philanthropy provide substantial funding and support for homeless assistance as well.

Over the past decade, a major shift has occurred in Federal homelessness policies. As shown in figure 8, the stock of permanent supportive housing increased by over 170,000 beds, a 92 percent increase, since 2007. The stock of rapid rehousing beds increased from 0 to about 109,000. Together, permanent supportive housing and rapid rehousing beds increased by 280,000 beds, and this increase was nearly half the stock of total homeless assistance beds in 2007. In contrast, the stock of transitional housing beds fell from about 211,000 in 2007 to about 101,000 in 2018, a 52 percent decrease.

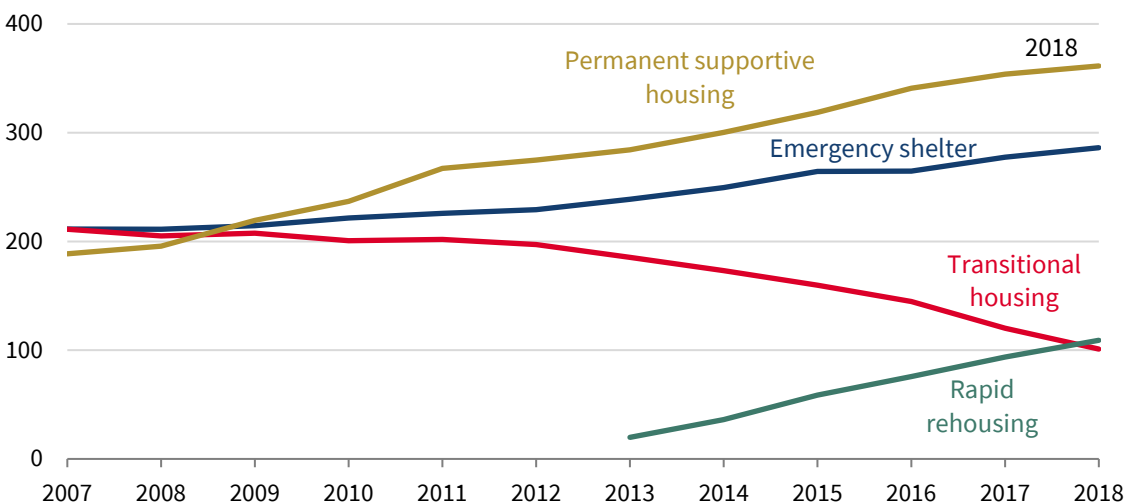
For permanent supportive housing, the Federal Government increasingly emphasized a “Housing First” approach over the past decade. Under Housing First, homeless individuals are provided supportive housing with no preconditions, and do not face requirements as a condition of retaining housing even after they have been stabilized.

The rest of this section assesses the extent to which Federal policy has been successful in reducing homeless populations, proceeding in two parts. First, we briefly summarize the

research on Housing First and permanent supportive housing, which does not suggest that Federal efforts have played a substantial role in the reported decline in homelessness over this time period. Second, we show that while reported homeless counts have fallen since 2007, major issues and flaws with the counts make it difficult to determine whether actual homeless populations have in fact fallen.

Figure 8. Number of Beds by Homeless Assistance Program Type, 2007–18

Number of beds (thousands)



Source: U.S. Department of Housing and Urban Development, Housing Inventory Counts, 2007–2018.

Evidence on the Effectiveness of Federal Efforts in Reducing Homeless Populations

Federal policy over the past decade has focused on placing homeless people into permanent housing more quickly, especially using a Housing First approach in permanent supportive housing. However, most studies on homelessness do not estimate the impact of interventions such as Housing First or permanent supportive housing more generally on homeless population sizes. Instead, they typically evaluate how individual outcomes of people change as a result of receiving specific interventions. For outcomes such as impacts on substance abuse and mental illness, Housing First in general performs no better than other approaches (Kertesz and Johnson 2017). It tends to cost more as well (Ly and Latimer 2015). A 2018 National Academies of Sciences report states: “Overall, except for some evidence that PSH [permanent supportive housing] improves health outcomes among individuals with HIV/AIDS, the committee finds that there is no substantial published evidence as yet to demonstrate that PSH improves health outcomes or reduces health care costs” (National Academies of Sciences, Engineering and Medicine 2018, p. 4). But there is strong evidence that housing homeless

people reduces the number of days the recipients of housing spend homeless. For example, a large randomized controlled trial in Canada found that a Housing First intervention providing permanent supportive housing significantly reduced the number of days single adults spend homeless (Goering et al. 2014). A major HUD-sponsored randomized control trial in the United States found that long term housing vouchers, but not necessarily rapid rehousing, reduced the amount of time families spend in homeless shelters (Gubits et al. 2016).

However, these types of individual-level studies cannot determine how policies that house homeless people affect homeless population sizes. When permanent supportive housing is expanded, and all beds are filled by people experiencing homelessness, the number of homeless people mechanically falls by the number of additional beds. However, this initial reduction can be undone through several possible mechanisms. First, when people exit homeless shelters, the quality of shelters may increase as shelter operators seek to fill their now vacant beds, and homelessness could rise back up. Second, when people are removed from unsheltered environments, the street may become a less difficult place to sleep when it becomes less congested with homeless people who utilize the most sought after spots, again increasing the number of people who remain or fall into homelessness. Third, increasing housing demand may increase the price of housing, drawing additional people into homelessness and weakening the initial reduction in homelessness further. Fourth, the people who live in the new permanent beds may remain there longer than they would have otherwise remained homeless. To the extent that housing programs over time house people who otherwise would have no longer been homeless, they no longer have any effect on reducing homelessness until the unit becomes vacant and a new person is removed from homelessness. Fifth, the promise of housing for homeless people could encourage people to stay homeless longer in order to qualify. Thus, the long-run reduction in the number of homeless people may be smaller than the original decline in homelessness that mechanically occurs from housing homeless people.⁷

While most empirical studies of Housing First and permanent supportive housing do not consider effects on homeless populations, one exception is Corinth (2017), who estimates the impact of permanent supportive housing beds on homeless population sizes using data from CoCs from 2007 through 2014. He finds that 10 additional permanent supportive housing beds reduce the homeless population by about 1 person. Thus, the approximately 173,000 increase in permanent supportive housing beds between 2007 and 2018 could explain less than one fifth (about 17,300 people) of the total reported decline in homelessness of about 94,000 people over this period. Meanwhile, Byrne et al. (2014) find only a modest association between chronic homeless population sizes and permanent supportive housing beds. Lucas (2017) studies how

⁷ See O’Flaherty (2019) for further discussion of these points.

Federal funding in general affects homeless populations—he unsurprisingly finds that more funding increases sheltered homelessness (presumably because Federal funding increases the supply of shelter), but he also finds no impact in reducing unsheltered homelessness. Other studies have found that Federal funding may reduce homelessness, although data limitations could play a role in these results (Moulton 2013; Popov 2017). More positive evidence has been found for programs that seek to prevent homelessness before it occurs, both at the individual level (Rolston et al. 2013; Evans et al. 2016) and community level (Goodman et al. 2016).⁸ But overall, the evidence does not suggest that Federal efforts have necessarily played a major role in the observed decline in homelessness between 2007 and 2018.

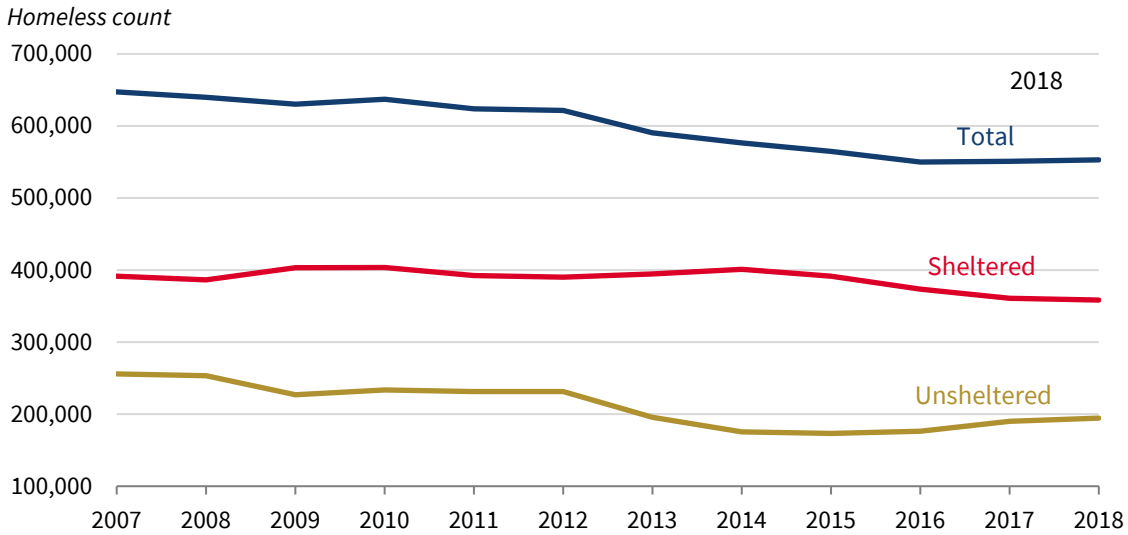
Evidence on Decline of Homeless Populations

Rather than resulting from previous Federal policies, a more likely explanation for the reduction in homeless counts between 2007 and 2018 is that they are largely artificial, a result of (i) transitional housing being defined as “homeless” but similarly time-limited rapid rehousing not being defined as “homeless,” and (ii) miscounting of unsheltered homeless people.

Figure 9 shows the trend in homeless counts between 2007 and 2018. The total homeless count fell by over 94,000 people (15 percent) over this period. Just over one third was accounted for by an approximately 33,000 person reduction in sheltered homelessness, and the remaining almost two thirds was accounted for by an approximately 61,000 person reduction in unsheltered homelessness. In the following subsections, we show that sheltered homelessness would have in fact risen if transitional housing were treated similarly to rapid rehousing in not being labeled as “homeless,” and that the reduction in unsheltered homelessness could potentially be explained by large outliers which likely result from changes in methodology or other counting errors.

⁸ Consistent with the positive effects of homelessness prevention programs, recent research finds that evictions have a significant impact on entries into homelessness (but limited or no effects on other outcomes such as employment, earnings, and financial strain) suggesting that preventing eviction may be a key mechanism through which homelessness prevention programs reduce homelessness (Collinson and Reed 2019; Humphries et al. 2019).

Figure 9. Homeless Count in the United States by Shelter Status, 2007–18

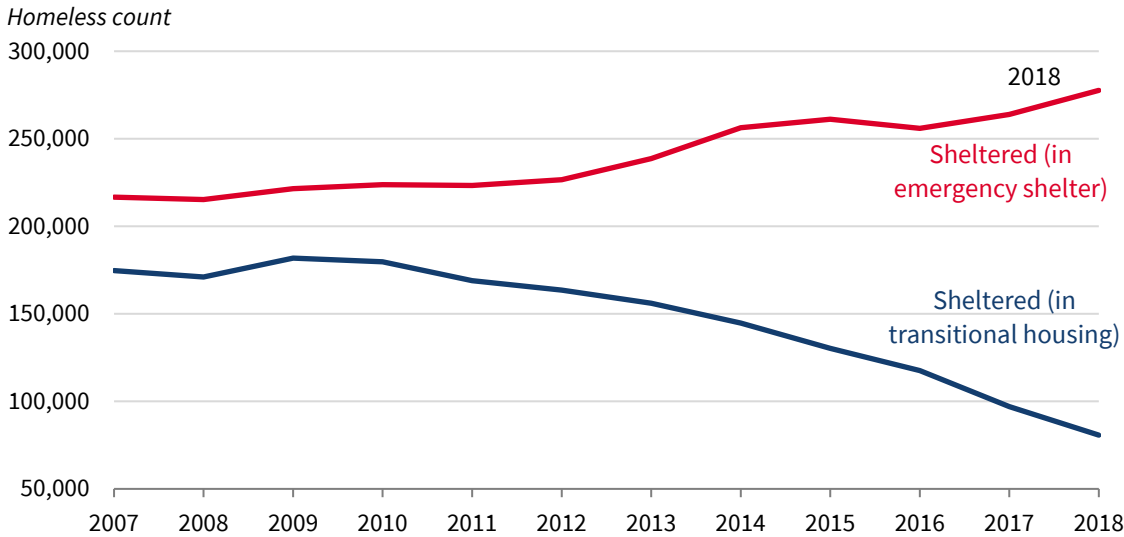


Source: U.S. Department of Housing and Urban Development, Point-in-Time Counts, 2007-2018.

Sheltered Homeless Counts

The number of sheltered homeless people is defined as the number of people living in emergency shelter plus the number of people living in transitional housing. Since 2007, the number of people living in emergency shelter increased by just under 61,000, while the number of people living in transitional housing decreased by just over 94,000 (figure 10). Adding these changes together, total sheltered homelessness fell by just over 33,000 people. Thus, the only reason we observe a reduction in total sheltered homelessness between 2007 and 2018 is because the number of people living in transitional housing fell by over 94,000. If people in transitional housing were not defined as “homeless,” then sheltered homelessness (including only people living in emergency shelters) would have increased by just under 61,000 people (28 percent) between 2007 and 2018.

Figure 10. Number of People Living in Emergency Shelter and Transitional Housing in the United States, 2007–18



Source: U.S. Department of Housing and Urban Development, Point-in-Time Counts, 2007-2018.

Indeed, defining people living in transitional housing as “homeless” is inconsistent with how other forms of homeless assistance are defined. Transitional housing provides stays of up to 24 months, generally in project-based living environments, and often promotes self-sufficiency goals for recipients. Meanwhile, rapid rehousing provides stays of up to 24 months in private apartments, but focuses less on self-sufficiency and does not make intensive services available for recipients. In practice, the duration of rapid rehousing tends to be shorter than stays in transitional housing for families, with rapid rehousing typically lasting around 7 to 8 months, and transitional housing stays averaging around 13 months, over the course of a 37-month period in the HUD-sponsored Family Options Study (Gubits et al. 2016). In addition, there is no statistical difference between rapid rehousing and transitional housing in terms of time spent by families on the street or in emergency shelter while not in the programs (Gubits et al. 2016). The Family Options Study itself, which assessed the effectiveness of transitional housing relative to rapid rehousing and other interventions, excluded transitional housing from the definition of “homelessness” so as not to bias results against transitional housing simply because people utilized the program as intended.

However, point-in-time sheltered counts follow the McKinney Vento Act in defining people in transitional housing as “homeless,” while defining people receiving rapid rehousing as “not homeless.” As a result, substituting rapid rehousing beds for transitional housing beds artificially reduces homeless counts and creates a bias against transitional housing in terms of homelessness reductions. This is precisely what has occurred over the past decade. The approximately 110,000 bed reduction in transitional housing between 2007 and 2018 has been

almost fully offset by an approximately 109,000 bed increase in rapid rehousing. While there is much debate about the relative merits and cost-effectiveness of transitional housing compared to rapid rehousing (see for example, Corinth 2015b), it is not clear that people living in one type of program are more “homeless” than people living in the other type.

In effect, what has occurred between 2007 and 2018 is a large scale substitution of one form of medium term assistance (rapid rehousing) for another form of medium term assistance (transitional housing). There may or may not be merits for preferring rapid rehousing over transitional housing, but the artificial reduction in homelessness caused by this substitution should not be viewed as evidence of success.

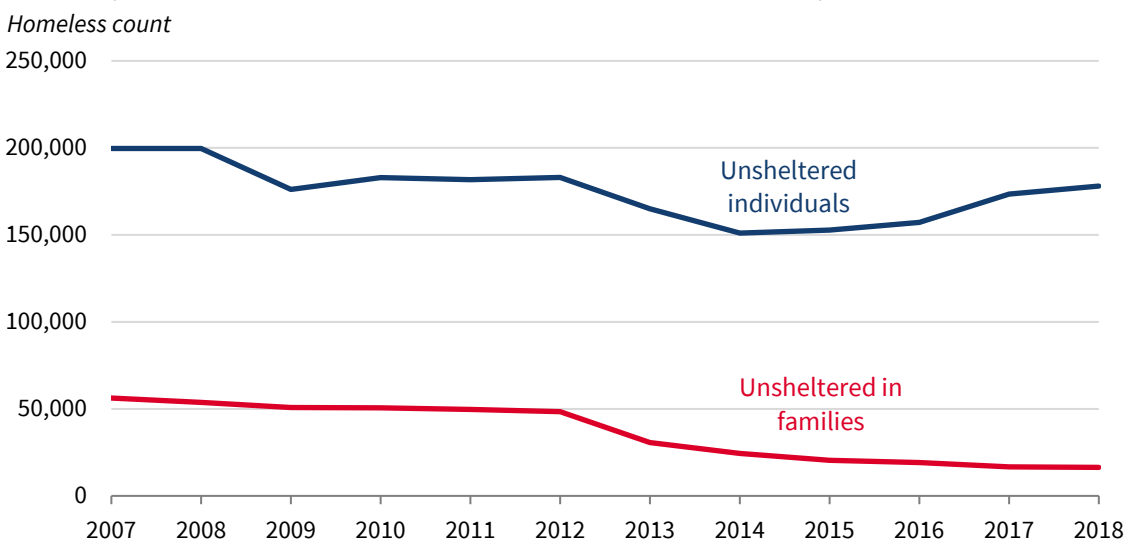
Unsheltered Homeless Counts

The unsheltered homeless count fell by just over 61,000 people between 2007 and 2018, a 24 percent decrease. Over a third of this total reduction (about 22,000 people) occurred between 2007 and 2010. However, the counts between 2007 and 2010 have been regarded as less reliable (O’Flaherty 2019). For two examples, between 2007 and 2009, the number of unsheltered homeless people fell from 13,324 to 262 in Detroit, and fell from 36,420 to 19,193 in Los Angeles.⁹ Together, these two examples amount to a more than 30,000 person decline in unsheltered homelessness between 2007 and 2009, substantially larger than the total United States decrease in reported unsheltered homelessness between 2007 and 2010. However, these drastic reductions are unlikely a result of true reductions in unsheltered homelessness and more likely reflect methodological changes or counting errors. HUD in its annual 2009 homelessness report noted that “significant methodological issues” likely explained these changes (HUD 2010, p. 9).¹⁰

⁹ See Corinth (2015a) for further analysis of the role of miscounting in counts of the unsheltered homeless population.

¹⁰ The count of unsheltered homeless individuals in New Orleans, Louisiana increased from 629 in 2008 to 7,385 in 2009, likely a result of complications in the count arising from Hurricane Katrina (HUD 2010). However, the count fell back to 594 in 2018.

Figure 11. Number of Unsheltered Homeless People in the United States, as Individuals and as Members of Families, 2007–18



Source: U.S. Department of Housing and Urban Development, Point-in-Time Counts, 2007-2018.

Focusing only on 2010 to 2018, there was a reported 39,067 person (17 percent) decrease in unsheltered homelessness. The vast majority (88 percent) of the decrease between 2010 and 2018 is accounted for by unsheltered people in families (figure 11). Unsheltered homelessness among people in families declined by 68 percent (34,222 people). However, it is particularly difficult to find and accurately count unsheltered homeless families, suggesting that caution is needed in interpreting this decline.

In fact, examples of reported reductions in a number of different States suggest that changes in methodology or counting errors could play a major role in the overall reported decline. Between 2010 and 2018, the count of unsheltered homeless people in families fell by the following percentages and numbers of people in the following States (with notable one- or two-year declines in parentheses):

- Louisiana: 96 percent; 648 people (79 percent reduction between 2010 and 2011)
- Wisconsin: 96 percent; 613 people (85 percent reduction between 2010 and 2011)
- Texas: 92 percent; 2,849 people (79 percent reduction between 2012 and 2013)
- Georgia: 91 percent; 2,112 people (50 percent reduction between 2012 and 2013)
- Michigan: 91 percent; 765 people (85 percent reduction between 2014 and 2015)
- Maryland: 90 percent; 2,001 people (66 percent reduction between 2012 and 2013)
- Missouri: 89 percent; 577 people (60 percent reduction between 2013 and 2014)
- Florida: 80 percent; 10,591 people (70 percent reduction between 2013 and 2015)
- Colorado: 70 percent, 2,429 people (92 percent reduction between 2012 and 2013)

The reductions in unsheltered family homelessness from the above examples sum to 22,585 people, 66 percent of the total reduction in unsheltered family homelessness between 2010 and 2018.

Also, it is notable that two States not listed above reported large declines in unsheltered family homelessness between 2010 and 2018. These include California, where unsheltered family homelessness fell by 48 percent (3,773 people), and Oregon, where unsheltered family homelessness fell by 65 percent (3,371 people). Cities in both California and Oregon declared homeless states of emergency during this period, and counts of unsheltered homeless individuals increased in both States (by 32 percent in California and by less than 1 percent in Oregon). It is unclear what factors would have driven such large reductions in counts of unsheltered family homelessness without also removing substantial numbers of individuals from the street.

Of course, these examples are only suggestive that methodological changes or counting errors occurred and may play a large role in the reported decline in unsheltered homelessness among families. Some methodological changes or errors could have increased counts, although the fact that all 17 States with at least 500 unsheltered homeless people in families in 2010 saw a reduction by 2018 suggests that such changes may have tended to reduce counts over time. In addition, even when counts fell by unrealistic amounts, it is possible in reality that they still fell, but by more modest amounts. Thus, it is ultimately unclear to what extent unsheltered homelessness among families fell between 2010 and 2018 (or between 2007 and 2018).

Overall, it is unclear whether unsheltered homelessness has increased or decreased between 2007 and 2018 (or 2010 to 2018). Sheltered homelessness has fallen, but only because communities have swapped time-limited transitional housing (in which people are defined as “homeless”) with time-limited rapid rehousing (in which people are not defined as “homeless”). Otherwise, sheltered homelessness would have increased significantly. Thus, the reduction in overall homeless counts since 2007 (or 2010) should not be taken as evidence that previous Federal policies have been successful in reducing homelessness.

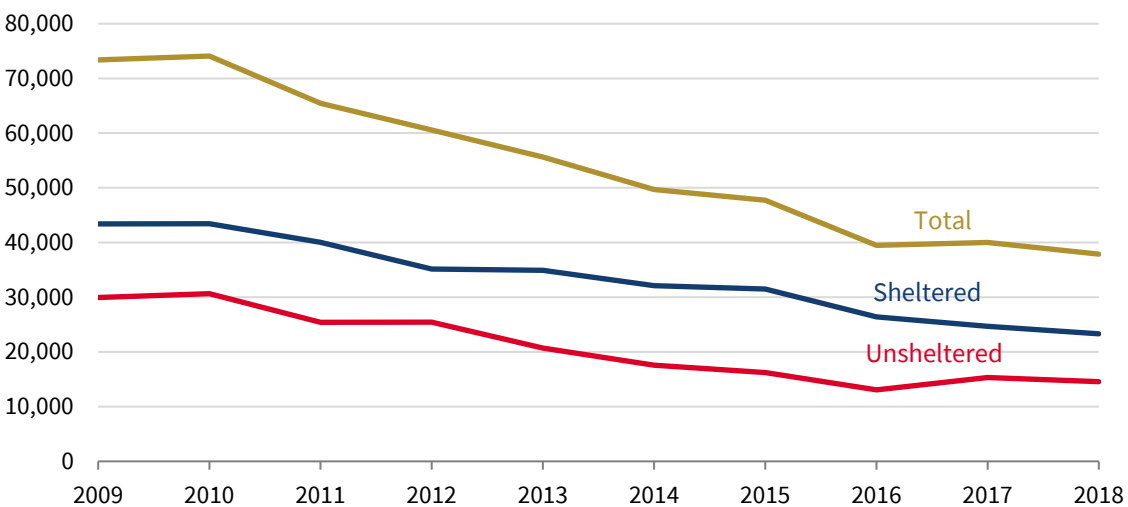
Box 1. Reducing Veteran Homelessness

One exception to the lack of clear progress in reducing homeless populations might be homeless veterans. Figure 12 shows the number of homeless veterans in each year since 2009, the first year in which national counts of homeless veterans are published. Overall homelessness among veterans fell by 48 percent between 2009 and 2018, and by 5 percent between 2017 and 2018. The 37,878 homeless veterans in 2018 marks the lowest total on record. Both sheltered and unsheltered veteran homelessness have fallen substantially since 2009, by 46 percent and 51 percent respectively. Key programs serving homeless veterans include the Supportive Services for Veteran Families program, and

HUD-Veterans Affairs Supportive Housing (VASH) which combines housing assistance from HUD with supportive services from the VA. Evans et al. (2019) find that HUD-VASH has been highly successful in reducing veteran homelessness. Alternatively, O’Flaherty (2019) notes that the large reduction in veteran homelessness could be explained by the falling population of homeless veterans between the ages of 18 and 65 in the general population over this time. Another explanation could be replacement of transitional housing, in which veterans are defined as homeless, with SSVF, in which veterans are not defined as homeless. Since 2014, the first year of available data, the number of veterans living in transitional housing has fallen by 6,260, representing 71 percent of the decline in sheltered veteran homelessness between 2014 and 2018.

Figure 12. Number of Homeless Veterans in the United States by Status, 2009–18

Homeless veterans count



Sources: U.S. Department of Housing and Urban Development, Point-in-Time Counts, 2007-2018.

Trump Administration Actions to Reduce Homelessness

To reverse the failed policies of the past, the Trump Administration is addressing the root causes of homelessness. One of the major factors that increases homelessness is regulation that impedes home construction, which reduces the supply of homes and thus increases homelessness. While housing market regulations are largely set at the local level, the Trump Administration has recognized the importance of these regulations for the health of the economy and Americans’ wellbeing, and taken action to address overly burdensome regulations. On June 25, 2019, President Trump signed an executive order that establishes a White House Council on Eliminating Regulatory Barriers to Affordable Housing. The newly established council includes members from across Federal agencies, and is tasked with identifying regulatory barriers to building housing along with actions to address these barriers.

Another important factor that increases homelessness is the tolerability of sleeping on the street, which among other factors may be affected through policing of street activities. The administration has through a series of executive orders consistently supported the police. As potential evidence of better supported police, the violent crime rate fell slightly (by just under 1 percent) in 2017 after increasing by 7 percent between 2014 and 2016. According to preliminary data (based on the first 6 months of 2018), violent crime in 2018 fell by 4.3 percent. More research is needed to understand how different policing policies affect the outcomes of homeless people—including their ultimate destinations, mental health, drug use, employment and other dimensions of wellbeing—as well as outcomes for non-homeless people.

Individual demand factors that increase homelessness are being addressed as well. The President's policies to reduce the supply of illicit drugs entering the United States, prevent new people from becoming addicted by ensuring proper use of prescription drugs, and provide treatment to those with substance use disorders have been successful in reducing drug overdose deaths. According to preliminary 2018 data, drug overdose deaths fell for the first time in decades, after increasing by 21 percent in 2016 and by 10 percent in 2017. President Trump has also worked to reform incarceration policies and support people exiting prison by signing the First Step Act on December 21, 2018. And President Trump appointed the first ever assistant secretary for substance abuse and mental health services in HHS, in conjunction with a prioritization of people with severe mental illness. Finally, strong economic growth, historically low unemployment rates, and reductions in poverty have increased the incomes of people at the bottom of the distribution and can reduce their likelihood of falling into homelessness.

In addition to addressing the root problems of homelessness, including both community-level and individual-level factors, homeless assistance programs can potentially reduce homelessness as well. While Federal policies over the past decade have dramatically shifted the program landscape, the evidence does not necessarily indicate that this approach has more successfully reduced homeless populations. The Trump administration has sought to improve on these results by reforming the Housing First approach in the major HUD homeless assistance program that provides competitive funding to CoCs. While the program maintains a commitment to providing housing with no preconditions to program participants, the latest 2019 Notice of Funding Availability allows communities flexibility to impose service participation requirements for participants after they have been stabilized in housing. This reform will allow for greater local flexibility and innovation to drive successful outcomes for vulnerable homeless individuals. Moreover, to the extent that better results for homeless individuals allow them to more quickly transition to private housing, homeless assistance programs can be more quickly freed up to serve homeless people still living on the street. In conjunction with this reform, HUD has also strengthened its emphasis on self-sufficiency as a

key component of homeless assistance programs. Increasing employment and income of homeless individuals can reduce durations of homelessness and increase stabilization in housing after exiting homelessness. These reforms may more successfully reduce homelessness and address the underlying problems that people experiencing homelessness face.

References

- Berk, R., and J. MacDonald. 2010. "Policing the homeless: An evaluation of efforts to reduce homeless-related crime." *Criminology and Public Policy* 9, no. 4: 813–40.
- Bohanon, C. 1991. "The economic correlates of homelessness in sixty cities." *Social Science Quarterly* 72, no. 4: 817–25.
- Burt, M. R., L.Y. Aron, T. Douglas, J. Valente, E. Lee, and B. Iwen. 1999. "Homelessness: Programs and the people they serve: Summary report: Findings of the National Survey of Homeless Assistance Providers and Clients." *Urban Institute*.
- Byrne, T., E.A. Munley, J.D. Fargo, A.E. Montgomery, and D.P. Culhane. 2013. "New perspectives on community-level determinants of homelessness." *Journal of Urban Affairs* 35, no. 5: 607–25.
- . 2014. "The relationship between community investment in permanent supportive housing and chronic homelessness." *Social Service Review* 88, no. 2: 234–63.
- Collinson, R., and D. Reed. 2019. "The effects of evictions on low-income households." Working paper. https://robcollinson.github.io/RobWebsite/jmp_rcollinson.pdf.
- Corinth, K. 2015a. "Street homelessness: A disappearing act?" *AEI Economic Perspectives* <http://www.aei.org/publication/street-homelessness-a-disappearing-act/>.
- . 2015b. "What should we do about homeless families? Comments on the Family Options Study." *AEI Economic Perspectives* www.aei.org/publication/what-should-we-do-about-homeless-families-comments-on-the-family-options-study/.
- . 2017. "The impact of permanent supportive housing on homeless populations." *Journal of Housing Economics* 35: 69–84.
- Corinth, K., and C. Rossi-de Vries. 2018. "Social ties and the incidence of homelessness." *Housing Policy Debate* 28, no. 4: 592–608.
- Corinth, K., and D.S. Lucas. 2018. "When warm and cold don't mix: The implications of climate for the determinants of homelessness." *Journal of Housing Economics* 41: 45–56.
- Cragg, M., and B. O'Flaherty. 1999. "Do homeless shelter conditions determine shelter population? The case of the Dinkins deluge." *Journal of Urban Economics* 46, no. 3: 377–415.

- Early, D. W., and E.O. Olsen. 2002. "Subsidized housing, emergency shelters, and homelessness: An empirical investigation using data from the 1990 Census." *B.E. Journal of Economic Analysis and Policy* 2, no. 1.
- Evans, W. N., D.C. Phillips, and K. Ruffini, K. 2019. "Reducing and preventing homelessness: A review of the evidence and charting a research agenda." *Abdul Latif Jameel Poverty Action Lab*.
<https://www.povertyactionlab.org/sites/default/files/publications/reducing-preventing-homelessness-review-research-agenda.pdf>.
- Evans, W. N., J.X. Sullivan, and M. Wallskog. 2016. "The impact of homelessness prevention programs on homelessness." *Science* 353, no. 6300: 694–99.
- Evans, W. N., S. Kroeger, C. Palmer, and E. Pohl. 2019. "Housing and Urban Development-Veterans Affairs Supportive Housing Vouchers and Veterans' Homelessness: 2007-2017." *American Journal of Public Health* 109, no. 10: 1440–45.
- Glaeser, E., and B.A. Ward. 2009. "The causes and consequences of land use regulation: Evidence from greater Boston." *Journal of Urban Economics* 65, no. 3: 265–78.
- Glaeser, E., and J. Gyourko, J. 2018. "The economic implications of housing supply." *Journal of Economic Perspectives* 32, no. 1: 3–30.
- Glynn, C., T.H. Byrne, and D.P. Culhane. 2018. "Inflection points in community-level homeless rates." Working paper.
http://files.zillowstatic.com/research/public/StaticFiles/Homelessness/Inflection_Points.pdf.
- Goering, P., S. Veldhuizen, A. Watson, C. Adair, B. Kopp, E. Latimer, G. Nelson, E. Macnaughton, D. Streiner, and T. Aubry. 2014. "National at home/chez soi final report." *Mental Health Commission of Canada*.
- Goodman, J. 2004. "Determinants of operating costs of multifamily rental housing." *Journal of Housing Economics* 13, no. 3: 226–44.
- Goodman, S., P. Messeri, and B. O'Flaherty. 2017. "Homelessness prevention in New York City: On average, it works." *Journal of Housing Economics* 31: 14–34.
- Gubits, D., M. Shinn, M. Wood, S. Bell, S. Dastrup, C.D. Solari, S.R. Brown, D. McInnis, T. McCall, U. Kattel, Abt Associates Inc., and Vanderbilt University. 2016. "Family options study: 3-year impacts of housing and services interventions for homeless families." *U.S. Department of Housing and Urban Development*.

- Gyourko, J., and R. Molloy. 2015. "Regulation and housing supply." *Handbook of Regional and Urban Economics*.
- Hanratty, M. 2017. "Do local economic conditions affect homelessness? Impact of area housing market factors, unemployment, and poverty on community homelessness rates." *Housing Policy Debate* 27, no. 4: 640–55.
- Honig, M., and R.K. Filer. 1993. "Causes of intercity variation in homelessness." *American Economic Review* 83, no. 1: 248–55.
- Humphries, J. E., N.S. Mader, D.I. Tannenbaum, W.L. van Dijk. 2019. "Does eviction cause poverty? Quasi-experimental evidence from Cook County, IL." *NBER working paper*. Available at <https://www.nber.org/papers/w26139>.
- Kertesz, S. G., and G. Johnson. 2017. "Housing First: Lessons from the United States and Challenges for Australia." *Australian Economic Review* 50, no. 2: 220–28
- Lucas, D. S. 2017. "The impact of federal homelessness funding on homelessness." *Southern Economic Journal* 84, no. 2: 548–76.
- Ly, A., and E. Latimer. 2015. "Housing first impact on costs and associated costs offsets: A review of the literature." *Canadian Journal of Psychiatry* 60, no. 11: 475–87.
- Main, T. J. 2016. *Homelessness in New York City*. New York University Press. New York.
- Metraux, S., and D.P. Culhane. 2006. "Recent incarceration history among a sheltered homeless population." *Crime and Delinquency* 52, no. 3: 504–17.
- Moulton, S. 2013. "Does increased funding for homeless programs reduce chronic homelessness?" *Southern Economic Journal* 79, no. 3: 600–20.
- National Academies of Sciences, Engineering and Medicine. 2018. *Permanent Supportive Housing: Evaluating the Evidence for Improving Health Outcomes Among People Experiencing Chronic Homelessness*. Washington, DC: The National Academies Press.
- O’Flaherty, B. 1996. *Making room: The economics of homelessness*. Harvard University Press. Cambridge.
- . 2003a. "Commentary." *FRBNY Economic Policy Review*. <https://www.newyorkfed.org/medialibrary/media/research/epr/03v09n2/0306ofla.pdf>
- . 2003b. "Need and generosity: How markets for free goods equilibrate." *Journal of Urban Economics* 54, no. 1: 157–72.

- . 2004. “Wrong person and wrong place: for homelessness, the conjunction is what matters.” *Journal of Housing Economics* 13, no. 1: 1–15.
- . 2010. “Homelessness as bad luck: Implications for research and policy.” In *How to house the homeless*, edited by Ellen, I. G., and O’Flaherty, B. Russell Sage Foundation. New York.
- . 2019. “Homelessness research: A guide for economists (and friends).” *Journal of Housing Economics* 44: 1–25.
- O’Flaherty, B., and T. Wu. 2006. “Fewer subsidized exits and a recession: How New York City’s family homeless shelter population became immense.” *Journal of Housing Economics* 15, no. 2: 99–125.
- Popov, I. 2017. “Homeless programs and social insurance.” Working paper. https://www.igor-popov.com/uploads/8/7/4/8/87480912/popov_homelessprograms.pdf.
- Quigley, J. M., and S. Raphael. 2005. “Regulation and the high cost of housing in California.” *American Economic Review* 95, no. 2: 323–28.
- Quigley, J. M., S. Raphael, S., and E. Smolensky. 2001. “Homeless in America, Homeless in California.” *Review of Economics and Statistics* 83, no. 1: 37–51.
- Quigley, J. M., and L.A. Rosenthal. 2005. “The effects of land use regulation on the price of housing: What do we know? What can we learn?” *Cityscape* 8, no. 1: 69–137.
- Raphael, S. 2010. “Housing market regulation and homelessness.” In *How to house the homeless*, edited by Ellen, I. G., and O’Flaherty, B. Russell Sage Foundation. New York.
- Rolston, H., J. Geyer, G. Locke, and Abt Associates. 2013. “Final report: Evaluation of the Homebase Community Prevention program.” *Department of Homeless Services: New York*.
- Roncarati, J. S., T.P. Baggett, J.J. O’Connell, S.W. Hwang, E.F. Cook, N. Krieger, and G. Sorenson. 2018. “Mortality among unsheltered homeless adults in Boston, Massachusetts, 2000-2009.” *JAMA Internal Medicine* 178, no. 9: 1242–48.
- Rossi, P. H. 1989. *Down and out in America: The origins of homelessness*. University of Chicago Press. Chicago.
- Saiz, A. 2010. “The geographic determinants of housing supply.” *Quarterly Journal of Economics* 125, no. 3: 125–96.

- U.S. Department of Housing and Urban Development (HUD). 2010. “The 2009 Annual Homeless Assessment Report.”
<https://www.huduser.gov/publications/pdf/5thHomelessAssessmentReport.pdf>.
- . 2018a. “The 2017 Annual Homeless Assessment Report (AHAR) to Congress: Part 2: Estimates of Homelessness in the United States.”
<https://files.hudexchange.info/resources/documents/2017-AHAR-Part-2.pdf>.
- . 2018b. “The 2018 Annual Homeless Assessment Report (AHAR) to Congress: Part 1: Point-in-time estimates of homelessness.”
<https://files.hudexchange.info/resources/documents/2018-AHAR-Part-1.pdf>.



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