

RESEARCH REPORT

Low-Rise Infill Housing in Los Angeles

Can SB 9 Meet the City's Housing Needs?

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May 2022 (corrected May 23, 2022)





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Acknowledgments

This report was funded by the Irvine Community Trust, Citi, NeighborWorks® America, and the California Community Trust. We are grateful to them and to all our funders, who make it possible for Urban to advance its mission.

The views expressed are those of the authors and should not be attributed to the Urban Institute, the City of Los Angeles, Neighborhood Housing Services of Los Angeles County, their trustees, or their funders. Neither funders nor partners determine research findings or the insights and recommendations of Urban experts. Further information on the Urban Institute's funding principles is available at urban.org/fundingprinciples.

The Urban Institute's research for this report was undertaken at the request of the administration of Los Angeles mayor Eric Garcetti. Neighborhood Housing Services of Los Angeles County acted as a local partner to the research project.

We would like to acknowledge our colleagues at the Urban Institute who provided critical support and feedback through the entire research project. We would especially like to recognize and thank the many experts, public servants, and community workers who generously gave their time and knowledge in interviews, publications, and meetings. The authors would especially like to thank the Office of the Los Angeles Mayor for its ongoing commitment to an independent and evidence-driven inquiry. In particular, Dan Caroselli's encouragement, curiosity, and critical review were a tremendous asset to the authors.

A list of our internal and external sources is available in appendix B. We apologize for any omissions and will correct future versions of this report.

V ACKNOWLEDGMENTS

Executive Summary

On January 1, 2022, the California Housing Opportunity and More Efficiency Act (i.e., Senate Bill 9 or SB 9) went into effect. Property owners in single-family neighborhoods now have the right to add a duplex to their property or split their lot. Previous legislation permitted owners to create an accessory dwelling unit or junior accessory dwelling unit as of right, with a maximum of four units on an existing single-family parcel. Owners with sufficient land could split the lot through a ministerial process, rather than obtaining a separate local approval, and then own up to two units on each lot. The new legislation was energetically debated, with advocates staking out extreme positions along not-in-my-backyard versus yes-in-my-backyard lines. This report explores whether these changes will be groundbreaking or gradual and how the City of Los Angeles can best implement the law to amplify its benefits while mitigating negative consequences for owners, residents, neighborhoods, and the city as a whole.

We reviewed extensive literature and spoke with local and national experts on accessory dwelling units and two-to-four-unit buildings (or, collectively, low-rise infill housing). Chapter 1 of this report provides an overview of housing need in Los Angeles and scans the policy issues raised by SB 9 and prior laws. In chapter 2, we review the experiences of jurisdictions that have implemented similar legislation, providing lessons for California and Los Angeles. Chapter 3 provides an in-depth view of where low-rise infill housing exists now in Los Angeles, focusing on the racial, ethnic, and economic landscape that SB 9 will build upon. Chapter 4 looks at barriers to financing for owners and homebuyers, showing that zoning changes alone are not sufficient for SB 9 to increase the housing supply. Although each section includes analysis and recommendations, chapter 5 pulls out overarching recommendations and takeaways for policymakers.

Insights and Recommendations

- Los Angeles faces a major housing shortage, which is an underlying reason for high housing
 costs, overcrowding, and extremely old buildings. The consequences of this shortage are
 particularly challenging for people of color and low-income households. The city needs to be
 clear in its goals, track goals against the impact of the changes, and communicate results
 consistently to stakeholders.
- 2. Learn from other jurisdictions, especially those that have created a robust ecosystem for homeowners, homebuyers, renters, small contractors, and developers and have created a favorable regulatory environment. Create an explicit and detailed racial equity plan.

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- 3. Empower residents through listening, communication, and awareness. Create user-friendly and accessible virtual hubs for owners, homebuyers, small landlords, and renters.
- 4. Understand the existing housing landscape, especially the housing stock located within and excluded from single-family zones. Improve data collection, analysis, and dissemination, especially regarding completed accessory dwelling units and lot splits. Because of historically racist land-use decisions, future building may exacerbate racial segregation, inequality, and wealth disparity. Regulation and enforcement must intervene to prevent gentrification and displacement.
- 5. Financing for the construction and purchase of these homes is markedly less accessible for low-income households. Although everyone in Los Angeles will benefit from more housing, public-private partnerships and government subsidies will be necessary to allow low-income people and communities to benefit from the new housing opportunities.

Taken together, these findings and recommendations indicate that even though SB 9 brings an important and welcome avenue to expand the housing supply, it may not produce sufficient opportunities to improve affordability and racial equity without additional public and private intervention.

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Errata

This report was corrected May 23, 2022. A previous version listed Helen Leung's affiliation incorrectly in appendix B.

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1. Introduction

The City of Los Angeles faces a severe housing shortage, leading to overcrowding, lack of affordability and an aging housing stock. According to the city's Housing Element of the General Plan, which the city council adopted in November 2021, "the City's residents experience the highest rates of housing cost burdens and overcrowding in the nation, one of the lowest homeownership rates, and the rapid loss of existing lower-rent housing. These trends are being compounded by demographic and employment factors such as rapid aging of the population, the continued prevalence of poverty, and low-wage employment" (City of Los Angeles 2021).

One part of the solution to the city's housing challenges is to allow additional housing to be built in single-family districts, a solution that could increase the housing supply and bring other important benefits. The state took an important step toward this goal in 2019 with legislation encouraging the construction of accessory dwelling units (ADUs) in most single-family zones, permitting lot splits to build more housing on large single-family lots, and permitting duplexes (two-unit housing) in single-family zones. With the most recent law, SB 9,¹ going into effect on January 1, 2022, owners are now allowed to split their single-family properties into two lots, each of which could contain a duplex, with some limitations—following the path of Portland, Oregon (which permits up to four-to-six-unit houses) and Minneapolis, Minnesota (which permits three-unit houses).

This report analyzes the need for, and benefits and costs associated with, proposals to expand the availability of low-rise infill housing in Los Angeles. We recommend policies at the local, state, and federal levels to encourage greater housing affordability and ownership accessibility, sustainability, racial equity, and stability for the city's residents, especially those with low incomes. This report responds to the city's Housing Element, especially program 59, Low-Rise Infill Housing Research and Design Initiative.

Methodology and Contents

We spoke with more than 50 stakeholders representing elected officials, members of the mayor's office, lenders, real estate developers, nonprofit organizations, community representatives, and academics (a list of these stakeholders is available in appendix B). We also analyzed data from multiple sources, including Los Angeles County, the City of Los Angeles, the American Community Survey, the Home

Mortgage Disclosure Act, historic Home Owners' Loan Corporation (HOLC) records, the University of Southern California's Sol Price School of Public Policy, First American, and proprietary sources.

We also reviewed nearly 100 scholarly, professional, and popular articles about low-density infill housing. The University of California, Berkeley's Terner Center for Housing Innovation is a particularly active research center on ADUs. The University of Southern California's Sol Price School and the University of California, Los Angeles, Lewis Center for Regional Policy Studies have also made substantial contributions.

This report synthesizes research on low-rise infill housing and adds original research and analysis to address gaps in the literature, especially around supply patterns and financing barriers. Chapter 1 presents an overview of housing context and need in Los Angeles, a summary of recent legislative changes, and a review of policy benefits and challenges associated with stimulating low-rise infill development. Chapter 2 reviews policy changes in select cities that provide instructive examples for policymakers in Los Angeles. Chapter 3 presents findings from our research into the existing supply of ADUs and two-to-four-unit homes in Los Angeles, noting that the location and distribution of low-rise infill housing before SB 9 went into effect is highly imbalanced. Chapter 3 then suggests areas lawmakers can consider for addressing supply barriers while mitigating possible negative externalities associated with increased supply. Chapter 4 explores research findings into the financing of ADUs and two-to-four-unit homes in Los Angeles by existing owners, developers, and purchasers of new housing. Chapter 4 also documents substantial financing barriers to building and buying new housing, even if land-use regulations are relaxed. Each chapter includes policy recommendations that are also gathered in chapter 5.

Housing Need in Los Angeles

Los Angeles faces a severe housing shortage. The State of California requires each jurisdiction to update its Regional Housing Needs Assessment every eight years to forecast and accommodate anticipated growth in demand at different income levels. For the 2021–29 Housing Element, the city must plan for five times as many additional units as forecast in the previous general plan, or 456,643 units by 2029. Of these units, 40 percent, or 184,721 units, must be affordable to low-income households (earning less than 80 percent of the area median income) and very low-income households (earning less than 50 percent of the area median income). For context, Los Angeles has 1.5 million housing units, according to the 2020 Census. The Housing Element goal requires the city to add 57,000 new homes annually between 2021 and 2029, a fivefold increase from the city's current rate of housing production.²

Such ambitious goals are necessary, given the scale of the housing challenges. In Los Angeles, 59.2 percent of renter households pay more than 30 percent of their income toward housing costs, a higher percentage than in any other major American city (City of Los Angeles 2021, chapter 1). Figure 1 breaks out housing cost burdens by tenure, race, and ethnicity. According to four independent studies assembled by Freddie Mac, residents of the Los Angeles metropolitan statistical area live in the country's third-most-rent-burdened metropolitan area, behind Miami and San Diego (Freddie Mac Multifamily 2019).

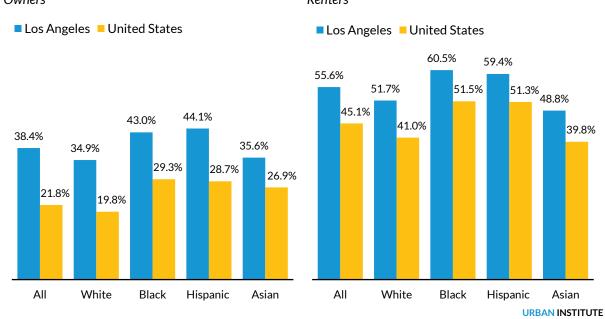
More than 60 percent of the city's housing stock is over 50 years old, leading to high maintenance costs, health risks, and structural issues. Thirteen percent of Los Angeles households are overcrowded (having more than one person per room), compared with 3 percent of US households, contributing to health and infrastructure pressures, such as greater risk of infection from COVID-19 (figure 2).

FIGURE 1

Cost Burden among Owners and Renters in Los Angeles and the United States

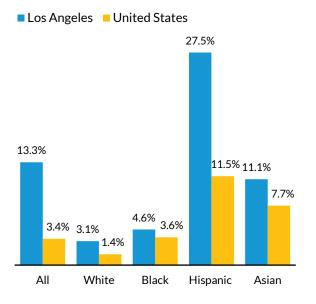
Owners

Renters



 $\textbf{Source:}\ 2015\text{--}19\ American\ Community\ Survey}.$

FIGURE 2
Overcrowding Rates in Los Angeles and the United States



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Source: 2015-19 American Community Survey.

Low-income families and families of color feel the pain of the housing shortage most keenly. According to 2015–19 American Community Survey data, 43 percent of Black homeowners and 44 percent of Hispanic homeowners in Los Angeles are burdened by excessive housing costs, compared with 38 percent of white Los Angeles households and 29 percent of Americans as a whole. Renters are even more affected, with 60 percent of Black and Hispanic renters in Los Angeles experiencing housing cost burdens compared with 51 percent of white Los Angeles renters and 45 percent of Americans as a whole. More than one in four Hispanic households in Los Angeles experience overcrowding, double the rate of the city as a whole and three times the national rate for Hispanic households. Among low-income households, nearly 85 percent of renters and 75 percent of homeowners are cost burdened.

The consequences of the housing shortage go beyond affordability, age of housing, and overcrowding. The city's Housing Element noted the following areas of mismatch between housing need and available stock (City of Los Angeles 2021, chapter 1):

- The city's population has grown rapidly, but the housing supply has not, especially at levels lowincome households can afford.
- The number of adults older than 60 is increasing rapidly, and the number of residents younger than 19 is declining.

- Forty percent of all households consist of nonfamily members.
- The share of Los Angeles residents younger than 45 who own a home dropped by 25 percent in the past decade, but the share of renters did not increase, indicating that "most young people cannot afford to create a household in the City and may be more likely to migrate out to other cities or states, or to live with parents or family. These changes affecting younger residents are largely due to housing cost and availability" (City of Los Angeles 2021, 62).
- The past decade witnessed the loss of 5,000 owner-occupied single-family units and a simultaneous increase of more than 10,000 renter-occupied single-family units.

Housing needs in Los Angeles reflect long-standing racial and economic inequities (City of Los Angeles 2021, chapter 1). The national homeownership rate (64 percent) is substantially higher than the rate for Los Angeles (36 percent), where only 29 percent of Black and Hispanic households and 37.4 percent of Asian households are homeowners, compared with 47 percent of white households. These low homeownership rates restrict access to the most common source of wealth for Americans and the most important source of wealth for low-income people and people of color. Regarding race and ethnicity, the number of Black homeowners decreased by 11 percent from 2010 to 2019, while the number of Asian homeowners increased by 14 percent and the number of Hispanic homeowners increased by 4 percent. The number of white homeowners fell by about 1 percent, while the number of white renters increased by 14 percent.

Notably, housing in Los Angeles consumes more land per house than in other metropolitan areas. The city estimates that 75 percent of Los Angeles's land area available for housing is zoned for single-family homes.⁴ Regardless of zoning, more than 400,000 residential lots in Los Angeles contain a lone single-family home.⁵

In conclusion, Los Angeles residents live in poorer housing conditions, and pay more for their housing, than people in many other parts of the country largely because of inadequate supply. But they do not have to. Los Angeles can accommodate more people and more housing. According to McKinsey Global Institute, current zoning allows for 1.5 million to 1.9 million additional housing units on highly underused residential parcels (Woetzel et al. 2019). This capacity may be misleading. Woetzel and coauthors (2019, 3) note, "This theoretical potential, which does not include redevelopment of underutilized commercial land, is far beyond what Los Angeles would realistically build in the near future. But the existence of this much capacity indicates that communities have a wide range of choices available to add new housing while maintaining their existing character." A nuanced Terner Center study found, when looking at both financial and zoning feasibility under SB 9 (before final adoption), the

new legislation could enable 127,000 market-feasible new units in Los Angeles County (Metcalf et al. 2021). Land-use regulations alone do not account for the housing shortage in Los Angeles.

Challenges Associated with Single-Family Housing

The preponderance of single-family homes in Los Angeles creates additional challenges. Single-family housing is generally an inflexible housing type; it is difficult to expand or contract as household composition changes during life cycle events, such as births, marriages or partnerships, older children forming independent households, and deaths. Household composition can also change with the need to accommodate an aging or ill family member, a caregiver, or a boarder.

The aging population in Los Angeles creates the need for housing that can accommodate various disabilities and risk factors common to aging. The single-family stock does not adjust easily to these changes, and as a result, the city has underoccupancy (older adults, for example, who become house rich but cash poor), inappropriate occupancy (seniors at risk of tripping hazards, for example, or lack of available affordable housing for young households), and overcrowding.

The large number of single-family homes is also an inefficient use of land. One study found that doubling population-weighted urban density reduces carbon dioxide emissions from household travel and residential energy use by 48 percent and 35 percent, respectively (CSS 2021). Allowing more homes in areas currently occupied by single-family housing will reduce the per capita cost of utility connections and make power and water delivery more efficient. Single-family zoning precludes low-income households from living near employment and high-opportunity neighborhoods. Denser housing can also mitigate risk from wildfires, reduce commute times, and make better use of the public transit infrastructure.

According to a recent University of California, Berkeley, study, Los Angeles is the country's sixth-most-residentially-segregated metropolitan area for jurisdictions with populations greater than 200,000.8 The study also found that key outcomes for residents in segregated communities—including income, home values, and life expectancy—remain worse than those in more integrated areas. Residential segregation in Los Angeles corresponds to its zoning districts. The areas zoned for single-family housing in Los Angeles closely resemble the original HOLC maps from the 1930s, which established "redlined" areas the federal government later used to guide loan decisions. Race was an explicit factor that distinguished redlined areas, in which lending was discouraged or prohibited, from blue- and greenlined areas.

Similarly, government officials at the federal, state, and local levels encouraged zoning laws that excluded apartment buildings, low-rise infill housing, and households of color from wealthier, whiter neighborhoods (Rothstein 2017). Fifty years ago, according to the *New York Times*, Los Angeles was zoned for 10 million people; subsequent zoning amendments reduced the capacity to 4.3 million people by 2010. ¹⁰ As a result, historical disparities in access to capital and to housing are still felt in areas with a greater concentration of high-density housing stock and households of color.

These exclusionary and racist land-use policies have led to disparities in housing opportunity by income, race, and ethnicity. According to the city's Housing Element, "Considering all land zoned for residential uses, approximately 76% of residential parcels in High and Highest Resource Areas ¹¹ are limited to single-family uses and approximately 20% are zoned to allow multi-family housing. In contrast, just 18% of the residentially zoned land in the areas considered High Segregation and Poverty is allocated to single family uses, whereas over 80% allows multi-family development" (City of Los Angeles 2021, 111).

In sum, Los Angeles lacks housing options that can respond to residents' needs: physically, geographically, racially, socially, and economically.

More Housing Flexibility through Low-Rise Infill Housing

In recent years, California legislators and policymakers have considered several possible solutions to the housing shortage, such as permitting ADUs, duplexes, triplexes, and fourplexes in single-family neighborhoods and making lot splits easier administratively to permit additional units on parcels that may be large enough for more than one home. This kind of so-called missing middle, gentle-density, or low-rise infill housing would give property owners options to make better use of their existing land and realize value from underbuilt property that currently contains one single-family home (Parolek 2020).

Low-rise infill housing embraces a wide range of housing options and types.

Physically, low-rise infill housing includes housing that allows for more than one household on land currently occupied by a single-family home. There are many ways to produce low-rise infill housing. The permutations of ADUs, JADUs (junior accessory dwelling units), and two-family homes are numerous, but each combination must adhere to setback, lot size, and applicable parking requirements.¹²

Owners can subdivide the existing home to create an internal independent dwelling unit, often in a basement, over a garage, or via an addition (these are JADUs). Or owners can build a small, separate

outbuilding on the existing lot (or external ADUs). Finally, owners can build a separate duplex on the existing lot.

The option to subdivide the lot creates even more possibilities. The owner can subdivide the lot and build a small, separate outbuilding on a lot subdivided from the existing lot. This is a new single-family home, resulting in two homes that are now on two lots. Or the owner can build a larger, separate duplex on subdivided lots.

Under SB 9, each lot may contain two units by right (one freestanding unit and one ADU and one JADU, or a duplex on each lot), so an existing single-family lot, if subdivided, could by right contain four units. But limitations in lot sizes, setbacks, and parking may apply, which will likely limit the bulk that can be created. Each unit must have a parking space unless it is near mass transit.

The City of Los Angeles recently completed a design challenge, showing a wide variety of ways to add more units to an existing lot.¹³

Legally, low-rise infill housing can take many forms:

- Fee simple ownership, where each additional unit is sold to separate households free and clear of any encumbrances. The original lot must be split to allow for future fee simple ownership.
- Rental units, where the owner occupies the original or one of the new units and rents the remaining units via lease. Lot splits are not required for the rental option.
- Shared ownership, such as a condominium, cooperative, or tenancy in common, where more than one household shares ownership of the new structure.
- Limited equity ownership, such as community land trusts, where the residents own the building subject to income and other restrictions, and a land trust or community entity owns the underlying land.

What We Know about Low-Rise Infill Housing

Researchers at the Terner Center recently surveyed California ADU owners and tenants (Chapple, Ganetsos, and Lopez 2021) and noted these key findings:

 The average construction cost of an ADU in California is much lower than the cost for a newly constructed single-family home.

- Half of ADUs in California are income-generating rental units, while another 16 percent are used by a relative for no-cost housing. Only 8 percent of California ADUs are used for shortterm rentals.
- Owners of ADUs are more affluent and are more likely to be white.
- Forty percent of ADU occupants do not have a car.

Benefits to Low-Rise Infill Housing

The debate over legislation to permit low-rise infill housing in single-family zones has been heated. We reviewed existing research and original data to shed light on the assumptions underlying the pros and cons. Proponents of policies to increase low-rise infill housing say the new housing will

- increase the housing supply in Los Angeles;
- provide greater choice of housing types for changing household needs;
- provide an opportunity to increase racial diversity and choice in neighborhoods;
- be a solution for seniors who may need on-site caregivers or companionship or be a source of additional income through renting out excess space;
- possibly increase and realize the value of existing homes by adding living space that can be sold or rented:
- address safety and health issues, (e.g., COVID-19, asthma, or physical disabilities) and improve mental health;
- be an opportunity to provide new energy-efficient housing that can reduce utility costs and minimize the carbon footprint;
- adapt the home to remote work situations and health practices to minimize COVID-19 transmission;
- be a more efficient use of existing infrastructure, including water, power, schools, and health facilities; and
- produce the economic benefits that come from housing construction and home repair for neighbors, the employment base, the immediate neighborhood, and the local and regional economy.

Some benefits are less obvious. One is the trend of small home repair and renovation contractors—many of whom are immigrants or workers of color in the Los Angeles market—to expand into the ADU design and construction line of business. This local economic development benefit, which could be an equitable economic development strategy in certain markets, is a strong example of the various constituencies that stand to benefit but may not be part of current policy debates.

Objections to Low-Rise Infill Housing

During the debate over SB 9 (both before and after its adoption), policymakers, constituents, and other stakeholders in Los Angeles have voiced concerns, including

- increased risk of gentrification, displacement, and housing instability in low-income neighborhoods;
- the new housing will be unaffordable;
- increased investor ownership rather than owner occupancy;
- opportunities for stripping equity and scamming homeowners;
- exacerbated racial inequities;
- pressure from new residents on existing infrastructure, including schools, utilities, and parking;
- public funding or programs to support this housing would come only at the expense of other scarce funding;
- changes to neighborhood character;
- loss of green space and vegetation; and
- loss of local and community control over land use and the resulting sense that community
 planning is no longer relevant as a policy lever or has no value as a consensus-building exercise.

Some avid proponents of higher density categorize these arguments as superficial or invalid not-in-my-backyard objections. This report looks for evidence to support or refute the claims and finds that some consequences of low-rise infill housing can and should be mitigated by additional government guidelines or investment. For example, earlier Urban Institute research found that low-rise infill housing is unlikely to be correlated with rising housing costs in high-income neighborhoods but may accompany rising rents in low-income neighborhoods. ¹⁴ Los Angeles has protections against involuntary

displacement both in SB 9 and in local ordinances, and the city is exploring more protections as expressed in the Housing Element (City of Los Angeles 2021, chapter 6).¹⁵

Some critics' concerns underly how broad housing policy goals in a specific market can be in tension with each other, depending on how programs and funding to support them are designed. Competing priorities include

- increasing the total housing supply versus increasing homeownership or affordable housing,
- helping families (including extended families or multigenerational households) find space for their evolving needs versus creating household wealth-building opportunities with new units that generate revenue, and
- protecting against potential equity theft and displacement versus letting the market find the highest and best use that raises property values and helps homeowners build wealth.

Every policy intervention presents trade-offs compared with the status quo, but as the debate has reached a heightened pitch, some of these legitimate (and inevitable but solvable) tensions have been boiled down to false choices, illustrated by such extreme framing as you are either in favor of Wall Street in your backyard, or you oppose solving homelessness.

The History of Low-Rise Infill Housing Policy in Los Angeles

Los Angeles has experimented with strategies and initiatives to expand ADUs as part of its broader efforts to address the city's and the region's affordable housing crisis. ¹⁶ Policy shifts began as early as 2003, when the State of California, with Assembly Bill 1866, set statewide standards to encourage local governments to loosen local land-use requirements on ADUs. The general consensus is that the state law by itself did little to advance and expand ADUs in Los Angeles.

Through the cityLAB think tank, professors and students in the University of California, Los Angeles's Department of Architecture spent seven years (from 2007 to 2014) investigating the planning, design, and policy dimensions of how the city could advance and expand low-density housing types such as ADUs. Teach report and project identified intriguing ways to modify existing zoning and land development processes, engage the design and development communities, and address neighborhood concerns. This early work set the stage for Los Angeles to leverage changes to state law in 2016 and 2017 that, for the first time, required cities to streamline local ADU regulations (e.g., local government had to approve ADUs by right instead of through discretionary reviews, it must allow one ADU per single-family home, and it could no longer require off-street parking). The could be could no longer require off-street parking).

Before the statewide changes in 2017, the City of Los Angeles issued between 100 and 200 ADU permits per year, but it issued 2,326 in 2017 and 4,171 in 2018, accounting for 20 percent of all building permits issued in the city. ¹⁹ In support of these changes, cityLAB issued its 2017 ADU Guidebook to help homeowners weigh the potential benefits, counter the expansion of McMansion residential infill, and outline (with diagrams and visualizations) the considerations and specifications of which properties could accommodate ADUs.

In November 2019, Los Angeles adopted its current ADU ordinance that permits ADUs by right in all zones, which allows for any type of residential use (single-family and multifamily) and where a proposed or existing single-family dwelling exists on the lot. The ordinance also sets the specifications (e.g., size, height, setback, and parking) for two major categories of ADUs: (1) detached ADUs and moveable tiny houses and (2) attached ADUs and JADUs.²⁰ This ordinance still serves as the core ADU policy and regulatory framework for Los Angeles.

Building on this momentum, city leaders and nonprofit partners have launched several strategic initiatives to facilitate ADU expansion. For example, the LA ADU Accelerator Program partners with homeowners to rent their ADUs to eligible older adults facing housing insecurity by providing tenant screening, timely rents, and landlord supports. In 2019, Mayor Garcetti's Innovation Team and City Council District 1 launched the ADU Pilot to demonstrate how average homeowners could build well-designed ADUs in their backyards. Construction of the craftsman-style ADU was completed in summer 2019 and inspired the creation of the Backyard Homes Project. Housing nonprofit LA Más, in collaboration with a consortium of housing nonprofits, managed the Backyard Homes Project, which offered homeowners financing, design, and construction support to construct one of the city's prevetted ADU design models in exchange for a five-year agreement to house a Section 8 voucher holder in their new ADU. In 2020, the pilot shifted its focus to northeast Los Angeles.

In March 2021, the city launched its ADU Standard Plan Program, which gives builders and homeowners access to 20 preapproved ADU design options from 10 development and architectural firms in exchange for expedited and less expensive permit approval.²³ And in May 2021, the mayor's office announced the winners of the Low Rise Los Angeles design challenge, with global entries imagining new solutions for infill housing design.²⁴

Recent California State Law and Program Changes

The legal changes at the state and local level between 2017 and 2020 provide context for SB 9, which attempted to address concerns and trade-offs among affordability, equity, homeownership, and other

policies.²⁵ The law, effective January 1, 2022, permits owners of single-family homes to build ADUs and duplexes on their properties to provide additional housing. Specifically, SB 9 and prior legislation requires local governments to provide ministerial rather than discretionary approval for ADUs, duplexes, and lot splits in these situations. It also permits owners to split their lots and build ADUs or a duplex on each lot for a total of four units. Newly split lots can be sold, providing new ownership opportunities and additional rental housing.

SB 9 protects rent-controlled properties from alteration or demolition. Local jurisdictions, including the City of Los Angeles, may impose additional objective design standards and other limitations.

SB 9 has some limitations, as described in the accompanying senate report. An owner-occupancy requirement for three years is a condition of a homeowner receiving a ministerial lot split. The bill also prohibits ministerial lot splits on adjacent parcels by the same individual to prevent investor speculation. In fact, allowing for more neighborhood-scale housing in California's communities curbs the market power of institutional investors. By excluding properties where a tenant has resided in the past three years, SB 9 prevents profiteers from evicting or displacing tenants.

Both Los Angeles and California governments have launched initiatives to support ADU and JADU development (there is less government support for two-to-four-unit construction).

Programs that support owners and builders creating ADUs are as follows.

At the state level:

- SB 9 and SB 10
- The California Housing Finance Agency's (CalHFA's) ADU Grant Program, which provides
 \$25,000 toward predevelopment costs for eligible owners building an ADU
- The California Department of Housing and Community Development's ADU Handbook

At the county level:

- A website for owners, https://www.laadu.org/, that lists resources for ADU development throughout the county (including the city)
- The Second Dwelling Unit (ADU) Loan Pilot Program, also known as the Backyard Homes Pilot, a partnership with LA Más (no longer accepting applications)²⁷

At the city level:

- The ADU Standard Plan Program, which simplifies the permitting of ADUs for owners using plans preapproved by the Los Angeles Department of Building and Safety²⁸
- The ADU Accelerator Program, which provides financial and technical support for owners wishing to rent an ADU to very low-income seniors²⁹
- The Unpermitted Dwelling Unit Ordinance, which allows a streamlined process to legalize units with an affordability requirement³⁰
- Low Rise Los Angeles, a website showing the winners of the city's low-rise infill housing design challenge³¹

Because of the city's policies and complementary support programs and resources, the city received almost 12,000 building permits for ADUs in 2018 and 2019.³² Only a fraction of this increase in permitting has resulted in completed ADUs, in part because of a lack of financing options (see chapter 4). Moreover, challenges remain to make sure the housing permitted under SB 9 provides options, access, stability, and equity for all city residents.

Will SB 9 Be Enough? Or Will It Be Too Much?

The city's Housing Element provides a significant role for duplexes, ADUs, and JADUs to address the housing gap identified in the Regional Housing Needs Assessment (City of Los Angeles 2021, chapter 4). The Housing Element points to an average annual permitting rate of more than 4,000 ADUs and JADUs and projects a 25 percent increase in production for each year of the eight-year Housing Element period (2021–29). The Housing Element does not distinguish permitted units from completed units, a point we explore in chapter 3. The city government projects that of the 40,987 new ADUs to be produced from 2021 to 2029, 67.3 percent will be affordable to low-income residents. As we show in chapter 2, this housing volume would be substantially higher than production in Portland, Seattle, or Minneapolis.

In addition to reviewing the opportunities for ADUs and JADUs in Los Angeles under current law, we focus on less-explored areas of low-rise infill housing policy, such as the supply and financing of two-to-four-unit housing. We define two-to-four-unit housing as separate buildings housing two to four families under one roof, unlike an ADU. Although duplexes are explicitly permitted in single-family zones under SB 9, triplexes and fourplexes will be permitted only if Los Angeles enacts zoning changes permitted by SB 10, which allows municipalities to rezone areas of urban infill or transit.³³

This report explores opportunities for city and state policymakers and other stakeholders, in implementing SB 9, to capture the benefits of low-rise infill housing while acknowledging and mitigating any concerns. In chapter 2, we share lessons and ideas for innovative approaches and solutions to policy tensions from other jurisdictions that have attempted to encourage low-rise infill housing in single-family zones.

We then explore low-rise infill housing's impact on housing supply and the alternatives for financing the new housing. Specifically, we survey the city's current housing supply, explore the relationship between development and allocation of resources and placed-based policy implications, and look at other supply issues for these types of housing. In chapter 4, we look at current lending data and denial rates for two-to-four-unit housing in Los Angeles and examine why financing them is more difficult than financing other types of housing. Finally, based on the underlying economics and market potential of such housing, we offer recommendations for policy changes to support the development of these types of housing to address the city government's goals.

2. Residential Infill Policy and Program Insights and Ideas from Other Cities

As Los Angeles and other California cities seek to recalibrate their land-use plans, codes, and programs to accommodate more ADUs, duplexes, and other forms of low-rise residential units, several cities nationwide are piloting similar policies and practices that can address housing, land-use planning, racial equity, and environmental policy goals. In this chapter, we review lessons from other cities that have adopted policies to encourage low-rise infill housing.

With the expansion of traditional single-family zones and suburban housing developments, many local land-use plans, zoning codes, and building regulations (e.g., the types, use, and property and building dimensions) have made it difficult to build and legalize ADUs along with companion rules for two-to-four-unit residential buildings (which, in some regions, are called smallplexes). Within the past five years, several states, most notably Oregon and California, have enacted new legislation that requires local governments to expand their exclusive single-family zones to accommodate more residential units (ADUs and two-to-four-unit buildings). Minneapolis has gained national attention for removing exclusive single-family zoning from its land-use codes and plans, and Seattle has expanded the development of ADUs. With or without state direction, local governments are reviewing and recalibrating their residential zones and streamlining how they process a diverse typology of residential infill projects.

Policymakers, developers, housing advocates, planners, and community groups often confront a dynamic policy ecosystem that surrounds the adoption and enactment of plans, ordinances, programs, and practices for expanding ADUs and other forms of middle housing. As communities reexamine their zoning codes, the public debates over ending exclusive single-family zoning can become heated. Policy trade-offs abound as policymakers consider low-rise infill housing options to address steep housing affordability issues while not disrupting neighborhood stability or fueling investor speculation that could displace or gentrify neighborhoods of color. Across the US, these zoning reforms and landuse debates are happening at the intersection of three persistent urban policy and planning challenges: affordable housing, racial equity, and climate change. These challenges make the decisions even more difficult, as communities and their policymakers seek the right balance of low-rise residential infill housing policies and programs.

After a scan of relevant websites, research, policy, and practice reports and in consultation with practitioners and experts, we identified several cities with promising policies, programs, and practices. Although not an exhaustive list, all cities feature a relatively recent ADU ordinance and program, while a few have special policies and programs that promote low-rise housing with two to four or more units. We then highlight three "peer" cities that offer important insights and ideas as Los Angeles considers revisions to its current residential infill development policies and programs: Portland, Oregon; Seattle, Washington; and Minneapolis, Minnesota. In each case, we outline (1) the general legal requirements for ADUs and other low-rise residential infill projects along with relevant state legislation, (2) the underlying policy rationales in support of state and local reforms, and (3) the processes and procedures local governments and their nonprofit partners have implemented to support expansion of these housing types. After examining these three peer cities, we identify innovative programs and processes from other California cities.

Peer City: Portland, Oregon

Oregon and Portland have been at the forefront of national land-use and sustainability planning and policy relative to the core concepts of smart growth, mixed-use and transit-oriented development, affordable housing, and equitable development. The state and the city are now leading the way in adopting cutting-edge and comprehensive low-rise residential infill policies and programs. Key policy provisions and milestones include the following:

- In 2019, the Oregon legislature passed House Bill (HB) 2001, which reestablished and relegalized duplexes in all cities with more than 10,000 residents, negated local governments' ability to impose conditions in ADU ordinances, and expanded residential zoning throughout the state's largest cities (those with more than 25,000 residents) to now include smallplexes (e.g., duplexes, triplexes, fourplexes, cottage clusters, and town houses) in any residentially zoned area. ³⁶ HB 2001
 - » requires, by June 30, 2021, that all medium-size cities (those with more than 10,000 residents) throughout the state change their codes to allow new duplexes in areas zoned for single-family dwellings;
 - » requires, by June 30, 2022, that all cities in the Portland metropolitan region with at least 1,000 residents and Oregon's other largest dozen cities must change their codes to allow construction of smallplexes (with two to four or more units) in single-family zones;

- » allows cities to set reasonable siting and design requirements for these housing types and impose reasonable infrastructure system fees (with guidance from the Oregon Department of Land Conservation and Development);
- » prohibits cities from requiring owner occupancy or off-street parking for ADUs to expand the range of occupants and uses (parking requirements can apply if the ADU is used for vacation occupancy); and
- » requires cities to consider or develop ordinances and policies that can increase the affordability of ADUs and smallplexes, such as waiving or deferring infrastructure system fees and charges, adopting or amending criteria for property tax exemptions or freezes, or assessing a construction tax.
- The Oregon Department of Land Conservation and Development undertook several rulemaking advisory committees to clarify critical terms and definitions, develop model codes for different size cities, and outline processes to guide local governments in complying with HB 2001's provisions and mandates. The department also administered \$3.5 million in technical assistance funds to assist local government compliance with HB 2001 (DLCD 2020).

Policy Rationales

Although Portland's zoning reforms advance multiple policy goals, addressing affordability through greater housing choice and the return of middle housing were the consistent themes across their public discussions and policy reports. Middle housing includes a spectrum of low-rise, affordable housing types compatible with single-family neighborhoods, such as duplexes, triplexes, row houses, and cottage clusters that were once prevalent in the urban fabric of cities and inner-ring suburbs and that can serve as rental housing or starter homes for a broad range of middle-income working-class people and families.³⁷ Local and state policymakers and planners explain that middle housing types (e.g., duplexes, triplexes, and cottages) were once prevalent in many Oregon cities, but modern-day "suburban style" zoning made it more difficult for communities to maintain and especially build new middle housing. By providing greater housing choices that are compatible in scale and form with existing single-family neighborhoods, the middle housing spectrum offers more variety in unit prices and living arrangements. HB 2001's provisions make it easier for Portland and other Oregon cities to return to middle housing as part of its broader planning and housing strategies. Other policy rationales we found include the following:

- Expand the range of residential infill development options (from ADUs to cottage clusters) that are more economical to build and buy than stand-alone single-family dwellings; most of Oregon's urban areas (e.g., Portland, Eugene, and Bend) have high housing costs that affect overall quality of life.
- Respond to demographic trends (an increase in single³⁸ and older residents) that support the
 policy shift to ADUs and housing with two to four or more units.
- Address historical inequities (e.g., redlining, segregation, and exclusionary land-use policies) consistent with the Portland 2035 Comprehensive Plan's equity principle by the Residential Infill Project (RIP) creating more ownership options from the smallplexes for first-time homeowners and undertaking displacement risk analysis.
- Reduce greenhouse gas emissions and help communities adjust and adapt to the changing climate by having denser, transit-dependent neighborhoods and communities.
- Acknowledge that these state and local zoning reforms do not signal the end of single-family zoning (e.g., anyone can still build a single-family house); in essence, these reforms "expand" single-family zoning to make it "residential zoning."
- Ensure local governments have some control over land development. For example, state laws in Oregon allow local governments to manage land development decisions and the ability to set reasonable siting and design requirements, but state officials acknowledge that the local process can make it easier (or more difficult) for these expanded housing types.

General Requirements and Parameters

Before these statewide policy shifts (2019–21), the City of Portland had already revised its zoning rules and approval processes to facilitate and foster the conversion and construction of attached and detached ADUs within all residential and commercial zones. ³⁹ Although homeowners must still obtain building permits and pay development fees, Portland does not require discretionary zoning reviews or approval, nor does it require new parking spaces. The city can also waive development fees and systems development charges if the ADU is for owner occupancy, not short-term rental. Like in other cities, any applicant seeking to build a detached ADU had to get a building permit, draft plans, and pay development fees (e.g., building, water, and infrastructure fees, such as open space, parks, environmental services, and transportation) and require individual review and approval. From 2016 to 2019, Portland saw a surge in ADU permits, with a peak of 531 in 2018, but the total in 2019 and 2020 ranged from 260 to 300. ⁴⁰ A 2017 survey of ADU homeowners and policy analysis by Portland State

University identified the market trends and the role of various land-use and zoning changes in progress to meet the increased demand (Northwest Economic Research Center and Institute for Sustainable Solutions 2019). Portland's most recent land-use innovation, the Residential Infill Project, implements the other provisions of HB 2001 that require cities to allow smallplexes in single-family zones and could soon become a national model for low-density zoning reforms that catalyze the development of residential housing with two to four or more units. Below, we highlight the parameters for Portland's code and program for ADUs and smallplexes that together provide middle housing options throughout the city.

- Portland permits attached or detached ADUs, but new zoning regulations allow two ADUs on one city lot (built in any configuration), no longer require off-street parking, and remove ADU size limitations on interior basement ADUs.
- Portland will waive systems development fees (which can cost thousands of dollars) if the ADU
 is used as a rental property (month to month or a longer-term lease) for at least 10 years.
- Effective August 2021, RIP 1.0 enables a creative mix of middle housing, multiple homes sharing single-family lots for smaller households.
 - The program allows a maximum of four attached units (row houses or duplexes) at 3,500 square feet, or the owners or developers can build four to six attached units up to 6,000 square feet if half the units are for affordable housing.
 - » The program allows four small detached units (cottage clusters) on a single lot.
 - » The program's map indicates these new rules can apply just about anywhere in Portland.
 - The program also decreases the maximum size of single-family homes from 6,750 square feet to 2,500 square feet.
- Portland's RIP 1.0 program promotes smallplexes as more ecologically efficient and economical
 as a strategy for encouraging local developers to move away from demolishing small singlefamily homes to build more expensive single-family homes and instead replace them with two
 or more duplexes.
- Starting in fall 2021, Portland's planning department released for public comment RIP 2.0, which contains local guidance and proposed development rules for additional smallplexes, town houses, attaches houses, and cluster infill developments authorized in HB 2001.⁴² RIP 2.0 includes the following important features:
 - » It extends RIP 1.0 to include more multifamily and outlying residential zones (low-density R10 and R20 zones).

- » It clarifies the zoning and development rules in single-family residential zones by
 - allowing two new possible infill housing types (town homes and cottage clusters);
 - modifying the constrained site's overlay zone, which limits where certain types of infill would be allowed; and
 - creating a streamlined land division process to enable middle housing units (with two to four or more units) to be on their own lots for easier homeownership options (complies with new state requirements on lot splits in SB 458).⁴³

Special Program Features

- A step-by-step online guide for property owners and homeowners to help them assess the feasibility of building ADUs on their property⁴⁴
- A displacement risk analysis of the pending amendments to assess whether, how, and where these proposed changes could harm historically underserved communities (BPS 2020, appendix B)
- A progressive planning department that dedicates supplemental and complementary staffing and resources to support ordinance adoption and implementation
- Effective and strong political leadership from the mayor and city council to finalize and adopt
 the new ordinances and low-rise residential infill initiatives as part of the city's long tradition of
 pioneering urban planning, smart growth, and related land-use policies

Community Context and the Current Environment

- Significant leadership from the state with the adoption of a state law that reflects local interests and recommendations, and a dedicated office within the Oregon Department of Land and Conservation and Development
- Strong nonprofit urban planning, housing, and community development organizations that support the expansion of ADUs and middle housing in Portland and statewide⁴⁵
- Continuous involvement from Portland State University in conducting research and surveys of ADU homeowners and in providing classes and technical assistance to prospective homeowners⁴⁶

- Annual neighborhood tour that highlights innovative ADU homes⁴⁷
- Strong private-sector ADU and infill development industry that supports homeowners and features ADUs and infill development as a major focus of their business; ⁴⁸ several planning, urban design, development, and real estate companies have helpful web pages that promote the benefits of ADUs, provide checklists and resources about that community's ADU and infill development regulations, and offer guidance on how homeowners can do a preliminary assessment of what it might take to build ADUs on their property⁴⁹

Peer City: Seattle, Washington

The City of Seattle began the third phase of its ADU journey in 2014, when the city council adopted a resolution directing the Office of Planning and Community Development to make it easier to build ADUs in more places in the city. In a 2015 report, the planning department identified potential changes and policy rationales in comparison with similar changes taken by other cities in the west, and then created a draft policy and ordinance. After several years of analysis and discussion, the city council adopted and the mayor signed the legislation in July 2019. The legislation removed traditional barriers (e.g., off-site parking and owner-occupancy requirements for second ADUs) and issued a companion executive order to create additional activities and programs to support the new ADU rules, including the launch of a racial equity toolkit. ⁵⁰ The city already had rules in place that permit short-term rentals of ADUs, which continue to operate today. ⁵¹

Because of these regulatory changes and the support systems put in place, Seattle has experienced a significant boom in ADU permits over the past two years. In 2020, the city issued permits for 237 attached ADUs and 276 detached ADUs, up 80 percent from 2019. Per the mayor's executive order and subsequent city council bill, the Office of Planning and Community Development must undertake regular surveys of ADU owners and occupants and monitor compliance with the city's tree preservation ordinance when constructing new ADUs. The Office of Planning and Community Development is working with the University of Washington to administer the next ADU survey and aims to share those results in summer 2022.

Policy Rationales

 Leaders needed to address the city's and the region's severe affordable housing crisis (and address economic exclusion). With the expansion that now permits two ADUs on all lots, more

- lots are eligible for detached ADUs. The Office of Planning and Community Development estimates that ADUs can now be built on 75 percent of land that allows housing.
- Limits on sizes of new single-family dwellings to encourage ADUs and to discourage teardowns will provide more modest, mixed-income housing options, such as for seniors wanting to age in place or for residents to provide free housing to family and friends. ADUs have always been consistent with the city's traditional urban form and housing types.
- The new ADU rules support and facilitate the city's sustainability goals related to reducing car
 use, increasing energy efficiency, and activating green stormwater measures.

General Requirements and Parameters

- ADU types include in-law suites and garages (attached) and backyard cottages (detached).
- ADUs are permitted as of right in three residential zones: single-family, residential small lot, and all low-rise multifamily zones.
- Size limits on construction of new single-family homes (2,500 square feet or a 0.5 floor area ratio, whichever is greater) to discourage teardowns and McMansion remodels of existing homes and to encourage construction of ADUs as companions to new single-family homes.
- Two ADUs per lot are permitted, one of which can be a detached ADU in most residential zones, except in small lot residential zones. A second ADU must either meet green building standards or be reserved for income-eligible households.
- Parking quotas and requirements for property owners to live on site have been removed.
- The ordinance increases the size, height, and rear yard coverage for cottage sites and lowers the minimum lot size, which will expand detached ADUs to more locations throughout the city. The ordinance also expands any previous limits on unrelated occupants from 8 occupants to 12 occupants if the property has two ADUs.

Special Program Features

The ordinance developed 10 preapproved ADU site plans, designed by local architects and designers. The site plans range from under 300 square feet to 1,000 square-foot two-bedroom homes. Although the designs have been reviewed and approved regarding the codes for the

- structure and energy use, the homeowner must still obtain permits and inspections related to zoning, prefoundation, utility connections, and other site-specific requirements.
- The city adopted a racial equity toolkit, a statement of important principles and practices to ensure and expand ADUs for owners and neighborhoods of color. Seattle continues to consult the toolkit as it refines its regulations and implements its ADU and low-rise infill strategies.
- The city launched a comprehensive city website, ADUniverse, to help homeowners navigate city rules, permits, and processes, including the preapproved 10 ADU site plans.⁵²
- The city began an affordable ADU financing pilot to help low- and moderate-income homeowners and homeowners of color build ADUs.⁵³
- A special report published in September 2021 documents the evolution of Seattle's ADU efforts and provides recent data of their progress.⁵⁴

Community Context and Current Environment

- The mayor and city council demonstrated strong and persistent political leadership over the more than five years it took to finalize, adopt, and implement the new ADU rules and requirements.
- The mayor's companion executive order represents strong community and political support and sends a signal to all departments and staff members within city hall that ADUs and density are a top priority.
- An active planning department with dedicated staff members focus on implementation of the ADU ordinances and works with homeowners and developers to apply the somewhat intricate development rules that can vary depending on the type of zone, the size of the lots, and the type and number of ADUs.

Peer City: Minneapolis, Minnesota

Consistent with the policy actions set forth in its 2040 Comprehensive Plan, the City of Minneapolis, effective January 1, 2020, increased the density in (i.e., upzoned) all its single-family-zoned properties to three units. The city's action gained nationwide attention for how city officials, planners, and community advocates built the political and policy momentum to eliminate traditional R-1 single-family zoning. So far, the reports and analysis indicate the impacts from these changes on affordable housing

remain a work in progress. As early as 2014, the City of Minneapolis adopted ordinances that enabled property owners to build or convert ADUs without zoning approval on lots that have single- and two-family homes. ⁵⁵ Compared with jurisdictions such as Portland and Seattle, Minneapolis has a more traditional planning and permitting approach to ADUs with site, construction, and occupancy requirements that can vary if the proposed ADU is detached or attached.

Policy Rationales

- ADUs could help relieve cost pressures for renters by increasing the supply of affordable rental housing stock, cost pressures for renters that ADUs could help address.
- Small households demand new housing types where nearly half the region's projected household growth will be among people living alone.
- A substantial part of household growth will be people 65 and older.
- If ADUs in the Minneapolis-St. Paul region were on par with the market share of ADUs for the Portland region (1.5 percent of single-family homes), these ADU policy changes could contribute 11,000 new rental housing units.

General Requirements and Parameters

- ADUs are allowed on the same lot as a single-family or two-family home but only one ADU per lot.
- ADU types include internal ADUs (basement or located within the four walls of the primary dwelling) or ADUs attached (as a garage) to the primary residence, as well as detached ADUs.
- The site specification (e.g., size, height, and lot size) can vary depending on the ADU type (City of Minneapolis 2021).
- As a special rule for internal ADUs, property owners must reside in the main house or ADU as their primary residence and record this living restriction in the deed.
- ADUs are always smaller than the main housing unit but are limited to 800 square feet for internal or attached ADUs or up to 1,300 square feet for detached ADUs.
- Additional parking is not required for all types of ADUs.

Community Context and Current Environment

Many of the surrounding suburban cities also have ADU ordinances that present opportunities to cultivate broader community support and expand a community of consultants and contractors that specialize in ADUs. As with other land-use issues, Minneapolis offers resources and technical support on ADUs and smallplexes throughout the Twin Cities region. The housing finance nonprofit Family Housing Fund produced an ADU guide that tracks local zoning rules and land development processes for Minneapolis and its surrounding suburban jurisdictions (Family Housing Fund 2019).

BOX 1

Trends in Expanding Single-Family Zoning

The single-family zone has been the most restrictive of all zoning use designations. Courts often justified single-family zoning on the basis of protecting public health, property, and family values—core American legal and policy priorities. At the same time, communities nationwide leveraged the power of single-family zoning to exclude immigrants early in the 20th century and later to segregate families on the basis of race. Only in the past few years have scholars, policymakers, and practicing planners begun to reassess and reconcile the structurally racist land-use system with present-day realities.

In 2018–19, Minneapolis captured the national policy spotlight for being the first major US city to formally abolish single-family zoning. Dozens of cities and a handful of states have adopted or are considering adopting new statutes and ordinances that expand the use of ADUs and low-rise smallplexes within single-family zoning. For example, in October 2021, the Seattle City Council voted to replace the name or designation of single-family zones to "neighborhood residential zones" to reflect changes that increase density, such as ADUs, in single-family and multifamily zones. Some zoning reforms are driven by acute and chronic shortages of decent affordable housing, while others are reexamining the structurally racist land-use system that zoning helped create. Other cities seem to be following the Minneapolis approach or are considering ordinances that would remove single-family zoning, such as Hartford, Connecticut; Denver, Colorado; and Montgomery County, Maryland.^a

^aCarl Smith, "Ending Single-Family Zoning Is Not a Stand-Alone Solution," Governing, January 21, 2022, https://www.governing.com/community/ending-single-family-zoning-is-not-a-stand-alone-solution; Eric Jaffe, "Is It Time to End Single-Family Zoning?" Medium, February 6, 2020, https://medium.com/sidewalk-talk/is-it-time-to-end-single-family-zoning-56233d69a25a; and Alexander von Hoffman, "Single-Family Zoning: Can History Be Reversed?" Joint Center for Housing Studies of Harvard University blog, October 5, 2021, https://www.jchs.harvard.edu/blog/single-family-zoning-can-history-be-reversed.

California Examples: Santa Cruz City and Santa Cruz County

In 2003, before ADU policy and planning reform became popular, the City of Santa Cruz published the first ADU manual with multiple prototypes to guide residents in determining and constructing ADUs. At that time, city zoning rules required a conditional use permit for any ADU, but if the property owners or developers chose to follow one of the prototypes, the city could expedite permitting approval. Now, the city allows ADUs by right (before the recent state legislation), but applicants must still obtain the requisite building permits, pay development fees, and comply with other zoning and building specifications.⁵⁶

Although it took Santa Cruz County a few more years to liberalize its zoning code, ADUs are now permitted in any residentially zoned property. ⁵⁷ For county officials, the two primary policy goals behind their ADU reforms were affordable rental housing for Santa Cruz County families and assistance for senior homeowners to earn extra income and remain in their homes. Based on these policy goals, the county developed three important services to encourage ADU developments:

- The Interactive Toolkit to help homeowners design, permit, and construct ADUs includes a cash flow estimator; frequently asked questions related to redesign, construction, and financing information; and a geographic information system tool to determine whether their property can satisfy county ADU specifications.
- With the **ADU Financing Guide for Santa Cruz County**,⁵⁸ even before new state legislation,⁵⁹ the county began offering forgivable loans up to \$40,000 in 2018 to homeowners who enter into a written agreement with the county to rent ADUs to tenants making up to 80 percent of the area median income.
- With the **My House**, **My Home Pilot Program**, Santa Cruz County partners with Habitat for Humanity Monterey Bay and Senior Network Services to help low-income seniors build ADUs to generate extra income and help them remain in their homes. Of the seven senior ADUs they have built since 2014, four involve a tenants-in-common ownership structure that provides for joint management and ownership of the utilities and land.

California Example: Oakland

In 2016, a mayor-led task force (the Oakland Housing Cabinet) issued a report that identified ADUs as an integral housing affordability strategy for increasing housing supply and offering a broad range of housing types to meet a diverse cross-section of tenant and owner needs (City of Oakland 2020). Other policy benefits of having more ADUs included the stabilization of residential neighborhoods by generating rental income for homeowners, reducing the environmental footprint by providing affordable housing close to transit, and supporting cross-generational housing to support aging in place. Consistent with 2019–20 state law, Oakland expanded ADUs as a permitted use within single-family residential zones. ⁶⁰ The city planning department's web pages also offer property owners, developers, and community members accessible information that deconstructs some of the inherent complexities about ADUs—what they are, where they are allowed, and the essential steps to get necessary development review, building permits, and certificates of occupancy (City of Oakland 2021).

Although Oakland had some early success with its first wave of ADU ordinances and programming, city and community leaders found that low-to-moderate-income Hispanic, Black, and Asian homeowners still did not fully benefit from these new housing opportunities. With initial funding and support from the Chan Zuckerberg Initiative (CZI) and the San Francisco Foundation, the City of Oakland and its nonprofit partners launched a pilot "concierge" assistance program to streamline and simplify the process for building ADUs in fall 2021. The Keys to Equity initiative is housed at the Richmond Neighborhood Housing Services. Its menu of educational and technical assistance services includes one-on-one project management and a more efficient permitting process, construction services, and preapproved ADU design along with a special financial product.

Policy Insights and Implications

BOX 2

Our Recommendations

- 1. Prioritize and align policy goals with regulatory reforms and programmatic supports.
- 2. Customize individual regulatory reforms for ADUs and two-to-four-unit homes.
- 3. Provide robust support, guidance, and technical assistance for homeowners and developers.
- 4. Develop a portfolio of policies and programs to help communities of color benefit from the construction or conversion of ADUs and two-to-four-unit homes.

This scan and synthesis of state and local zoning reforms reveals important cross-cutting policy insights that can help Los Angeles policymakers and city staff members expand and enhance efforts to equitably and efficiently increase the supply of ADUs and low-rise residential housing. Below, we offer a few guiding principles and practices based on this synthesis.

Prioritize and Align Policy Goals with Regulatory Reforms and Programmatic Supports

Across these cities, we found multiple policy drivers in support of the state laws and local ordinances designed to make it easier to build more ADUs and two-to-four-unit housing. Addressing housing affordability and housing supply arose as common policy goals, along with expanding housing types to address a diverse range of housing needs (e.g., homeowners, renters, single adults, seniors, and family members). Challenges and opportunities around racial equity, investor speculation, displacement, and gentrification were also core policy goals for many of these cities. Emerging secondary goals involved the urban planning, sustainability, and environmental policy benefits from more dense, compact, transit-oriented development; energy efficiency; climate resilience; and the need for less infrastructure and building materials from constructing smaller units. Each of these goals, however, requires its own programs, plans, practices, and understanding of citywide and neighborhood context to make the goals a reality. By articulating multiple goals without having well-defined strategies on what it will take to

achieve them, policymakers may inadvertently raise community expectations that might make it difficult to implement and sustain support or cause community opposition.

A prudent approach for policymakers and staff members is to carefully assess and prioritize the policy goals that support the zoning reforms necessary to expand ADUs and low-rise residential housing and then align these goals with the strategies, tools, and resources to implement these policy changes. What are the potential policy trade-offs, and can they be accommodated? Does it make sense to focus on the more immediate needs or build in opportunities to facilitate systems change? For example, the core strategies for achieving homeownership are often different than those that facilitate affordable rental housing opportunities.

After prioritizing the core policy goals and identifying potential strategies, policymakers must also consider potential program, staffing, and resource issues. City departments and staff members may have to adapt what they are doing or think outside the box as they consider how these zoning reforms may affect neighborhoods and communities differently.

For the cities we examined, a critical step in the adoption and implementation phase was conducting or commissioning policy, planning, and economic studies of the current housing markets, inventory, and location of existing ADUs and two-to-four-unit buildings, along with geographic information system maps that can illustrate the general areas within the city that are now eligible for these new housing types and, with more market analysis (for Seattle), the potential risks of gentrification and displacement. These studies are critical to support the initial adoption but should be done to establish benchmarks or success measures that can be tracked, as these types of changes in markets, neighborhoods, and community attitudes and values will evolve and happen gradually. Some of these studies were done in house by the planning department, while nonprofits and university centers did parallel studies and research.

Customize Individual Regulatory Reforms for ADUs and Two-to-Four-Unit Homes

ADUs and residential housing with two to four or more units serve related but slightly different housing policy goals, and as a result, each regulatory provision found in local ordinances and programs has different implications and impacts on homeowners, developers, neighborhoods, and communities at large. The regulations for ADUs may generate responses or actions from different market segments, and that can play out differently in certain neighborhoods based on community demographics and urban form.

Policymakers and staff members should carefully dissect the specific provisions of existing or proposed zoning reforms to account for the relative strengths and barriers that ADUs or two-to-four-unit housing offer and then consider adopting and implementing different regulatory provisions for ADUs and two-to-four-unit housing that align with their high-priority policy goals. From our scan and analysis of these regulatory provisions, ADUs seem to primarily serve as opportunities for rental housing, while smallplexes have more potential to become homeownership opportunities. Thus, based on the Oregon and Portland experience, it would be strategic for local governments to have a robust smallplex ordinance and program to complement the more common, existing ADU policies.

Communities could still have complementary and coordinated programming and resources.

Whether supported by state law or not, adopting changes to zoning ordinances that expand single-family zoning to include ADUs and smallplexes serve as the foundational regulatory action. These zoning reforms mean homeowners can build ADUs or smallplexes without having to first get special zoning approvals, such as conditional use permits, variances, and planned unit development rules. Some states and cities expanded ADUs and smallplexes to other multifamily residential zones, not just the classic single-family (R-1) zone.

Knowing that most local governments may not abolish exclusive single-family zoning on their own, states such as Oregon and California enacted new laws that require local governments to expand their single-family zoning along with complementary development provisions. Local ordinances, however, have common regulatory provisions designed to make it easier to build ADUs or smallplexes or to limit their use or structure to avoid impacts on homeowners or the neighborhood. In some ways, these state laws and local ordinances walk a regulatory tightrope that requires a high degree of policy balance and implementation capacity and skill.

Common regulatory and programmatic provisions sometimes include requirements for off-street parking, owner occupancy versus rental occupancy, building permitting, and development fees. The presence or absence of these and other regulatory provisions can make the ADU construction (or conversion) easier or more difficult. The Terner Center conducted a 2019 inventory and assessment of more than 200 local government ADU ordinances and programs using a simple rubric and scorecard. The rubric involved 15 development and land-use criteria along with overall ease for homeowners to understand and use. ⁶³ The scorecard enables policymakers to compare the strengths and weaknesses of their own ordinances with those of their peers, thereby advancing the construction of more ADUs.

ADU types. Several cities have devised a somewhat elaborate typology of different ADU types
 (e.g., attached ADUs, detached ADUs, and JADUs) with slightly different rules regarding

- dimensions, size, placement, and other characteristics. Seattle's most recent provisions now allow for two detached ADUs on one site. Having a definitive and easy-to-understand typology can also facilitate better data tracking to measure the number and location of ADU types.
- Off-street parking. The trend among these pioneering cities is removing or scaling back requirements for off-street parking to help homeowners save money, make smaller lots eligible for ADUs and smallplexes, and advance urban planning and sustainability goals when located close to transit.
- Owner occupancy versus renter occupancy. Some local ordinances require the homeowner who builds the ADU to live in the main house on the premises (depending on whether the ADU is attached or detached) to encourage ADUs for family members or neighborhood rentals and to perhaps mitigate investor speculation. Other regulatory provisions impose requirements on the length and type of rental tenancy to discourage construction of ADUs for short-term (e.g., Airbnb) rentals. And some cities have launched pilot programs that reduce development fees or provide loans to homeowners if they rent to Section 8 voucher holders.
- Subdivision of lots. A critical barrier for low-rise residential developments is splitting a single-family residential lot so that any smallplexes (less likely, an ADU) could become opportunities for homeownership. Generally, the state subdivision rules for creating new individual lots can have narrow applications and be costly for small infill developers and homeowners to complete. Oregon's SB 465, enacted in 2021, attempts to clarify some of these arcane real property regulations and make the process more flexible for smallplexes. In a similar effort, California's SB 9 allows ministerial approvals for the subdivision of lots for the construction of low-rise residential developments.

Provide Robust Support, Guidance, and Technical Assistance for Homeowners and Developers

Although passage of these state and local zoning reforms provides potential affordable housing options, local governments and their nonprofit partners must still provide direct support (e.g., information and technical assistance) to facilitate the effective, efficient, and equitable implementation of these new low-rise infill development policies and programs. ⁶⁴ Homeowners and infill developers need guidance to easily decipher these new state and local ADU and smallplex rules and processes. Although most of these laws now permit ADUs and smallplexes in single-family zones, homeowners and developers must still obtain the requisite building, fire, and development permits and pay necessary development fees.

These land-use reforms reflect a new way of doing development that can benefit from direct technical assistance and general guidance.

Several of the peer cities we found have services to advance the construction of ADUs and housing with two to four or more units. City websites become the primary vehicle for demystifying and simplifying the development process, sharing information, and engaging the public. The City of Seattle's website ADUniverse and companion programming offer a model for other cities to emulate. Seattle, like several local government agencies, routinely holds community workshops and public hearings on proposals to refine and update local ordinances and development processes. Portland and Seattle have dedicated planning staff members who focus on implementation of ADU and low-rise residential development programs.

San Mateo County launched its one-stop-shop Bright in Your Backyard program to help homeowners construct second units by providing up to 100 hours of free feasibility and project management support for eligible homeowners who wanted to add an ADU or JADU. A homeowner or developer can find out more information about this effort along with other resources at its second unit center, a web-based clearinghouse. Hello Housing, a San Francisco nonprofit, features a website and provides Bay Area homeowners technical assistance on ADU design, permits, and project management. Hello Housing also participates in the City of Oakland's concierge assistance pilot for ADU homeowners (Keys to Equity), funded by the Chan Zuckerberg Initiative and the San Francisco Foundation.

Beyond local government, web-based clearinghouses and technical assistance pilots; statewide nonprofits, such as California's Casita Coalition;⁶⁷ and real estate, design, and development firms such as Purgula and Symbium provide homeowners and developers resource guides, ADU information, and consulting services that span multiple cities and states.⁶⁸

Develop a Portfolio of Policies and Programs to Help Communities of Color Benefit from the Construction or Conversion of ADUs and Two-to-Four-Unit Homes

American cities have long applied their land-use and zoning powers to segregate neighborhoods and housing based on race, ethnicity, and income. Even today, single-family zoning continues to be an exclusionary barrier for many communities of color. The recent reforms to expand ADUs and increase low-rise housing development could increase the supply of smaller units that may be more affordable and accessible for renters and homeowners of color. Code changes to abolish and expand single-family zoning will not by themselves redress structurally racist systems or guarantee homeowners of color will

realize benefits from these initiatives. The expansion of single-family zoning could harm communities of color by causing displacement or could disproportionately benefit white households.

Local governments, in collaboration with nonprofit and community partners, must also offer resources and technical knowledge on ADUs and smallplexes that are responsive for neighborhoods of color and specifically for homeowners, renters, and developers of color.⁶⁹ At the same time, local governments should also implement policies that seek to protect or mitigate potential displacement and gentrifying market forces. Achieving such a portfolio approach remains a work in progress for most cities, even in the pioneering cities we have mentioned.

Collecting demographic and geographic data on existing ADUs and housing with two to four or more units becomes a critical step in understand the landscape of low-rise development in neighborhoods of color. Gathering this type of information enables local governments and their nonprofit partners to understand past segregated development, identify potential risks of displacement, and customize and target additional assistance and support for homeowners of color so they can benefit from these new housing types.⁷⁰

Another pathway for infusing equity is to align ADU and smallplex code changes and programming with the city's racial equity provisions and principles from their citywide comprehensive plans or neighborhood plans. Portland's 2035 Comprehensive Plan and RIP program offer a helpful model. Seattle's ADU racial equity toolkit establishes a process and sets out principles and practices for planners, policymakers, and community members to assess the range of actions they can take to ensure the ADU changes foster equity (Seattle City Council 2018). Each of these foundational steps (the comprehensive plan and racial equity assessment tool), however, must lead to more specific and concrete assistance and resources. Seattle and other cities are piloting or considering the following ideas:

- Adopt antidisplacement strategies and investments in affordable housing that are customized for neighborhoods identified as having the most immediate risks for gentrification and displacement.
- Streamline building permit and other development review processes for ADU development projects where the owner adopts a preapproved building design plan.⁷¹
- Waive development fees or offer discounts for homeowners of color.
- Create a list of approved contractors, developers, and designers who are Black, are Indigenous,
 or are other people of color and who have worked with homeowners of color.⁷²

- Expand local homeowner repair and stabilization programs (that often provide low-interest loans and grants) to include legal ADU conversions or the legalization of illegal ADUs.
- Tailor community outreach and engagement activities regarding ADUs that highlight direct or immediate benefits for homeowners of color.
- Develop the capacity of place-based community development corporations and community development financial institutions (CDFIs) to finance, construct, and promote opportunities for homeowners and developers of color to build or convert ADUs and smallplexes.
- Track and monitor the neighborhood impact from investor-driven construction of ADUs and, especially, smallplexes.
- Explore creative financing and shared ownership models, such as land leases and community land trusts, that could make it easier for homeowners and developers of color to build ADUs and smallplexes.

BOX 3

Amnesty Programs for Legalizing Unpermitted ADUs: A Second Chance for Advancing Affordable Housing?

For decades, the conversion of basements and garages to rental housing units without building or zoning approvals have become common. As attitudes on exclusive single-family zoning began to shift along with policymakers adopting strategies for increasing the affordable housing supply, several California cities (including Los Angeles) launched programs to legalize the unpermitted conversion of garages and other spaces to accessory dwelling units. Several of these "amnesty" programs give property owners a limited time to obtain the zoning and building approvals for their illegal units along with guidance, online resources, and technical assistance in some cases.

Compared with the time and costs of new construction, the legalization of unpermitted units could increase the pace of adding affordable rental units. Even with the relaxation of single-family zoning rules, the property must still comply with applicable building, fire, and environmental requirements, and the owner must pay the requisite development fees that could discourage owners from participating. By providing property owners more time, these legalization programs could encourage hesitant property owners to obtain the proper approvals and thereby increase the community's share of affordable rental units. This regulatory flexibility could also be relevant as communities confront postpandemic market shifts and ongoing affordability and housing instability challenges.

With respect to implementation, few cities can document the total number of illegal units within their jurisdiction. Before launching a legalization process, it would be strategic to undertake an inventory or survey to determine the scale and location of illegal units. Given that many of these units have been hidden for years, local governments should consider other relevant data sources, such as utility records, and enlist community-based organizations compiling an inventory. Although the data might be incomplete given the challenges of identifying ADUs, local governments should chart or map the general locations to identify neighborhood concentrations of illegal ADUs. Consistent with other analysis in this report, local governments can then compare the inventory of illegal ADUs with data about legal ADUs and then overlay the potential sites that could permit construction of new ADUs in light of less restrictive citywide zoning reforms.

^aThe current website and available information on these legalization programs does not appear to reflect potential changes in local ordinances and processes in light of 2021 single-family and ADU zoning laws (i.e., SB 9 and SB 10).

Conclusion

Recent state and local reforms of land-use, housing, and zoning codes provide cities such as Los Angeles the regulatory foundation to promote and expand the conversion and construction of ADUs and two-to-four-family homes. Revising land-use plans and changing zoning and building codes is just a start. Local

governments working with nonprofit partners and developers must creatively engage with communities while coordinating services, technical assistance, and support to expand these garage conversions, backyard homes, and smallplexes into a viable and equitable affordable housing strategy. Although not exhaustive, the experiences of these peer cities provide the City of Los Angeles and its partners important insights and lessons that they can effectively and equitably adapt and apply to the city's diverse neighborhoods.

3. The Housing Supply Landscape

Changes to Los Angeles's housing stock prompted by SB 9 will not occur on a blank slate. The geography and occupancy of low-rise infill housing (ADUs and two-to-four-unit housing) today is a result of decades of laws, regulations, and market forces that determine what can be built where and who can purchase or rent. This chapter examines the existing patterns of low-density infill housing in Los Angeles, identifying patterns and practices that have produced inequitable distribution of housing types and housing access. SB 9 will change the housing supply landscape in Los Angeles. Policymakers will need to be mindful of whether these changes will improve or exacerbate housing opportunities.

Current property owners under SB 9⁷³ have the opportunity to reevaluate the potential use of their single-family lots. These owners may opt to increase housing opportunities across residential areas with higher infill of smaller units in areas that have excluded such compact growth because of zoning and occupancy regulations. With limited objective design standards imposed on the owner, SB 9 requires local agencies to approve qualifying projects without a hearing where owners seek to add a second dwelling unit or to subdivide a parcel that was initially zoned for single-family residential use. The initial parcel and subsequent subdivided parcels still must meet certain criteria in terms of square footage and construction, but SB 9 allows up to four residential units on an existing single-family lot (with one ADU and one JADU).⁷⁴

Greater density of residential units in a sprawling area like Los Angeles would allow more homebuyers and renters and more neighborhoods to have more housing options, though this largely depends on whether these units are both affordable for and accessible to current and future residents. With SB 9 generating more growth by granting owners greater flexibility in regulating and constructing alternative housing types, this growth may need to be channeled or supported by appropriate government intervention—including financing, regulation, or deregulation—to address equity and affordability concerns.

Two-to-Four-Unit Homes: The Original Low-Density Infill Housing Type

Before 2017, two-to-four-unit buildings were the most common form of low-rise infill housing other than new single-family homes. Table 1 lays out the distribution of current housing types in Los Angeles. Our spatial analysis below reveals how the location of two-to-four-unit housing reflects the city's

persistent racial segregation, redlining, and exclusionary zoning policies. Until SB 9, two-to-four-unit housing could be built only in multifamily zones. By allowing new production of low-rise infill housing in single-family zones, SB 9 presents a historic opportunity to increase housing supply in areas with greater opportunity and to promote more equitable land uses. At the same time, the value and equity represented by existing two-to-four-unit homes have been an important avenue for homeownership and wealth building for low-income residents of color.

TABLE 1
Distribution of Current Housing Types in Los Angeles

Property type	Share of all properties (at the structure level)
Single-family home	66.1%
Duplex, triplex, and fourplex	23.1%
Apartment or condominium	9.9%
Other	0.8%

Source: First American property records data as of 2020.

Using property records data from First American, the California Tax Credit Allocation Committee, and the American Community Survey, we find that two-to-four-unit buildings are disproportionately concentrated in neighborhoods of color with limited access to resources and economic opportunities. In addition, those neighborhoods largely overlap with formerly redlined neighborhoods, indicating the intensification of racial segregation. Though SB 9 marks a major stride toward opening up formerly exclusive neighborhoods to two-to-four-unit housing, it alone might not be enough to ensure equitable outcomes for low- and moderate-income (LMI) neighborhoods, particularly those with primarily residents of color.

Where Two-to-Four-Unit Housing Is Currently Located: The Legacy of Persistent Racial Segregation, Redlining, and Exclusionary Zoning Policies

Persistent racial segregation, exclusionary zoning, and redlining have locked in the unequal distribution of two-to-four-unit homes in Los Angeles. Los Angeles is the sixth-most-segregated out of 221 metropolitan areas nationwide. This situation has not changed much since 1990. In addition, exclusionary zoning policies—that is, exclusive areas zoned for single families that have apartment bans and minimum lot sizes—have long perpetuated economic and racial segregation by restricting high-opportunity areas to wealthier households, who tend to be white. Moreover, nearly all formerly redlined zones are still disproportionately Black and Hispanic households, persistently intensifying racial disparities within the city.

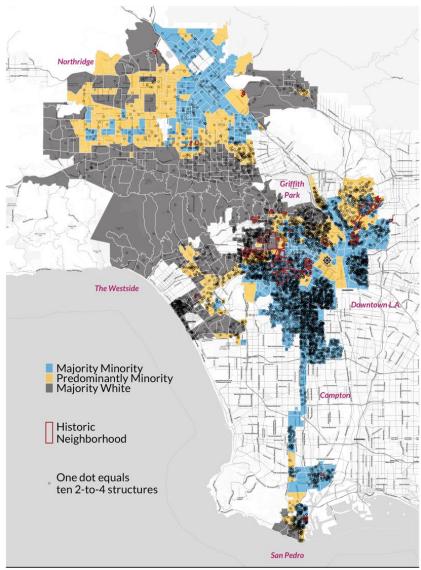
TWO-TO-FOUR-UNIT BUILDINGS ARE CURRENTLY DISPROPORTIONATELY CONCENTRATED IN LMI NEIGHBORHOODS OF COLOR WITH LIMITED RESOURCES

Two-to-four-unit low-density housing makes up 23.1 percent of all housing structures in Los Angeles as of the end of 2020. We define a predominantly minority neighborhood as a census tract where more than 80 percent of households are households of color, a majority-minority neighborhood as a census tract where between 50 and 80 percent of households are households of color, and a majority-white neighborhood as a census tract where more than 50 percent of households are white households. According to these definitions and 2015–19 American Community Survey data, 25 percent of the city's census tracts are predominantly minority neighborhoods, 49 percent are majority-minority neighborhoods, and 26 percent are majority-white neighborhoods. Overall, neighborhoods that are majority- or predominantly minority neighborhoods make up 74 percent of all census tracts in Los Angeles.

If we turn to the current distribution of two-to-four-unit buildings as of the fourth quarter of 2020, we find that 18 percent of those buildings are in predominantly minority neighborhoods, 66 percent are in majority-minority neighborhoods, and 16 percent are in majority-white neighborhoods. In other words, 84 percent of two-to-four-unit housing is distributed in neighborhoods of color. Figure 3 illustrates this disproportionate concentration, particularly in majority-minority neighborhoods.

FIGURE 3

Concentration of Two-to-Four-Unit Housing in Neighborhoods of Color



Sources: First American property records data as of 2020 and 2015-19 American Community Survey data.

In addition, those neighborhoods of color are disproportionately LMI neighborhoods, with median household incomes less than 80 percent of the area median income. Specifically, 79 percent of two-to-four-unit buildings are in LMI neighborhoods of color. Moreover, this concentration in LMI neighborhoods has intensified. If we classify two-to-four-unit structures by construction year, we find that those newly constructed buildings are more heavily concentrated in LMI neighborhoods of color (figure 4): 66.2 percent of two-to-four-unit housing built before 2015 was in LMI minority

neighborhoods, compared with 87.5 percent for those built between 2015 and 2017 and 88.5 percent for those built between 2018 and 2020.

FIGURE 4
Share of Two-to-Four-Unit Buildings in LMI Minority Neighborhoods, by Year Built



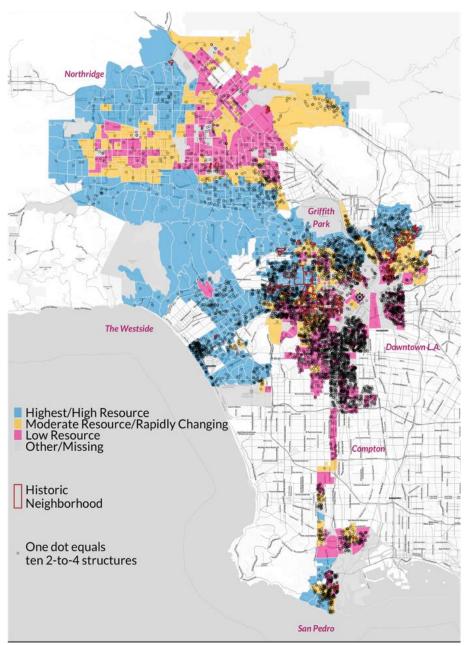
Sources: First American property records data as of 2020 and 2015–19 American Community Survey data. **Notes:** LMI = low- and moderate-income. LMI minority neighborhoods include LMI majority-minority neighborhoods and LMI predominately minority neighborhoods.

Figure 5 adds resource allocation to the map. The map shows that residents living in LMI neighborhoods of color are also accessing only low and moderate levels of resources. High-resource areas have a dense concentration of place-based characteristics linked to critical life outcomes, such as educational attachment, job proximity, economic mobility, and life expectancy. Following the methodology of the California Tax Credit Allocation Committee map (California Fair Housing Task Force 2020), we classify Los Angeles into three categories based on resource allocation: high, moderate, and low. The current distribution of low-density infill housing highly overlaps with the distribution of low- and moderate-resource areas (figure 5).

Combining the information from figures 3 to 5, we see that two-to-four-unit housing is disproportionately concentrated in neighborhoods where median household income is less than 80 percent of the area median income, current residents are disproportionately Black and Hispanic, and access to high-opportunity areas is limited. It is challenging for residents living in those neighborhoods to gain access to economic opportunities, educational resources, and valuable amenities.

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FIGURE 5
Low-Rise Infill Housing Locations Relative to Neighborhood Resource Allocation



Sources: First American property records data as of 2020 and 2015–19 American Community Survey data.

TWO-TO-FOUR-UNIT BUILDINGS ARE GEOGRAPHICALLY CONCENTRATED IN HISTORICALLY REDLINED AREAS

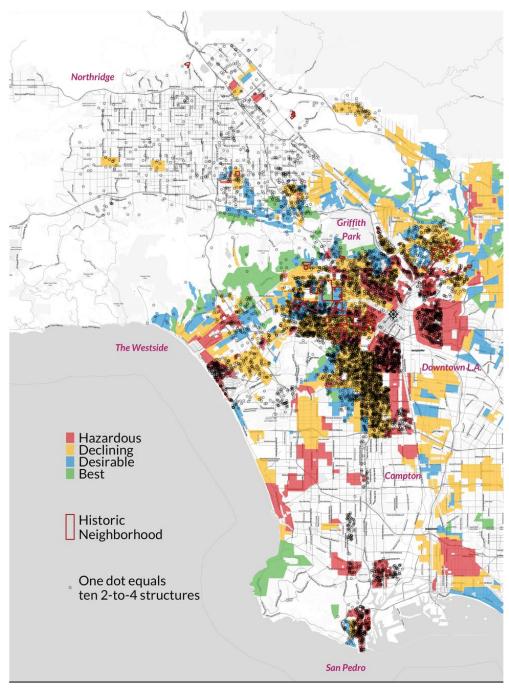
What further characterizes the supply landscape is that two-to-four-unit buildings are geographically concentrated in historically redlined neighborhoods.

In the late 1930s, the federal government established HOLC to provide government-backed mortgage credit for homebuyers, a crucial early form of mortgage liquidity that eventually resulted in financing denials to households in lower-graded areas. HOLC's lowest-graded communities were marked red on lending maps, a process later coined "redlining." Research has since shown that HOLC maps used race as an indicator, depriving households of color equal homeownership opportunities and increasing segregation (Mitchell and Franco 2018).

Our spatial analysis overlaps the 1930s HOLC map with today's distribution of two-to-four-unit infill housing in Los Angeles. It has been more than 80 years since those neighborhoods were marked in red in the city's HOLC's maps, but the legacy of redlining is still startlingly pronounced. Most of the city's stock of low-density infill housing is in formerly redlined communities, areas that were graded as "hazardous" or "declining" (figure 6). Neighborhoods that HOLC deemed "best" for mortgage lending are still overwhelmingly white.

The legacy of redlining is inextricably linked to the racial segregation, economic disparities, and unequal access to high-opportunity areas confronting underserved communities of color.

FIGURE 6
Low-Rise Infill Housing Locations Relative to Home Owners' Loan Corporation Map Designations



 $\textbf{Sources:} \ The \ University of \ Richmond's \ Mapping \ Inequality \ project \ and \ First \ American \ property \ records \ data \ as \ of \ 2020.$

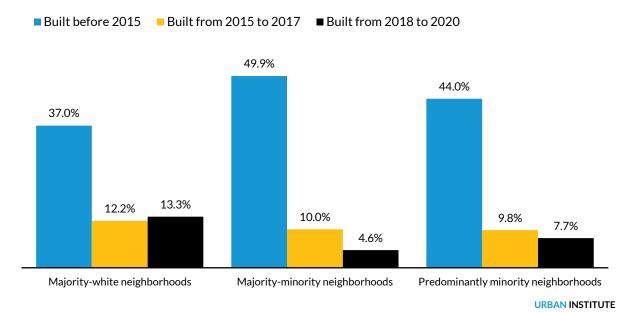
Has Recent Production of Two-to-Four-Unit Housing Addressed Historical Inequities?

Though SB 9 marks a major stride toward opening up formerly exclusive neighborhoods and allowing greater access to high-opportunity areas, the law still might not directly benefit LMI families and neighborhoods—at least, not without additional policy interventions. The recent production of two-to-four-unit homes indicates areas of caution.

Los Angeles has struggled to address racial homeownership gaps. Homeownership rates for Black and Hispanic households are only 29.0 percent and 28.8 percent, respectively, compared with 46.6 percent for white households, according to the 2019 American Community Survey.

Evidence on newly constructed two-to-four-unit infill housing indicates that it has become increasingly difficult for residents in neighborhoods of color to access homeownership. Assessed property values have become increasingly expensive for homes built after 2015. In addition, the owner-occupancy rate for newly constructed two-to-four-unit housing has been falling in neighborhoods of color (figure 7). Specifically, in predominantly minority neighborhoods, the owner-occupancy rate was 7.7 percent for structures built after 2017, compared with 9.8 percent for structures built from 2015 to 2017 and 44.0 percent for structures built before 2015. This decline was particularly pronounced in majority-minority neighborhoods. The owner-occupancy rate was 4.6 percent for structures built after 2017, 10.0 percent for structures built from 2015 to 2017, and 49.9 percent for structures built before 2015.

FIGURE 7
Owner-Occupancy Rates in Two-to-Four-Unit Buildings, by Year Built



Sources: Property records data and 2015–19 American Community Survey data.

Note: Owner-occupancy rates are as of the fourth quarter of 2020.

Increasing housing production with SB 9 will not automatically close the racial homeownership gap. On one hand, SB 9 may provide incentives for more developers and homeowners to build low-density infill housing in West Los Angeles or other affluent single-family neighborhoods, which would mitigate the severe housing supply shortage. It is possible that building infill housing in majority-white neighborhoods would offer more rental and ownership opportunities for households of color that currently do not exist. On the other hand, without commensurate policy tools to ensure affordability, it is unclear whether infill housing in majority-white communities would offer the same affordability benefits that it does in communities of color, as we see property values being much higher in majority-white areas. But if government policies try to address this by adding affordability requirements to the new housing, developers would have fewer financial incentives to build, and this will in turn limit the amount of housing the new construction will generate.

Because of historical structural barriers, coupled with the high costs of land and construction in single-family zones, the amount of net new units could be limited and unaffordable for LMI households of color, suggesting that increasing production will not significantly help close the homeownership gap for Black and Hispanic households absent other policy incentives.

Policymakers must think carefully about the relationship between equitable zoning for property owners and equitable outcomes for neighborhoods and people. Los Angeles will need to facilitate outcomes that will benefit households who have been historically unable to benefit from new investment.

The Landscape of Accessory Dwelling Units and Lot Splits

ADUs and lot splits are of more recent vintage in Los Angeles. In 2017, California passed legislation that required localities to make it easier for homeowners to build JADUs or detached ADUs (DHCD 2020). Given the sprawling landscape of residential land use in Los Angeles, higher infill and density through lot splits and ADUs could help address supply shortages. By right, ADUs may be built on existing single-family properties. These ADUs would generally be used as rental properties by the original owner. Lot splits allow the original owner to create and build on the new lot, creating opportunities for ownership or rental housing. In either case, without a coordinated, interdepartmental system that tracks ADUs and lot splits in conjunction with the type of residential construction (e.g., ADUs, two-to-four-unit homes, or condominiums), the city could miss an important opportunity to assess the impact of the new legislation.

As SB 9 takes effect, the city government needs to develop a methodology for recording ADUs and lot splits or subdivision activity alongside the permitting and construction of new residential units. It is important to evaluate what impact the expansion of higher infill under SB 9 will have across different neighborhoods. Without growth management, housing supply could increase in areas that are unaffordable and inaccessible, which could exacerbate racial and economic inequities, increase traffic congestion, or strain municipal services.

Although SB 9 provides tools to increase the housing supply, this section identifies opportunities to track trends, encourage equitable growth, and strengthen neighborhoods. A careful study of the location of existing units, and SB 9's impact on existing housing types and neighborhoods, reveals the possible need for interventions to ensure that growth under SB 9 meets residents' housing and community needs, especially for people of color and residents with low incomes. This section reviews what we can determine about existing activity and the analysis methodology we used regarding ADUs and lot splits.

BOX 4

Tracking SB 9's Impact: Methodology Challenges

Our ADU analysis uses publicly available data^a on ADU permitting and construction from the Los Angeles Department of Building and Safety. Despite the data containing an indicator for whether the permit relates to ADU construction or renovation, researchers determined that the most accurate method to identify ADU-related permits was to search for key words and phrases to track ADUs. Even this method is not foolproof, as abbreviations and misspellings are common, which limits or delays data filtering.^b

a "Building and Safety Permit Issued 2010 to Now," Los Angeles Department of Building and Safety, accessed May 6, 2022, https://data.lacity.org/City-Infrastructure-Service-Requests/Building-and-Safety-Permit-Issued-2010-to-now/n9nq-vewq/data. b Sam Khater and Kristine Yao, "Granny Flats, Garage Apartments, In-Law Suites: Identifying Accessory Dwelling Units from Real Estate Listing Descriptions Using Text Mining" (McLean, VA: Freddie Mac, 2020).

What Do We Know about ADUs in Los Angeles?

Because of regulatory reforms the California state legislature passed related to ADU permits, including design and parking requirements, the number of completed ADUs increased by about 340 percent from 2017 to 2018.⁷⁸ Though the methodology for tracking this development lacks uniformity, stakeholders agree that ADUs have become more popular. Moreover, we have chosen to focus on completed ADUs because many permitted ADUs do not seem to reach construction completion and habitability.

ADUs appear to have an increasingly popular presence in the North and South Valley regions, with West and South Los Angeles also seeing an increase in ADUs (table 2). This intuitively aligns with the popularity of single-family homes in these regions, as the lot sizes would be most optimal for ADU construction.

TABLE 2
Number of Completed ADUs with Certificate of Occupancy Status, by Year and Region

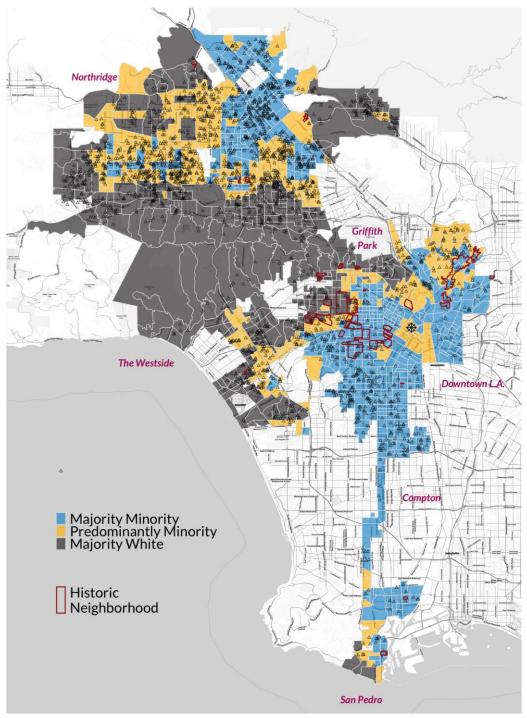
	2016	2017	2018	2019	2020	2021	2022	Total
North Valley	38	103	482	895	1,009	909	81	3,615
South Valley	27	110	522	967	1,132	927	80	3,827
Central Los Angeles	5	21	87	161	144	210	21	673
East Los Angeles	8	22	92	167	183	242	31	777
West Los Angeles	6	29	123	201	252	305	27	982
South Los Angeles	8	37	125	286	335	394	49	1,267
Harbor	1	6	11	32	45	57	8	171
Total	93	328	1,442	2,709	3,100	3,044	297	11,312

Source: City of Los Angeles Department of Building and Safety.

Notes: ADU = accessory dwelling unit. Data are for permitted ADUs with certificate of occupancy status as of February 9, 2022, only.

Visualizing the spatial distribution of ADUs with certificate of occupancy status in 2020 (i.e., the most popular year for permitted ADUs), certain patterns can be illustrated. Figures 8 and 9 show the exact location of each completed ADU, whether the median income in its corresponding census tract is above or below \$61,832 (i.e., the low-to-moderate-income threshold in 2019), and the neighborhood's racial categorization.

FIGURE 8
Location of Completed ADUs with Certificate of Occupancy Status in 2020, by Neighborhood Racial Composition

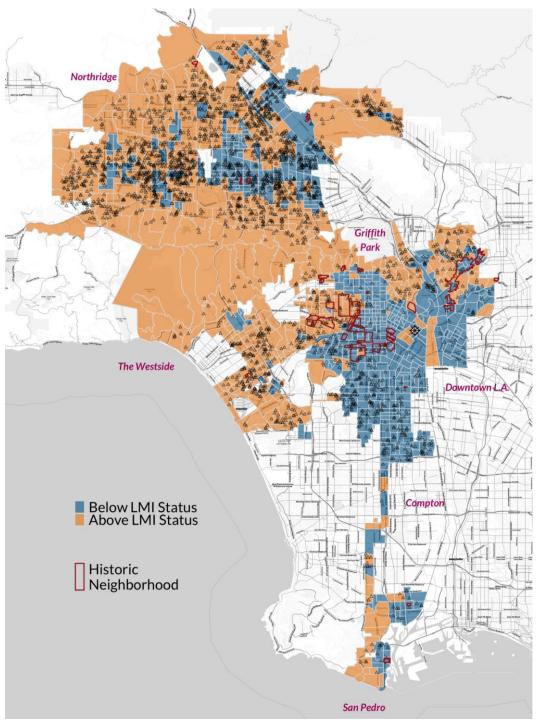


Sources: Los Angeles Department of Building and Safety and 2015–19 American Community Survey data.

Notes: ADU = accessory dwelling unit. Data are for completed ADUs with certificate of occupancy status as of February 9, 2022, only.

FIGURE 9

Location of Completed ADUs with Certificate of Occupancy Status in 2020, by Census Tract Low-to-Moderate-Income Status



Sources: Los Angeles Department of Building and Safety and 2015–19 American Community Survey data.

Notes: ADU = accessory dwelling unit; LMI = low- and moderate-income. Data are for completed ADUs with certificate of occupancy status as of February 9, 2022, only.

As with permits, the maps confirm that most completed ADUs in 2020 are located in the North and South Valley regions. Completed ADUs are evenly distributed across areas where median household income is above or below the LMI threshold, with a fair concentration appearing in predominantly minority neighborhoods near Northridge. ADUs prove most popular in majority-minority neighborhoods, where at least 80 percent of the population identifies a racial or ethnic minority (table 3). Since 2015, ADUs appear to follow similar growth patterns across these neighborhoods, with typically fewer completed ADUs located in majority-white neighborhoods. This trend may result from land-use restrictions, extensive permitting processes, or pushback from neighbors or officials who wish to discourage this development.

TABLE 3
Number of Completed ADUs with Certificate of Occupancy Status, by Year and Neighborhood Racial Composition

Year	Majority minority	Predominantly minority	Majority white	Total
2015	38	22	22	82
2016	36	36	21	93
2017	126	104	97	327
2018	469	513	449	1,431
2019	952	914	828	2,694
2020	1,095	1,035	956	3,086
2021	1,084	1,021	931	3,036
2022	113	96	87	296
Total	3,913	3,741	3,391	11,045

Source: Los Angeles Department of Building and Safety.

Notes: ADU = accessory dwelling unit. Data are for permitted ADUs with certificate of occupancy status as of February 9, 2022, only. Total figures may differ from the previous table based on our ability to match an ADU with a census tract.

Although the data do not provide granular detail, it would be interesting to compare initiated versus completed ADUs, as this could illustrate investment and financing patterns. Because of various obstacles and constraints, an ADU might be permitted and initiated but not completed. Moreover, constructing a new ADU after financing is secured—from design, to city approval, to construction—is estimated to take up to nine months, but it may take longer to complete some ADUs than it would be for others, depending on the project's scope. Although the permit data provide valuable insight into the construction of completed ADUs, they could provide additional insight into which permits fail to meet completion and why, such as specific financing barriers the owners faced or noncompliance with local regulations related to the ADU size.

Tracking ADUs Going Forward

A sizable portion of ADU construction activity occurred in low-income and minority neighborhoods before SB 9 went into effect. This could imply that SB 9-generated activity will occur in majority-white, high-income neighborhoods, providing some opportunity for economic and racial integration. We recommend the following:

- Improve data collection on ADU permitting and completion rates, and publish reports on activity. Create a unique field for detached ADUs, and possibly JADUs or attached ADUs, to better capture production activity.
- Policies should be cognizant that most ADU activity to date has occurred in minority and low-income neighborhoods and should closely monitor whether ADU construction has resulted in gentrification and displacement pressures in those neighborhoods or, conversely, whether it has enhanced wealth-building opportunities or accommodated family needs for current residents.

How Lot Splits Affect Supply

Methodology for Our Lot Split Analysis

The frequency of lot splits may increase, as SB 9 paves the way for homeowners to envision a new use of their property. We do not know how this trend historically has fared and how it will be monitored in the city's current housing landscape. Without a system that tracks lot splits in conjunction with the type of residential construction, the city could find many of the previously mentioned housing infill issues exacerbated. The Los Angeles County Department of Regional Planning does host a robust application and approval system requiring input from five county agencies that records applicants seeking to subdivide or split their lot. ⁸⁰ Using these data to track lot splits is not an exact science and involves an appreciation for the guidelines SB 9 established related to each lot's size requirements, as well as the use of historical and current parcel data that contain descriptive information on the boundaries of the land on which a property lies.

The lot split criteria in SB 9 seeks to ensure the residents of each unit will have ample space, despite higher density. In terms of proportions, if an owner splits their lot, the subsequent subdivided lot must be at least 1,200 square feet and at least 40 percent of the original lot.⁸¹

Although calculating the square footage of each lot is straightforward, the criteria involves a certain percentage of the original lot being retained. Without having longitudinal data on the size of each lot, it would prove difficult to calculate whether a lot was 60 percent or less of its original size to determine that it had been split. By matching historical parcel data with current parcel data, researchers could calculate size changes for parcels that exist in both time frames.

With the guidelines SB 9 established, researchers identified split lots longitudinally using both historical data and current data on parcels in Los Angeles County (the earliest data available are from 2014). Historical data included two time frames: a historical baseline and data for the year before SB 9 took effect. Present-day data would capture the current parcel landscape, ideally in 2023 or 2024 (a year or two after SB 9 took effect), to track the immediate changes following SB 9. For this demonstration analysis, we used 2014 as the historical baseline and 2020 as the year before SB 9 took effect. We then tracked changes in parcel size by performing the following steps in this three-part analysis:

- 1. Identify original lots that are smaller now.
 - Identify lots in the historical data that were at least 3,000 square feet and in designated single-family zones in 2014. Because new lots must be at least 1,200 square feet and 40 percent of the original lot, this requires the original lot to be at least 3,000 square feet.
 - » Using lot numbers, identify those lots in the current data, and calculate the difference in square footage (if any) to determine whether the original lot's square footage decreased. This assumes the lot number has not changed.
 - » Filter for parcels with a lot size in the current data that is 60 percent or less of the original lot size, according to the historical data.
- 2. Identify new lots with new buildings.
 - » Identify lots that did not exist in the historical data but exist in the current data.
 - » Filter for parcels that are at least 1,200 square feet with a property built after the last year in the historical data. Before comparing historical data with current data, determine whether the time frame between these periods is adequate by controlling for the duration and the order in which it could take to build a property and split the lot.
- 3. Link new lots with smaller original lots using the nearest neighbors method.

- Having identified both original and new lots that meet the regulations outlined in SB 9, the next step requires an algorithm to identify lots that are near one another that would suggest, based on their proximity, that they were previously connected.
 - » After filtering for both original and new lots completed, we match the closest parcels based on distance. The distance between original and subdivided lots can be used to filter for lots most likely split for residential use in the sample (figure 10).
 - Without having a unique identifier to connect the lots in the parcel data with the projects described in the building permits data, this method can also be used to connect the location of constructed ADUs or new units with the nearest parcel that meets the criteria for a split lot.

Lot Split Analysis

Figure 10 shows the location of the original lot (in black) and the newly created lot (in red). The map on the left displays lots where the distance between the new and original lots is up to 1,000 feet. The map on the right displays lots where the distance between the new and original lots is up to 250 feet. This technique assumes the original parcel identifier did not change between 2014 and 2020, the two years we compared.

Nerthridge

Nerthridge

Northridge

Northridge

Congress

Four

Congress

Apartments

Condominium Unit

Duplex, Triplex, and Quadruplex

Single Family

Single Family

Single Family

Single Family

FIGURE 10

Potential Lot Splits in Los Angeles, by Location of Original Lots (in Black) and New Lots (in Red)

Source: County of Los Angeles Office of the Assessor.

Notes: Data are for 2014 and 2020 only. The map on the left displays a sample with distance between the original and new lots up to 1,000 feet. The map on the right displays a sample with distance between the original and new lots up to 250 feet.

If the distance between the original and new lot is less than 250 feet, the algorithm returns only about a dozen potential lot splits. Because this methodology assumes that the original parcel identifier for each lot did not change during the lot split, the maps likely underestimate the actual number of lot splits. It also may demonstrate the barriers to lot splits that SB 9 is designed to overcome. While at best a proxy for identifying potential lot splits, applying this methodology regularly going forward could help officials track trends and patterns in lot size changes. The Department of Regional Planning houses a web-based tool, GIS-NET, to track active and inactive subdivision activity in unincorporated areas, but the tool would provide a more holistic picture if it were expanded in terms of accessibility and information. Eror example, the tool could employ multiple layers displaying subdivision activity as the base map, with options to view completed additional units over the base. Additionally, policymakers could consider having the Department of Building and Safety designate a new permit type that ties both the lot subdivision and the construction of additional residential units on the subsequent lot. This would

allow the city to track new housing per capita as subdivided lots create new housing. Moreover, stronger coordination between the Department of Regional Planning and the Department of Building and Safety over data collection and methodology for this activity would help the city track how neighborhoods experience lot splits.

LIMITATIONS

The ability to identify lot splits in relation to new housing unit construction is still limited. Lots may be split for various reasons, or they may change in a way that compromises their ability to be tracked. For example, a lot may exist in both historical and current data, but it could be assigned a new identification number between those two periods. This would render a lot that continues to exist that may have been split but was overlooked in the researcher's analysis because the change in identification prevents it from being tracked. Additionally, this analysis rests on the accuracy of the lot size provided. With a margin of error, some results might under- or overlook lots that had inaccurately recorded sizes.

Tracking Lot Splits and ADUs Going Forward

Our methodology provides an initial step to analyze and evaluate SB 9's effects, both in terms of ADUs and lot splits to accommodate greater density. Using this methodology in accordance with regulations under SB 9, the city and stakeholders may roughly track the development of infill and supply (Chapple, Ganetsos, and Lopez 2021).

Evaluating trends in lot splits, however, requires additional legwork. It would be worthwhile for the city to provide additional data to the public that track subdivision activity similar to its permit data. With a tool that integrates both subdivision and ADU activity, it would be possible to evaluate trends affected by each neighborhood's population composition. Moreover, identifying lot splits might provide further insight into housing trends that ADU locations might not reveal. Splitting a lot, following regulations, and financing the construction of new housing requires significant time and resources. Whether a lot was split to sell the land off or to construct additional housing the original landowner would oversee, the process requires extensive work and a potential network to collaborate with peers and neighbors for assistance. Location trends of lot splits could illustrate what additional resources certain neighborhoods possess that an ADU's location might not obviously reveal. The trends also illuminate where negative effects of new development could manifest if left unmanaged.

Policy Recommendations

It is never easy to promote production and advance racial equity simultaneously in a city like Los Angeles. Though addressing supply is important, production must address racial equity concerns. A multifaceted approach with collective action will be key to fostering racially and socially more inclusive neighborhoods. Below, we suggest a few additional policies to complement SB 9. A key first step is to capture information to understand how SB 9 affects communities and households. Beyond that, developing innovative homeownership models will help, such as community land trusts and shared equity models; direct investments to LMI communities of color; accessible and inclusive outreach and education to underserved communities; and a local implementation ordinance to maximize potential positive benefits. These efforts will help ensure that new production of low-density infill housing will produce equitable outcomes for neighborhoods and people.

Invest in High-Quality Data Collection and Analysis of the Construction and Completion of ADUs and Lot Splits

Improve data collection on ADU and lot split permitting and completion rates, and publish reports on activity. Create a unique field for detached ADUs, and possibly JADUs or attached ADUs, to better capture production activity. Link lot splits to the creation of new ADUs or two-family homes under SB 9. Policies should be cognizant that most ADU activity to date has occurred in minority and low-income neighborhoods, and leaders should monitor whether existing construction has produced gentrification and displacement pressures in those neighborhoods or whether it has had benefits.

Protect Low-Income Communities of Color from Displacement, and Encourage Neighborhood-Based Direct Investment to Low- and Moderate-Income Communities of Color

To complement upzoning, the city needs to encourage neighborhood-based direct investment to LMI communities, especially small businesses owned by people of color. This is a critical step to combat local economic disparities in historically disinvested and underserved neighborhoods. Research shows that small businesses tend to reinvest in their communities to support job creation, and Black-owned businesses in particular help stabilize underserved communities (Baily, Dynan, and Elliott 2010). Expanding capital access from local CDFIs in support of small businesses will provide more job opportunities and boost local incomes. Higher incomes would put people with low and moderate incomes in stronger financial positions to allow them to become first-time homebuyers or small-scale

landlords. Additional barriers will need to be removed so small-scale development can be accessible to all households, not only wealthy ones.

Develop Innovative Shared Equity Ownership Models, and Use Manufactured Housing

Shared equity models balance the benefits of individual ownership with the community benefits of having land and housing that remains affordable. Common models include community land trusts (CLTs), limited equity housing cooperatives, resident-owned communities (manufactured housing), and deed-restricted homes. Shared equity models create affordable opportunities for LMI households of color to enter the housing market. Models such as CLTs and limited equity housing cooperatives create more wealth than renting and allows homeowners to save for market-rate homes. Evidence has shown that the shared equity sector increasingly serves people of color, with 95 percent of shared equity homes priced at levels affordable to LMI households (Wang et al. 2019). Developing innovative shared equity ownership models that align with the city's supply landscape will help develop low-density infill production that would be affordable in perpetuity and would foster more LMI homeownership opportunities.

Potential policies include designing special incentives for shared equity development, using a CLT model and factory-built homes, and partnering with communities to identify lots that can be split and redeveloped to produce sustainable homeownership for LMI families. Incorporating manufactured housing into shared equity models would decrease the cost of constructing low-density infill housing. Modular and manufactured ADUs can bring down costs by reducing labor and benefiting from economies of scale. Local governments should consider accommodating manufactured and modular homes as low-density infill housing types, making sure the housing code does not prohibit it. The average sales price per square foot, excluding land value, for manufactured homes in 2020 was \$60, compared with \$124 for site-built homes. For modular and panelized homes, the average price was \$100 (Kaul, Goodman, and Neal 2022).

Other policies include promoting the state property tax exemption for property that is owned by a CLT and that is being—or will be—developed or rehabilitated as rental housing, limited equity housing cooperatives, or owner-occupied housing. Provide special incentives for CLTs investing in greater local educational attainment, more employment opportunities, and better health outcomes in historically disinvested communities.

Standardize Construction

Standardizing and streamlining construction is needed for more homeowners and developers to participate. The current predevelopment process, including approval for the permits, takes too much time, and this long waiting time means lost income to homeowners or developers. Los Angeles is making efforts to streamline the ADU design and permitting process by launching the Standard Plan Program for ADUs. This plan, implemented by the Los Angeles Department of Building and Safety, aims to simplify permitting for ADU design and construction by providing homeowners 20 preapproved designs created by some of the city's nationally recognized architecture companies. Choosing one of these plans is expected to cut down review time from several weeks to even a day. Once settled, this type of program could be expanded to two-to-four-unit housing, which can help more people to participate.

Adopt a Local Implementation Ordinance of SB 9 to Reflect the City-Based Landscape

Consider allowing smaller lot split sizes and more flexibility in allowable building types, especially if the new building reflects successful historical housing models.

Conclusion

SB 9 is being implemented on a landscape of ADUs and two-to-four-unit homes that is not equitable. These housing types provide greater flexibility for residents and potential income for owners but, until now, have not been permitted in single-family zones, which are predominantly white, high-resource neighborhoods produced by the legacy of redlining. But without policy intervention, additional construction in single-family zones may be accessible only to wealthy households. The city can use policy levers to encourage new construction and investment in low-income communities of color and to encourage affordable ownership alternatives for construction in expensive neighborhoods.

4. Financing Infill Housing

Zoning changes do not naturally increase housing supply. Despite heated debate surrounding the passage of SB 9, we are not likely to observe rapid changes to neighborhoods. ⁸³ To build low-density infill housing, homeowners need to decide to add additional units to their current properties, which requires time and capital.

The average cost to build a detached ADU can range from \$150,000 to \$300,000 (Kelkar and Osemwengie 2021), which can be unaffordable, especially to homeowners with low incomes and few assets. Financing low-rise infill housing is not easy, especially for low-income households and households of color, who are less likely to have access to sufficient financial resources. Although developers and investors have greater access to capital, SB 9 contains an owner-occupancy requirement for lot splits. This requirement does not stop investors from building duplexes and ADUs on existing lots, but it does prevent them from purchasing whole properties and splitting them to build more. The owner-occupancy requirement aims to protect homeowners and preserve homeownership, but it may slow the growth of low-rise infill housing. Additionally, when low-rise infill housing gets built for sale, financing will affect who can buy the new units.

In this chapter, we discuss financing challenges homeowners face when trying to build low-density infill housing, and what renters—especially renters of color and low-income renters—face when accessing homeownership. We provide recommendations and solutions that help homeowners have better financing opportunities to build low-density infill housing and help renters of colors become homeowners as additional supply enters the housing market.

Financing New Construction of Low-Density Infill Housing

Even with the passage of SB 9, existing homeowners are most likely to add ADUs to existing housing units or split their current housing into duplexes, as adding more units is more expensive (Woetzel et al. 2019). The financing challenge for ADUs also applies to duplexes, triplexes, and fourplexes, but the size of the problem increases with the amount of funding needed for construction.

After legislative changes removed barriers for constructing ADUs, ADU permit applications in California have increased significantly since 2018. ADU completions have increased, but the increase does not match the increase in applications. From 2018 to 2019, ADU permits issued increased from

5,911 to 15,571, and completions increased from 1,984 to 6,668, with Los Angeles County accounting for more than half the permitted ADUs (Chapple, Garcia, et al. 2020).

Relative to other counties in California, more ADU construction in Los Angeles County occurred in neighborhoods with fewer resources (Chapple, Garcia, et al. 2020), suggesting that low-income homeowners in Los Angeles are using this new opportunity to build wealth or create more space for additional family members. But not all homeowners who can benefit from ADU construction do so, and not all households who received permits completed ADU construction. In fact, between 2013 and mid-2020, among 19,751 permits submitted, only 910, or 4.65 percent, were finalized (Kelkar and Osemwengie 2021). Our findings also show that the share of investors that own two-to-four-unit properties has been rising, especially in LMI neighborhoods (see chapter 3).

A 2020 Center for Community Innovation survey found that lack of funding was the greatest barrier for expanding ADU construction (Chapple, Garcia, et al. 2020). According to a recent Inclusive Action for the City survey, 58 percent of homeowners with completed ADUs said financing had been an obstacle. This number is likely to be higher for those who did not complete the ADU construction.

Limited Financing Options Exist for Constructing Low-Density Infill Housing

ADUs can be financed in several ways. The traditional mechanisms are savings or other liquid assets, including family support; home equity lines of credit; cash-out refinances; renovation loans; and construction loans. Many homeowners use multiple options because a single option often does not fully finance the construction. Only wealthy homeowners can build low-density infill housing with their existing assets. Homeowners who have earned ample home equity from the recent increase in home prices may be able to use home equity lines of credit and cash-out refinancing. But homeowners cannot take out more than 80 percent of the existing home's value, which is often not enough to fully finance a new ADU or duplex. Also, home equity lines of credit and cash-out refinances impose lending limits based on the preconstruction value and do not incorporate the added value that may accrue from the new units.

Moreover, with prevailing tight lending standards, only homeowners with strong credit will be able to extract home equity. According to 2020 Home Mortgage Disclosure Act data, the denial rate for cash-out refinances in Los Angeles was 18.4 percent, 6.3 percentage points higher than the denial rate for purchase loans. For an open-end line of credit, the denial rate was 41.3 percent. Additionally, for households of color, who, on average, have lower credit scores and less income, obtaining a loan is even more challenging. Homeowners of color also are likely to live in low-price homes, which limits the

amount of home equity they can extract. According to 2015–19 American Community Survey data, the median home values for Black and Hispanic homeowners in Los Angeles were \$500,000 and \$475,000, respectively, while the median values for white and Asian homeowners were \$750,000 and \$600,000, respectively. Homeowners of color are also more likely to have a higher portion of mortgage debt, as they put less money toward a down payment, reflecting their lower wealth. Even if Black and Hispanic homeowners can extract home equity, it will likely not be enough to fully finance ADU construction.

Homeowners with less home equity can use renovation loans. The Federal Housing Administration (FHA), with its 203(k) program, and the government-sponsored enterprises (GSEs), with Fannie Mae's HomeStyle Renovation program and Freddie Mac's CHOICERenovation program, provide renovation loans, but homeowners rarely use them, and denial rates are high. According to 2020 Home Mortgage Disclosure Act data, home improvement loans account for 4 percent of the total loan applications in Los Angeles, and the denial rate for these loans was 45.6 percent. There are several reasons these programs do not meet owners' financing needs. Using FHA 203(k) loans, homeowners can borrow up to 110 percent of the property's proposed future value, or the home price plus renovation costs, whichever is less. The amount also needs to be lower than the area's FHA loan limits. Additionally, 203(k) loans finance only attached ADUs, not detached ADUs. This means that for low-density infill housing, the 203(k) program will not finance the construction of detached ADUs or duplexes after the lot split. Realizing the need for more financing, Freddie Mac announced a new CHOICEReno eXPress program for financing small-scale home renovations in August 2021. There is no lender risk retention in this program, and the loans cover up to 110 percent of the purchase price (or 115 percent in high-need areas).

Because of the high risk associated with construction and the postconstruction value, lenders typically charge high interest rates. Lenders are also reluctant to make these loans, as lenders bear the risk of cost overruns or poor outcomes. Many lenders hire contractors or engineers to oversee the work, which is an additional cost to lenders.⁸⁶

Similar to renovation loans, construction loans have high interest rates, are short-term loans (renovation and construction loans are typically for one year or less), and require the lender to hire a professional constructor to oversee the process. Homeowners can either pay off the construction loans when the ADU is completed or transform the loan into a permanent loan. Homeowners rarely use construction loans because they are expensive and involve additional supervision, which complicates the process and increases the amount of time and money required to complete the project. Because ADUs are simple to build compared with larger construction projects, the same level of oversight may not be necessary.

Homeowners could also convert their existing units into duplexes and rent out a unit. This type of conversion will run into the same barriers ADU financing faces—the nonexistence of a tailored financial loan that can fully cover construction costs with affordable interest rates. But the problem may be greater because the costs of converting single-family housing to duplexes is likely to be higher than ADU construction. Because converting existing structures to duplexes is less common than adding ADUs, homeowners who want to build these types of housing will need support and guidance.

Homeowners could also subdivide the property and build a new unit. But the cost of subdividing is substantial, and there is not likely to be enough equity to release the new lot from the existing loan, as the value of the newly built unit will not be included in the appraisal. It is more likely the homeowner will sell the new lot to an investor and use the sale proceeds to pay down the existing mortgage. For some homeowners, this could be an opportunity to realize some housing wealth without moving.

Incorporating Rental Income and Appraising Is Also Challenging

Whether building ADUs or two-to-four-unit buildings or converting existing structures, there are two additional barriers to financing. First, no financing option considers the potential income that low-density infill housing will generate and therefore limits the amount the homeowner or the developer can borrow.⁸⁷ Additionally, excluding rental income overstates the borrower's projected debt-to-income (DTI) ratio. High DTI ratio is one of the most frequent reasons for denial.⁸⁸

Second, it is difficult to appraise how much value the new construction will add. Thus, the new value is not incorporated when underwriting the construction loan, which limits the amount property owners can borrow. Both these barriers are related to the thin market problem. There is a scarce number of low-rise infill units to accurately measure the future rental income flow and the property's future value. Low-rise infill housing can also be used for various purposes, which complicates the valuation of the added units. For example, a household can rent the ADU to a renter at market value; provide housing for family members, home health aides, or child care providers at low or no cost; or use the property for office space.

Changing Market Conditions

Over the past decade, construction material and labor costs have increased. Job openings in the construction sector have remained near historic highs following the Great Recession, and the prices of key building materials have increased significantly (lumber prices, for example, have increased 50

percent over the past 10 years) (Kaul, Goodman, and Neal 2021). During the pandemic, when many renters struggled to pay rent on time, the delinquency rate for mortgages on two-to-four-unit housing increased significantly more than it did for mortgages on single-family homes. For example, in October 2020, the delinquency rate for two-to-four-unit housing was 9.1 percent compared with 6.8 percent for single-family homes (Black Knight 2020). Additionally, after hitting an all-time low in January 2021, mortgage interest rates have started to increase (the Federal Reserve indicated in January 2022 that it would soon raise interest rates). ⁸⁹ These changes indicate that both construction and financing costs to build low-density infill housing will rise. Homeowners stand to gain more income from rising rents (Joint Center for Housing Studies 2022), but the rise in costs likely dampens their interest in creating low-density infill housing. And because many homeowners have refinanced to receive historically low interest rates in recent years (Goodman et al. 2022), it is questionable whether they will refinance to receive a higher-interest-rate cash-out refinance to access capital to construct low-density infill housing.

Barriers to Purchasing Infill Housing

Once a homeowner or developer obtains financing and constructs additional infill units for sale, they need someone to sell to. Prospective homebuyers also face significant barriers to financing the purchase of infill housing. This is especially true for low-income households and households of color who, because of discrimination and other factors, possess fewer assets, earn less income, and have lower credit scores than white households, on average.

Credit disparities, stemming in part from systemic racism, affect both current homeowners who want to finance an infill project on their property and buyers who want to purchase a new unit built on land produced via a lot split or subdivision. Even though infill housing is viewed as a tool to increase homeownership opportunities, building infill housing alone will not remedy racial disparities in access to financing for homeownership (Choi et al. 2019) and, without policy interventions, could widen racial homeownership and wealth gaps (Seattle City Council 2018). In this section, we look at indicators of ability to access financing for homeownership by race, ethnicity, and income. These three characteristics are highly correlated with one another in Los Angeles (table 4); as of 2019, white households were significantly more likely than Black or Hispanic households to earn more than 120 percent of the area median income.

TABLE 4
Race and Income Tabulations in Los Angeles, 2019

	Asian	Black	Hispanic	Other	White
Share of race or ethnic	ity, by income				
< 80% of AMI	40.4%	56.8%	53.5%	43.0%	33.3%
80-120% of AMI	14.7%	16.6%	19.2%	17.6%	14.4%
> 120% of AMI	44.8%	26.6%	27.4%	39.5%	52.2%
Share of total population	on, by race and inco	ome			
< 80% of AMI	5.2%	5.9%	19.6%	1.3%	12.4%
80-120% of AMI	1.9%	1.7%	7.0%	0.5%	5.4%
> 120% of AMI	5.7%	2.7%	10.0%	1.2%	19.4%

Source: 2019 American Community Survey.

Notes: AMI = area median income. White people are non-Hispanic.

Mortgage Denials

Data on home mortgage applications from 2018 to 2020 in Los Angeles show that Black and Hispanic mortgage applicants had higher denial rates than white applicants for purchase and home improvement loans. All borrowers were more likely to be denied financing for two-to-four-unit homes than for single-family homes. From 2018 to 2020, 15 percent of Hispanic applicants and 17 percent of Black applicants were denied loans to purchase one-to-four-unit properties. These rates are 4 and 7 percentage points higher than those of white applicants during the same period and even further above the rates for Asian applicants. Black applicants were most likely to be denied mortgages to purchase two-to-four-unit buildings (24.7 percent).

Home improvement loans are a popular financing product for homeowners who want to build an ADU or convert a one-unit home into a multiple-unit home. But the market conditions described above make approval for these loans unlikely, particularly for households of color. Applications for renovation and construction loans were more likely to be denied than purchase loans, with denial rates from 2018 to 2020 ranging from 41 percent to 57 percent. Applications from Black and Hispanic applicants were denied more than half the time, compared with 42 percent for white applicants.

TABLE 5

Denial Rates, by Race or Ethnicity

Applications for select housing types in Los Angeles

Race or ethnicity	One to four units	One unit	Two to four units	Home improvement
Asian	9.3%	8.9%	13.5%	46.7%
Black	16.9%	15.5%	24.7%	50.7%
Hispanic	14.6%	14.3%	17.1%	57.4%
White	11.2%	11.0%	16.1%	41.4%

Source: 2018-20 Home Mortgage Disclosure Act data.

Notes: White people are non-Hispanic. Details about how we calculated denial rates can be found at Jung Hyun Choi and Peter J. Mattingly, "What Different Denial Rates Can Tell Us about Racial Disparities in the Mortgage Market," *Urban Wire* (blog), Urban Institute, January 13, 2022, https://www.urban.org/urban-wire/what-different-denial-rates-can-tell-us-about-racial-disparities-mortgage-market.

For purchase loans of one-to-four-unit properties in Los Angeles, the primary reason for denial among all racial and ethnic groups from 2018 to 2020 was the borrower's DTI ratio. The next three most frequent reasons for denial are credit history, collateral, and a catch-all "other" category (table 6).

TABLE 6
Reason for Denial, by Race or Ethnicity

Reason for denial	Asian	Black	Hispanic	White
DTI ratio	36.1%	35.9%	37.2%	38.7%
Other	11.1%	12.6%	10.7%	12.4%
Credit history	8.3%	15.1%	16.0%	8.2%
Collateral	14.8%	14.1%	12.0%	13.6%

Source: 2018–20 Home Mortgage Disclosure Act data.

Notes: DTI = debt-to-income. Data are for purchase loan applications for one-to-four-unit housing.

Income is also highly correlated with access to mortgage financing. Low-income households also face greater challenges accessing capital. The tables below use three income buckets based on the share of the median income in the Los Angeles-Long Beach-Glendale, California, metropolitan statistical area, which was \$80,000 as of 2021. The tables categorize earnings by both the borrower's household income and the median neighborhood income where the property is located.

Denial rates from 2018 to 2020 show that applications for loans on properties in low-income neighborhoods were less likely to be denied (12.6 percent) than those from low-income applicants (29.1 percent), indicating the presence of moderate-to-high-income borrowers buying in these areas (table 7). This relationship reverses when looking at two-to-four-unit homes; denial rates on these properties are highest in neighborhoods where the median income is greater than 120 percent of the area median income. But during the period we examined, the number of applications for two-to-four-unit homes in neighborhoods where the median income was more than 120 percent of the area median income were

only a quarter of the number of applications in neighborhoods where the median income was less than 80 percent of the area median income, and the high denial rate reflects this small sample.

TABLE 7

Denial Rates, by Income Bucket

Applications for select housing types in Los Angeles

	One to four units	One unit	Two to four units	Home improvement
Neighborhood incor	me			
< 80% of AMI	12.6%	11.8%	15.3%	45.9%
80-120% of AMI	11.2%	10.9%	14.4%	37.5%
>120% of AMI	11.8%	11.6%	18.6%	35.1%
Household income				
< 80% of AMI	29.1%	28.9%	30.3%	55.3%
80-120% of AMI	15.2%	14.6%	23.5%	44.4%
>120% of AMI	10.7%	10.3%	15.4%	33.4%

Source: 2018-20 Home Mortgage Disclosure Act data.

Notes: AMI = area median income. Neighborhood income is based on median family income in a census tract. Household income measures the borrower's income. Data are for purchase loan applications for one-to-four-unit housing.

DTI ratio was the most likely reason for denial, regardless of income (table 8). But the relationship with DTI ratio was inversely related to neighborhood and household income. As neighborhood income increases, the share of denials attributable to DTI ratio also increases, and for household income, the share of denials attributable to DTI ratio decreases as income increases. Credit history was the least likely reason for denial for households earning above 120 percent of the area median income, reflecting disparities in credit scores by income.

TABLE 8

Denial Rates, by Income Bucket and Reason

	< 80% of AMI	80-120% of AMI	> 120% of AMI
Neighborhood income			
DTI ratio	33.0%	35.7%	40.6%
Other	12.0%	11.4%	11.9%
Collateral	16.7%	14.3%	12.2%
Credit history	11.3%	12.1%	9.4%
Household income			
DTI ratio	59.3%	48.1%	32.8%
Other	7.9%	7.3%	13.1%
Collateral	13.2%	12.8%	9.3%
Credit history	4.5%	11.3%	15.4%

Source: 2018–20 Home Mortgage Disclosure Act data.

 $\textbf{Notes:} \ AMI = are a median income; DTI = debt-to-income. \ Data are for purchase loan applications for one-to-four-unit housing.$

Credit Characteristics

Compared with white applicants, Black and Hispanic mortgage applicants in Los Angeles had higher DTI ratios and put less money down relative to the home's value (table 9). Among Black and Hispanic households who applied for mortgages between 2018 and 2020, the average DTI ratios were 43 percent and 44 percent, respectively, compared with 40 percent for white households. This gap widens by income. Applicants in the bottom quintile of income in Los Angeles averaged a 48 percent DTI ratio, compared with 33 percent for the highest earners, highlighting a lack of affordable ownership options.

Though the absolute difference in DTI ratio appears small, the impact on the marginal borrower is significant. And these differences can lock borrowers of color out of an already tight market for infill financing. In interviews we conducted with local CDFIs, we heard that a high DTI ratio was a detriment to the success of products aimed at helping low-income owners and owners of color develop ADUs.

TABLE 9
Median DTI Ratios and Down Payments in Los Angeles, by Race or Ethnicity

Race or ethnicity	Median DTI ratio	Median down payment
Asian	40%	22%
Black	43%	10%
Hispanic	44%	10%
White	40%	20%

Source: 2018–20 Home Mortgage Disclosure Act data.

Notes: DTI = debt-to-income. Data are for purchase loan applications for one-to-four-unit housing. Forty-five percent is the Home Mortgage Disclosure Act's top code for DTI ratio, meaning the actual median is likely higher.

A similar trend appears for down payments. The average down payment for a borrower of color in Los Angeles is 14 or 15 percent; for white borrowers, the average is 23 percent.

Low-income borrowers take on more debt relative to income, on average (table 10). The median DTI ratio was also higher for borrowers buying in low-to-moderate-income neighborhoods. Contrary to the DTI ratio, the average down payment was consistent across households. Borrowers in the lowest income quintile in the data averaged higher down payments, possibly because lenders require more money up front from these borrowers to offset the risk of other credit characteristics. But few very low-income borrowers apply for mortgage financing, as it is unlikely these borrowers have the assets for a large down payment.

TABLE 10

Median DTI Ratios and Down Payments in Los Angeles, by Income Bucket

	Median DTI ratio	Median down payment
Neighborhood income		
< 80% of AMI	45%	35%
80-120% of AMI	45%	20%
> 120% of AMI	39%	20%
Household income		
< 80% of AMI	42%	20%
80-120% of AMI	41%	20%
> 120% of AMI	39%	20%

Source: 2018-20 Home Mortgage Disclosure Act data.

Notes: AMI = area median income; DTI = debt-to-income. Data are for purchase loan applications for one-to-four-unit housing. Forty-five percent is the Home Mortgage Disclosure Act's top code for DTI ratio, meaning the actual median is likely higher.

Down payments are significant contributors to the racial homeownership gap (Goodman et al. 2018). Households of color, on average, have less access to wealth for a down payment, even if they are already homeowners. Previous work has highlighted how this ties back to generational wealth, with gifts from parents constituting a large share of down payments for first-time white buyers, a privilege that many buyers of color do not have (Choi, Zhu, and Goodman 2018).⁹⁰

In Los Angeles, differences in wealth by race and ethnicity are more severe than for the US, on average (De la Cruz-Viesca et al. 2018) (table 11). Available data show that median net worth is \$4,000 for Black households, \$3,500 for Mexican American households, \$42,000 for other Hispanic households, and \$355,000 for white households. Further, only 63.2 percent of Black households, 53.8 percent of Mexican American households, and 61.3 percent of other Hispanic households reported owning any liquid assets, compared with 91.6 percent of white households (table 12).

TABLE 11

Net Wealth in the US, by Race or Ethnicity, in 2019

	All	Owners
White	\$189,100	\$299,900
Black	\$24,100	\$113,130
Hispanic	\$36,050	\$164,800
Other	\$74,500	\$299,000
All	\$121,760	\$254,900

Source: 2019 Survey of Consumer Finances. **Note:** White people are non-Hispanic.

TABLE 12 Liquid Assets and Median Net Wealth in the Los Angeles Metropolitan Statistical Area, by Race or Ethnicity, in 2016

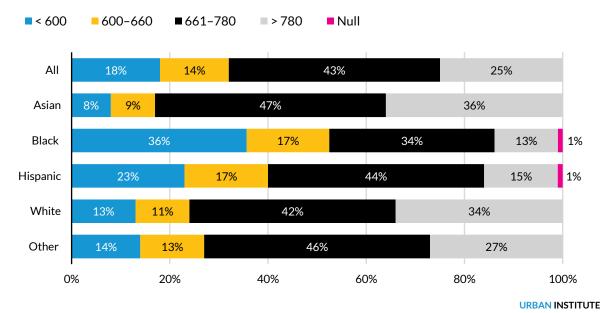
	White	Black	Mexican American	Other Hispanic
Liquid assets	91.6%	62.3%	53.8%	61.3%
Median net wealth	\$355,000	\$4,000	\$3,500	\$42,500

Source: San Francisco Federal Reserve Bank.

Notes: The liquid assets row shows the percentage that possesses any liquid assets. Race and ethnicity categories are pretabulated by the Federal Reserve.

Low credit scores are also a significant barrier to homeownership for households of color (figure 11). Freddie Mac tabulations of credit bureau data show an unequal distribution of credit scores by race and ethnicity in the Los Angeles metropolitan area in 2021. The mortgage market has tightened around credit scores over the past decade; the average credit score required for a purchase loan is 40 points higher than it was before 2008. Loan-level data for agency originations also show that average credit scores increase with the number of units. Borrowers purchasing four-unit buildings had an average credit score as high as 757 nationally and 765 in California. But borrowers purchasing two-unit homes had credit scores comparable with those of single-family borrowers.

FIGURE 11
2021 VantageScores, by Race or Ethnicity, in the Los Angeles Metropolitan Statistical Area



Source: Freddie Mac.

Origination Channel

One implication of credit variations is that households of color rely more heavily on federal lending programs guaranteed by the FHA. In Los Angeles, from 2018 to 2020, 20 and 25 percent of purchase mortgages made to Black and Hispanic borrowers, respectively, came through the FHA (table 13). Comparatively, only 3 percent of both white and Asian borrowers used FHA financing. This distribution is not an anomaly. Nationally, Black and Hispanic homebuyers disproportionately receive lending through low-down payment programs such as the FHA (Choi et al. 2019).

The mortgage channel has implications for accessibility, particularly during periods of robust home sales. During the crux of the COVID-19 crisis, when the housing supply was tight, we saw sellers' enthusiasm for approving FHA loans decrease because requirements associated with these loans increased the time for mortgage approval.⁹¹

TABLE 13

Purchase Mortgages, by Channel and Race or Ethnicity, in Los Angeles

Race or ethnicity	Conventional	FHA	VA or other
Asian	95.5%	3.4%	1.1%
Black	73.6%	20.2%	6.2%
Hispanic	72.4%	24.7%	2.9%
White	96.1%	2.8%	1.1%

Source: 2018-20 Home Mortgage Disclosure Act data.

Note: FHA = Federal Housing Administration; VA = US Department of Veterans Affairs.

Contrary to lending nationally, FHA financing composes a similar share of total originations to low-income households (7.1 percent) and the highest-earning households (7.4 percent), but they are a much bigger factor for moderate-income households (13.3 percent) (table 14). That pattern does not hold for neighborhood income. FHA and VA financing are more common in low-income areas. An important factor influencing origination channel are loan limits. FHA financing has a lower price ceiling than conventional financing, disqualifying much of California's middle-to-upper-tier single-family housing (the ceiling was just over \$765,000 in 2020). This largely influences why the FHA share is so low in high-income neighborhoods where home prices are high.

TABLE 14
Purchase Mortgages, by Channel and Income

	Conventional	FHA	VA or other
Neighborhood income			
< 80% of AMI	84.3%	13.7%	2.0%
80-120% of AMI	89.2%	8.8%	2.0%
> 120% of AMI	96.2%	2.6%	1.2%
Household income			
< 80% of AMI	91.3%	7.1%	1.6%
80-120% of AMI	83.4%	13.3%	3.3%
> 120% of AMI	90.9%	7.4%	1.7%

Source: 2018-20 Home Mortgage Disclosure Act data.

Note: AMI = area median income; FHA = Federal Housing Administration; VA = US Department of Veterans Affairs.

Among the lowest-income households, there are fewer very low-income mortgage borrowers than any other category, making these averages more susceptible to outliers. Total loan originations between 2018 and 2020 to very low-income borrowers made up only 4 percent of total originations to the borrowers earning above 120 percent of the area median income.

With the loosening of legal barriers to infill housing, accessible financing tools will be key to increasing new supply. But current financing options point to an uneven playing field, leaving low-income households and households of color at a disadvantage, whether they are current owners who might add units or prospective buyers of those units. Without policy intervention, California's SB 9 risks widening the racial wealth gap by increasing the value for existing homeowners who can afford to use savings or home equity to finance future construction. But SB 9 can be an opportunity to promote equity. Combining new housing stock with an intentional focus on racial equity can offer wealth-building opportunities for more low-income households and households of color.

Affordability

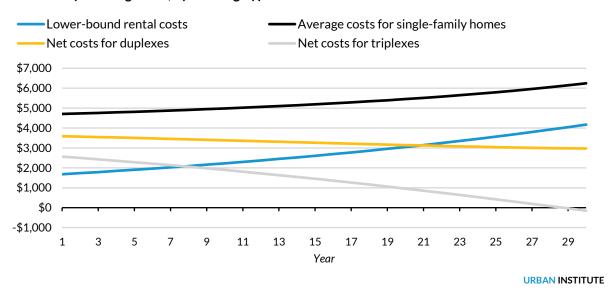
If a household can overcome the barriers to obtaining financing, it must consider whether the ownership costs of infill housing are affordable relative to alternative housing options. To compare affordability of different housing types, we can look at the difference in average monthly costs that households pay over 30 years (Loftin 2021). The appendix provides a detailed affordability analysis comparing various homeownership types and renting options in Los Angeles. Two key takeaways are as follows (two additional takeaways appear on subsequent pages):

1. The average monthly housing costs for an owner-occupied average-price one-unit single-family home in Los Angeles are greater than renting but become more affordable over time.

2. Net monthly housing costs for an owner-occupied two-to-three-unit building are more affordable than for one-unit single-family ownership and, for the majority of the 30-year period, are more affordable than renting.

Figure 12 shows the monthly housing costs associated with owning two- and three-unit buildings compared with renting and owning a one-unit single-family home. Because of the money generated from rents, the monthly costs of owning a duplex and triplex are lower than they are for owning a one-unit single-family after 30 years. In fact, owning a triplex is more affordable than renting after seven years and generates income after 29 years.

FIGURE 12
Net Monthly Housing Costs, by Housing Type



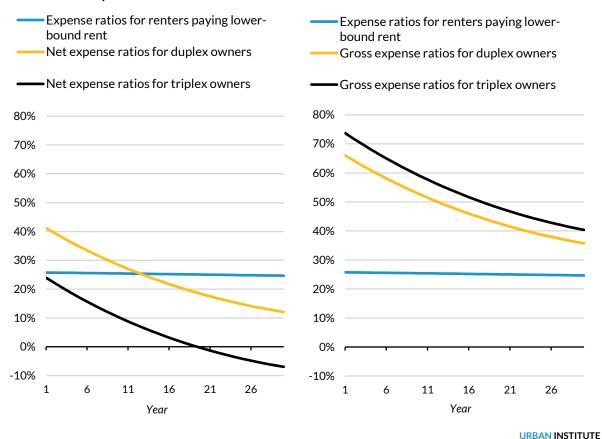
Source: Urban Institute calculations.

3. For a median-income household, expense ratios associated with owning two- and three-unit housing can be prohibitive in the short run if the revenue from renting is not deducted from housing costs.

The share of income spent on housing for owners of two-to-three-unit buildings decreases rapidly because of the increased revenue from rising rents (figure 13). But there are significant differences depending on whether rental income is considered. When rent is not considered, gross expense ratios for two-to-three-unit housing in the first year are between 66 and 75 percent. When rent is considered, net expense ratios are lower and, in fact, drop below renting for the duration of the 30 years.

FIGURE 13

Gross and Net Expense Ratios



Source: Urban Institute calculations.

4. Adding an ADU to an average-price one-unit single-family home lowers monthly housing costs over the duration of ownership but remains more expensive than renting.

Solutions

Finance the Development of New Infill Housing

Below are several solutions for financing low-density infill housing, including ways to reduce costs, improve underwriting, and reduce risks associated with construction to increase lenders' willingness to invest.

REDUCE COSTS

There are several ways to decrease operational costs. For example, CalHFA established an ADU grant program 92 that offers up to \$25,000 in reimbursement of predevelopment costs associated with ADU construction. The program aims to increase ADU construction by reducing the amount needed for financing. The predevelopment grant is set up to be paired with a renovation loan, and so far, the agency has onboarded six originators to handle these loans. All lenders use one of the major agency renovation loan programs, such as the FHA's 203(k) program and Fannie Mae's HomeReady program. In Oregon, policymakers have used tax credits to lower the costs associated with construction (see chapter 2). Finally, the state government and local governments can offer special reductions in predevelopment costs or permitting fees for infill housing construction as an incentive to build.

There are also ways to reduce operational costs during construction that can be cost-prohibitive on smaller projects. For standard designs, Fannie Mae and Freddie Mac could loosen guidelines for building ADUs or two-to-four-unit building conversion to simplify the process and reduce costs. For construction and renovation loans, the GSEs could also consider automating the oversight process or financing only with a licensed general constructor without relying on consultants to lower oversight costs. 93

DECREASE CONSTRUCTION COSTS

Alternative construction methods to stick building offer more affordable options without reducing value. Modular and manufactured ADUs can lower costs by reducing labor costs and taking advantage of economies of scale. Local governments should accommodate manufactured and modular homes and make sure the housing code does not prohibit it. The average sales price per square foot, excluding land value, for manufactured homes in 2020 was \$60, compared with \$124 for site-built homes. For modular and panelized homes, the average price was \$100 (Kaul, Goodman, and Neal 2021).

RECOGNIZE FUTURE RENTAL INCOME AND VALUATION

Both GSEs have programs for low-income households (Fannie Mae's HomeReady⁹⁴ and Freddie Mac's Home Possible⁹⁵) that provide mortgages that partially incorporate rental incomes generated from primary residences, including ADUs, in underwriting. But this is only when there is already a unit that generates rental income. We encourage the GSEs to incorporate the expected rental income from the newly created housing so borrowers can get better access to capital for construction. Because expected rental income is a projected number and involves uncertainty, the GSEs could consider including a portion of the projected value (e.g., 60 to 80 percent of the projected income). Adjusting the property's value to reflect the added value will also be beneficial.

INTRODUCE PILOTS, CREDIT ENHANCEMENT, AND RISK SHARING

Pilot projects could help lenders better evaluate the risks associated with such changes. The Chan Zuckerberg Initiative's ADU pilot in Oakland provides loans developed by Self-Help Credit Union, which incorporates future rental income in underwriting along with philanthropic credit enhancement to protect the lender against greater risk. Additionally, for low-income households and households of color, who face greater challenges accessing capital, examining alternative credit data, such as cash flow data, could be helpful.

Lenders are less willing to finance low-rise infill housing because of the risk they have to bear before construction is complete. A loan guarantee program where the risk is transferred to local governments, CDFIs, or nonprofit organizations could allow more borrowers and lenders to enter this space. For example, in Oakland, the Chan Zuckerberg Initiative, LA Genesis, and other philanthropic capital sources are the credit enhancement to extend the program's reach and impact to low-income homeowners. In the long run, more private capital needs to flow into low-rise infill housing development so more homeowners can participate.

INTRODUCE FINANCING INCENTIVES AND NEW LOAN PRODUCTS

If the city wants to increase the number of affordable rental units in the market and increase the share of low-income homeowners who can participate, it might consider providing financial incentives and creating new loan products. Deferred payments, interest rate reductions, and property tax abatement are possible options.

Innovative loan products tailored to low-density infill housing construction could increase participation. Several programs provide forgivable loans or interest deductions for ADU construction, especially if the new housing is built for very low-income residents. For example, the Los Angeles County Second Dwelling Unit Pilot Program, ⁹⁶ which launched in August 2017, offers homeowners \$75,000 for new ADU construction and \$50,000 for ADU rehabilitation. The county offered a subsidy with a condition that the homeowner house people transitioning out of homelessness for at least 10 years. The Pasadena Second Unit ADU program, ⁹⁷ which launched in October 2020, provides up to \$150,000 in financing for new ADU construction with a 1 percent interest 3-year loan or up to \$75,000 in financing for renovating existing ADUs with a 1 percent interest 20-year loan. The ADU must be rented out to Section 8 voucher holders for at least seven years. This is similar to the Los Angeles ADU Accelerator Program, ⁹⁸ which stipulated that the ADU would be rented to a Section 8 voucher holder for five years.

Although the program aimed to provide rent guarantees to lenders and to expand the supply of affordable housing to low-income households, the take-up rate for these programs is low. Program administrators worry that requiring owners to develop ADUs and then operate Section 8 housing is too much to ask. For these types of loans to be offered at a large scale, more subsidies are needed in this space, as well as more owners willing to become Section 8 landlords, but successful examples could lead to a greater flow of money.

Property tax abatement will require changes in regulations and estimations of newly built affordable low-density infill housing that will benefit from tax reductions. But the city could adjust the tax exemption codes to provide tax incentives to homeowners and developers who rent at a belowmarket rate.

PROVIDE OTHER FINANCIAL SUPPORT FOR HOME REPAIRS AND IMPROVEMENTS

Los Angeles County has several programs to help low-income homeowners make home improvements, ⁹⁹ but homeowners living in the City of Los Angeles have limited options. The Los Angeles Handyworker program ¹⁰⁰ makes limited emergency repairs for very low-income seniors and homeowners with disabilities; there is also a lead remediation program. The county's Single Family Home Improvement Program ¹⁰¹ is not available to most residents in the city. Several federal funding sources can be used for home improvement. Any creation or expansion of a single-family home improvement program could allow conversions to ADUs or JADUs to be an eligible cost.

ALLOW FOR COLLECTIVE FINANCING

Once more streamlining and standardization takes place, construction for ADUs and two-to-four-unit buildings can be bundled together for collective financing, especially for construction projects that have similar designs and are near each other. Instead of financing one unit at a time, several units can be bundled into a larger project and obtain financing together. Also instead of hiring multiple contractors, a group of homeowners could hire one or two contractors to lower operational costs. The larger size is likely to attract more lenders and investors, as the profits are higher and the risk is diversified. Although this type of financing is not yet available for low-density infill housing, other industries offer models. For example, the Mount Pleasant Solar Cooperative ¹⁰² has lowered the cost of financing solar technology by clustering multiple applications into a single project.

PROVIDE EDUCATION AND CONSUMER PROTECTION

Homeowners are likely to struggle to figure out what their best financing option is to build low-density infill housing. Homeowners with low incomes, wealth, and home equity are likely to need multiple

financing tools to fund the new construction, which makes it even more complicated. The private concierge services that provide technical assistance to homeowners cost \$30,000 to \$50,000. These services help homeowners find the best permitting, contractor, and design options and facilitate the permitting processes, which can be overwhelming to homebuyers who have no experience in these areas. A growing number of technology companies provide concierge services to help owners build and finance ADUs. Maxable, ¹⁰³ based in California, assists homeowners throughout the process of building an ADU, including financing, permitting, and construction management. As more companies provide these services and the demand for ADU construction grows, service fees are expected to decline. Nonprofits and public entities could also enter this space and provide similar services to low-income households at lower costs. San Mateo County launched a One Stop Shop program ¹⁰⁴ that helps homeowners (with no-cost support from the nonprofit Hello Housing) with designing, permitting, and project management involved with building a second unit. Its website also allows homeowners to estimate the detailed costs of financing a second unit and the expected revenues it will generate.

There also has been an increase in predatory lending practices. Our interviewees described instances where realtors and contractors visit homes in low-income neighborhoods, persuade the owner to build an ADU, and introduce them to a lender who will entice them into taking a high-interest loan. This could lead to a significant wealth loss and needs to be prevented. Neighborhood Housing Services of Los Angeles County¹⁰⁵ has used media platforms to make consumers more aware of these practices, but more outreach is needed, as the pandemic-related pause in these predatory activities is receding. Helping people access the correct information related to financing low-density infill housing will become more critical as the volume of ADUs increases, as well as creating consumer protection regulations that discourage bad behavior.

OFFER HOUSING COUNSELING

Increasing funding for housing counseling and making counselors available to prospective buyers would help buyers navigate the financing process and prepare them to become landlords. Counseling can also help prospective buyers avoid scams, as counselors can provide feedback on financing offers that may be predatory. As ADUs and two-to-four-unit housing become more common, housing counselors will need to expand their own education and training to offer unbiased advice about construction, financing, and becoming a small landlord. Although individual organizations have such programs around the country, the City of Los Angeles, perhaps working with the state and the US Department of Housing and Urban Development (HUD), could help develop education and counseling materials for owners and purchasers of low-rise infill housing.

Finance Access to Homeownership

ALLOW ALTERNATIVE CREDIT

Adopting and promoting credit scoring practices that leverage information that traditional consumer credit reports do not use could qualify significantly more prospective homebuyers in Los Angeles. One alternative method that is gaining traction is the inclusion of consumer-permissioned data on cash flows, such as rental and utility payments. Evidence suggests a significant share of consumers without credit scores or who have very low scores, a group that is disproportionately Black and Hispanic, could improve their credit prospects with cash-flow history. ¹⁰⁶ This alternative received attention in the mortgage underwriting space when Fannie Mae introduced a feature in its automated underwriting system to incorporate rental history. ¹⁰⁷

PROVIDE DOWN PAYMENT ASSISTANCE

For the households of color and low- and moderate-income households that lack the liquid assets for a down payment, having access to external funds is a key bridge to homeownership. Down payment assistance programs, in the form of a grant or a low-interest affordable loan, offer a crucial opportunity for helping low-income and first-generation owners achieve homeownership.

Los Angeles residents have access to three primary down payment assistance programs:

- 1. The City of Los Angeles offers down payment assistance programs in the form of an interest-free subordinate loan for both low- and moderate-income first-time homebuyers. ¹⁰⁸ These programs require borrowers to put down at least 1 percent of the home's value, as long as the remaining balance of the home purchase does not exceed program maximums (\$90,000 for low-income buyers and \$60,000 for moderate-income buyers). Los Angeles's down payment programs are available only for single-family owner-occupied properties (with one to four units) but exclude renovation financing for ADUs and lot splits.
- 2. The Los Angeles County Development Authority offers down payment assistance through its Home Ownership Program. ¹⁰⁹ The program offers up to \$85,000 or 20 percent of the purchase price (whichever is less) and has a first-time buyer requirement. The program applies to single-family homes, condominiums, and town homes inside Los Angeles County priced up to \$585,000.
- CalHFA also offers down payment assistance through the MyHome Assistance program.¹¹⁰
 Similar to the Los Angeles program, MyHome Assistance also contains first-time homebuyer, income, and owner-occupancy requirements. But the MyHome Assistance program does

include provisions for financing ADUs in certain circumstances. CalHFA offers up to 3.5 percent down for loans originated through the FHA and 3 percent down for conventional financing.

Although the current slate of down payment assistance options provide some flexibility, none of these programs were established with infill housing options in mind. In particular, property value maximums associated with down payment assistance programs (the highest being \$750,000 under the Los Angeles program) excludes many properties with ADUs and two-to-four-unit homes, which, though more affordable per unit, can be more expensive than one-unit single-family options in comparable markets.

The City of Los Angeles or the State of California should develop down payment assistance programs to accommodate new infill housing. The CalHFA ADU grant program, which functions like a down payment but covers only closing costs, is an example of infill-specific assistance. The City of Los Angeles should consider a down payment program that emphasizes higher maximums for two-to-four-unit homes, options for existing homeowners to purchase new homes, and the ability to pair major renovation loan programs.

ADDRESS SPECIFIC FINANCING FRICTIONS IN FHA AND GSE PROGRAMS

Households of color are more likely to access mortgage capital via the FHA, but it is getting harder to access capital through this channel because of increased competition in the tight housing market. Keeping government lending channels open for borrowers during all periods of rapid economic expansion will level the playing field for borrowers of color. HUD should offer a streamlined version of FHA and VA loans that relieve pressure from the lender and encourage government lending. Options for streamlining include the following:

- The FHA and VA could more closely align their rules with those of Fannie Mae and Freddie Mac so government loans are no longer at a disadvantage.
- HUD and the VA could consider simplifying home inspection for standardized developments.
- Similarly, HUD and the VA could consider making appraisal requirements more flexible, using the same rules that currently apply to GSE mortgages.

5. Conclusions and Recommendations

Senate Bill 9 has given Los Angeles an opportunity to expand its housing supply. The changes will not affect all residents equally. A key challenge for the city is to make sure the changes benefit most people and neighborhoods and cause as little harm as possible, especially to the most vulnerable residents. Throughout this report, we have made recommendations for government and private intervention to shape future growth. In this chapter, we outline five overarching recommendations.

1. Clarify and Communicate the Goals and Impacts of Low-Rise Infill Housing Policies

The voices for and against SB 9 remain loud and argumentative. Some of the reasons for and against the bill are available in chapter 1. Other cities and states selected more focused rationales for the changes. Some, such as Minneapolis, highlighted the racial inequities of historical zoning patterns, and others, such as Portland, focused on the need for housing to accommodate older and single adults (see chapter 2).

The biggest housing need in Los Angeles is more housing. Lack of supply is a key driver of the city's housing challenges. More housing, of all types, for all income levels, is sorely needed. The city's changing demographics have created a mismatch between housing needs and the types of housing available. In particular, housing for seniors, single adults, homebuyers, households with low and moderate incomes, households in overcrowded conditions, and households of color have fewer opportunities to find housing that meets their needs.

Single-family-zoned land use, covering 75 percent of the city's land area, is a rigid and exclusionary barrier to more flexible and affordable housing types. Informed implementation of SB 9 can address housing needs.

Communicate Local Needs and Goals Clearly

The recent dialogue relies on SB 9 to achieve multiple goals, ranging from filling the Regional Housing Needs Assessment goals to addressing homelessness. We suggest the city communicate the goals it

wishes to achieve through SB 9 and develop supportive policies and programs to achieve those goals. We suggest the following goals, which arise from the greatest housing needs in Los Angeles today:

- Increase housing choice for both owners and renters.
- Address racial disparities (e.g., homeownership, segregation, and underinvestment).
- Focus policy efforts to assist groups with the greatest housing needs: low-income households, households of color, seniors, single adults, and households seeking homeownership opportunities.

The opportunity to create more racially equitable housing in Los Angeles is important. Single-family-zoned land use is a rigid and exclusionary barrier to flexible and affordable housing types.

Informed implementation of SB 9 can address historical exclusionary policies, including zoning and redlining, that have created segregated and inequitable residential patterns. Policy tools to implement SB 9 must account for the inequitable housing landscape and provide greater opportunity and choice to low-income people of color most harmed by these policies.

Track the Positive and Negative Effects of Additional Low-Density Housing

- Maintain accurate data and publish data analyses showing how the new laws affect lot splits,
 ADU development, and new two-to-four-unit activity in Los Angeles. The city should track the quantity of construction activity and the location of completed units.
- Create a community engagement vehicle to get on-the-ground reports of the implementation of programs involving low-rise infill housing.
- Research the effectiveness of state and city protections against involuntary displacement.
- Disseminate positive examples of new construction, and include them in the Standard Plan
 Program and updates to the city's design challenge website.

2. Learn from Other Jurisdictions

Jurisdictions within and outside California offer examples of the effects of different policy and program choices.

Monitor the Effectiveness of Different Legislative and Programmatic Choices, Noting Provisions That Are Critical for Achieving Greater Choice, Promoting Racial Equity, and Addressing Critical Housing Needs

- Monitor the impacts of flexible provisions of other jurisdictions' laws, which may permit smaller lot splits, triplexes, or even fourplexes in single-family zones.
- Monitor the lack of parking and owner-occupancy requirements for low-rise infill housing in other jurisdictions.
- Explore fee structures and construction requirements in different cities, and analyze whether
 to link lower fees and reduced barriers to a commitment by the owner to make the new housing
 affordable.
- If results warrant, consider adopting provisions to further expand the types of housing and lot splits permitted in single-family zones.

Create an Explicit and Detailed Racial Equity Plan to Set Out Racial Equity Goals of Policy Interventions, and Monitor Success against Those Goals

Seattle, Portland, and Minneapolis offer models.

Consider Policies and Programs to Support Construction of Smallplexes (More Than Two Units) in Addition to ADU Assistance

 Financing and permitting tools are different, and Los Angeles can encourage the construction of high-density units beyond ADUs. Oregon's legislation and Portland's RIP program demonstrate how Los Angeles can support slightly larger infill housing.

3. Empower Residents through Listening, Education, and Awareness

Owners, first-time homebuyers, tenants, small contractors, and all residents need to understand the new policies and programs; they can also provide early intelligence about problems and scams. The city should share knowledge directly and through nonprofit technical assistance providers and should provide venues for residents to inform the city as the programs are implemented.

Engage in Two-Way Dialogue with Communities on Low-Rise Infill Housing

- Provide community engagement vehicles for neighborhoods to report field-level observations
 to the city, and encourage residents to elevate both positive and negative examples of new lowrise infill housing.
- Expand program 67 of the Housing Element to incorporate feedback from the community as well as information to the community (City of Los Angeles 2021, chapter 6).

Provide an Information Center for Homeowners Who May Wish to Add Units to Their Properties

- Because SB 9 permits duplexes and ADUs, expand content on city websites to address duplexes and lot splits.
- Provide funding to develop housing education and counseling programs to reach owners who are considering building an ADU or duplex.
- Create a homeowners' information center that consolidates city, county, and state assistance for owners in the city.
- Provide step-by-step instructions of the process to assess feasibility, obtain financing, and construct an ADU or duplex or complete a lot split.
- Fund education programs for small landlords, addressing tenants' and landlords' rights and responsibilities similar to the Property Management Training Program described in program 44 of the Housing Element.
- Provide technical assistance for owners, especially low-income owners, through financing and construction. Maintain scam alerts.
- Educate owners and homebuyers on legal options to create new homeownership units, including land trusts, tenancies in common, and condominiums.

Provide an Information Center for Homebuyers

 Support existing homebuyer education and counseling programs to incorporate information about purchasing a property with an ADU or a duplex.

Provide an Information Center for Tenants

 Support programs to educate renters about the rights and responsibilities of tenancy and techniques to improve credit, increase savings and income, and manage expenses.

4. Understand the Current Housing Supply Landscape

Invest in High-Quality Data Collection and Analysis

- For ADUs and JADUs, publish the total number of new units permitted to begin construction and the total number of new units completed each year. Create a new field to capture ADU activity rather than relying on text box input. Map activity both within single-family zones and in existing multifamily zones. Include ADU permitting and completion data on program 47 (housing production dashboards), as updated by the Housing Element (City of Los Angeles 2021, chapter 6).
- Collect and analyze data on permitting and construction for two-to-four-unit buildings. Map
 activity both within single-family zones under SB 9 and in existing multifamily zones. Share data
 with communities as part of program 49 of the Housing Element (targeting zoning allocations
 by community plan area).
- Collect and analyze data on lot splitting to measure SB 9's impact on the production of new ownership and rental housing.

Ensure New Housing Will Support Current Residents' Stability

- Monitor the impact of new construction on rent increases and involuntary displacement through program 122 of the Housing Element (antidisplacement strategies).
- Protect low-income communities of color from displacement, and encourage neighborhoodbased direct investment to low- and moderate-income communities of color.
- Develop materials for Housing Element programs 84 through 90 that are customized to lowrise infill ownership and renter needs. Increase the scope of program 90 to consider a tenant or community opportunity to purchase homes with ADUs.

Reduce Friction and Costs Involved with the Construction Activity Homeowners Undertake

- Reduce construction and operational costs by streamlining or reducing permitting and operating costs.
- Explore construction that uses modular or factory-built homes; include these in the ADU
 Standard Plan Program, and include education for owners on factory-built housing.¹¹¹
- Expand existing home repair programs such as the Handyworker program to include ADU and duplex construction and repairs.¹¹² Consider eligibility for low-income owners in addition to senior homeowners.

Guide Construction Activity to Reinforce Other Policy Goals

- Support minority and small home repair contractors to build their capacity to develop new
 ADUs and duplexes under SB 9, as well as triplexes and fourplexes in allowable areas.
- Support innovations in subdivisions as noted in program 3 of the Housing Element. Expand legal, regulatory, and technical assistance to support missing middle housing types (three or more units), as outlined in Housing Element program 103.
- Support owner, purchaser, and renter education. Homeowners should learn how to finance, supervise construction, be a responsible landlord, and avoid scams. Education can include examples of green, sustainable building practices and energy efficiency and water conservation, as described in Housing Element programs 74 and 76.
- In addition to Housing Element program 4, explore shared equity housing programs and pilot innovative ownership models (e.g., tenancy in common, limited equity cooperatives, and condominiums) to identify whether these offer a path to affordable homeownership using ADUs and duplexes (City of Los Angeles 2021, chapter 6). Provide financial and technical support for promising models, and educate owners and tenants about their benefits.

5. Provide Access to Financing for Owners, Homebuyers, and Renters

Create and Support Innovative Financing Tools to Give Low-Income Homeowners the Opportunity to Modify Their Properties

- Monitor and expand existing programs such as CalHFA's ADU Grant Program to subsidize predevelopment costs for owners willing to add units to their properties.
- Support private or public-private pilot programs to provide credit enhancement to finance
 ADUs and duplexes by underwriting a portion of planned rental income or underwriting against the developed property's future value.
- Encourage lenders to share performance data for loan programs with owners who wish to construct ADUs or duplexes on their property under SB 9.
- Collect information on property value increases associated with the addition of an ADU or duplex on an existing property.
- Provide direct support or subsidies for projects that commit to provide affordable rental or ownership opportunities.

Expand Opportunities for Purchasers to Buy Properties Newly Developed for Ownership

- Expand down payment assistance to include proportional assistance for two-to-four-unit homes or homes with ADUs.
- Create pilots for alternative ownership models, and share best practices with current and future owners.
- Provide funding for housing counseling agencies to expand prepurchase housing counseling to address financing options for purchasing a property with an ADU or duplex. Include landlord education for new, small landlords.

Expand Renters' Capacity to Improve Their Housing Situation

- Expand housing counseling for renters to address budgeting, credit, and savings barriers to obtaining new rental housing.
- Expand housing counseling agencies' capacity to provide rental counseling in Los Angeles.
- Incorporate antidisplacement and tenant protections into renter education and counseling programs.

Appendix A. Housing Affordability

Housing Affordability Analysis

To compare affordability of different housing types, we can look at the differences in the average monthly costs households pay (Loftin 2021). In this section, we calculate and compare the differences in monthly housing costs between various homeownership and rental options.

Table A.1 provides our base assumptions for this analysis. We compiled upper- and lower-bound estimates for different housing costs, including rent, one-unit single-family home values, and the value of several infill housing types. We also pulled average costs associated with homeownership, which we used to calculate monthly homeownership payments.

TABLE A.1
Assumptions for the Los Angeles Metropolitan Statistical Area

	Average cost or	
Variable	percentage	Source
One-unit single-family home value (median)	\$765,000	2020 Home Mortgage Disclosure Act data
One-unit single-family home value (bottom quintile)	\$421,978	Black Knight (data as of January 2020)
Rent (lower bound)	\$1,679	2019 American Housing Survey (median)
Rent (upper bound)	\$2,474	Zillow Observed Rent Index (data as of January 2020)
Two-unit home value (median)	\$805,000	2020 Home Mortgage Disclosure Act data
Three-unit home value (median)	\$875,000	2020 Home Mortgage Disclosure Act data
ADU construction cost (average)	\$150,000	ADU California
Inflation (annual)	1.73%	Bureau of Labor Statistics
Rent inflation (annual)	3.19%	Bureau of Labor Statistics
Wage growth (annual)	3.37%	Bureau of Labor Statistics
Note rate	One unit: 3.84% Duplex: 4.22% Triplex: 4.32%	Primary Mortgage Market Survey (average 2011–21) and eMBS
Renovation loan rate	4.50%	2020 Home Mortgage Disclosure Act data
Base maintenance cost (monthly)	One unit: \$83	2019 American Housing Survey
Property tax rate	1.16% * Property value	Los Angeles County
Insurance	0.002% * Property value	2019 American Housing Survey
Median family income	\$77,300	2020 Federal Financial Institutions Examination Council data
Down payment	20.0%	N/A
Forgone returns on investment	7.0% * Down payment	Authors' calculations
Year-over-year home price growth	7.50%	Black Knight HPI
Single-family rental vacancy rate	4.5%	Morningstar

Note: ADU = accessory dwelling unit.

Monthly homeownership costs assume a standard 30-year conventional mortgage with a fixed interest rate and 20 percent down. The 20 percent down payment is the minimum loan-to-value ratio allowed for two-to-three-unit purchase loans under Fannie Mae's eligibility matrix (Fannie Mae 2021). The mortgage interest rate is derived from the average Primary Mortgage Market Survey rate over the past decade. To account for rate differences for multiunit homes, we calculate the difference in average rates for mortgages backed by one-unit and two-to-three-unit properties using proprietary loan-level data for California and apply this difference to the rate. We assume a base year of 2020 for home prices.

To calculate property taxes, we apply the average property tax rate for Los Angeles County in year 1 and increase it 2 percent each year. California state law Proposition 13 caps year-over-year property tax increases at 2 percent. We estimate annual insurance costs to be 0.2 percent of the home's value and increase this each year by the average year-over-year home price increase in Los Angeles from the past decade (7.5 percent).

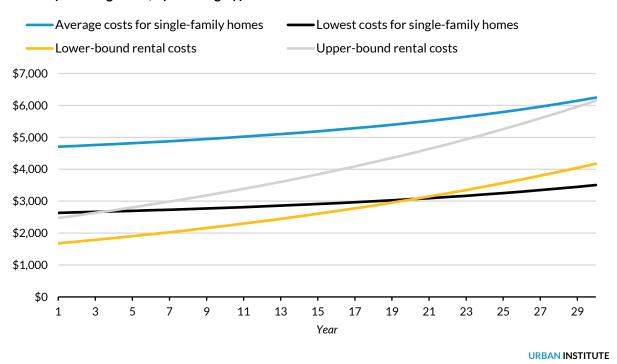
Because rents increase faster than general inflation, we use the average national rent price increase over the past 10 years to adjust rents. For income, we also use average national wage growth from the past decade. For property maintenance, we use the median costs of maintenance and repairs in Los Angeles from the American Housing Survey and add 6 percent of monthly rent (a basic estimate for landlord repairs) for the two-to-three-unit estimates. We increase the base maintenance costs by the average general inflation rate each year.

Finally, as part of ownership costs, we include the opportunity cost of placing a down payment represented as the forgone returns had those funds been invested in the market and earned average returns. In our expense ratio calculations, we apply these forgone returns by adding them to the renter's income.

The Average Monthly Housing Costs for an Owner-Occupied Average-Price One-Unit Single-Family Home in Los Angeles Are Greater Than Renting but Become More Affordable over Time

Figure A.1 compares the average monthly housing costs of renting and owning a one-unit single-family home in Los Angeles over 30 years. Purchasing an average-price one-unit single-family home results in higher monthly payments than both the upper- and lower-bound estimates of rental costs, after assuming total costs. But if an owner can purchase a single-family home from the market's lowest tier, the affordability differences are significant. After four years, the costs of owning a low-price home is less than the upper-bound rent estimate, and this difference increases to about \$2,600 a month after 30 years. But low-price home purchases may come with increased maintenance costs, and the supply of these homes is limited.

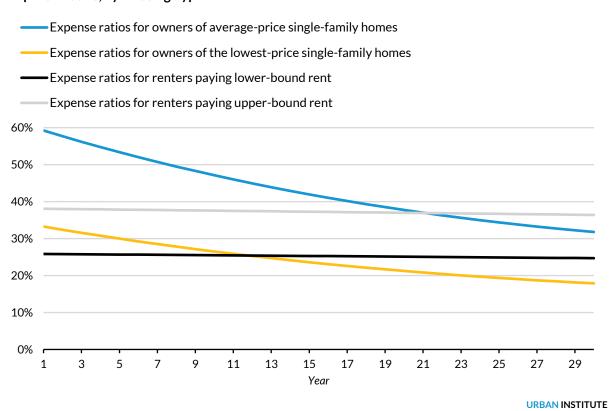
FIGURE A.1
Monthly Housing Costs, by Housing Type



Source: Urban Institute calculations.

Figure A.2 compares the same housing types from figure A.1 through the perspective of monthly housing costs relative to income, or the housing expense ratio. Here, we assume the Federal Financial Institutions Examination Council's 2020 median income for Los Angeles of \$77,300. The figure shows that housing expense ratios decrease significantly faster for homeowners because of the impact of a locked monthly mortgage payment combined with wage increases.

FIGURE A.2
Expense Ratios, by Housing Type



Source: Urban Institute calculations.

The median DTI ratio in 2020 for home purchase mortgages in Los Angeles was 37 percent. With an estimated 59 percent expense ratio, the borrower represented by the blue line in figure A.2 is not likely to get approved for financing on an average-price home. In fact, to have a housing expense ratio of 37 percent, a borrower would have to earn about 160 percent of the median income. And given that the borrower likely has other debt obligations, they would have to earn even more than that to have the median DTI ratio of 37 percent.

Net Monthly Housing Costs for an Owner-Occupied Two-to-Three-Unit Building Are More Affordable Than One-Unit Single-Family Ownership and, for the Majority of the 30-Year Period, Are More Affordable Than Renting

Duplexes and triplexes are more expensive to purchase, on average, than one-unit single-family homes. But if the vacant units are rented at market value, the benefits to affordability are massive.

To calculate monthly housing costs for two-to-three-unit housing, we assume the owner occupies one unit and rents the remaining units (we use the lower-bound estimate here), factoring in an average vacancy rate of 4.5 percent. Our calculation for net monthly costs subtracts the monthly rent charged on nonoccupied units from the total monthly housing cost, assuming the owner puts the total rental income toward the home. The mechanics are laid out in box A.1.

BOX A.1

Net Monthly Infill Housing Cost Calculation

```
Net monthly infill cost = (P&I + T + M + FI) – (R)

where

P&I = principal and interest

Y = year

T = taxes, or ((Home value * 0.016) / 12 * (1 + 0.02) ^ Y)

I = insurance, or ((Home value * 0.002) / 12 * (1 + 0.075) ^ Y)

M = maintenance, or ((Base maintenance costs * (1 + 0.0173) + (Rent * 0.06 * Rental units))

FI = Forgone investment, or ((0.20 * Home value) / 12 * 0.07)

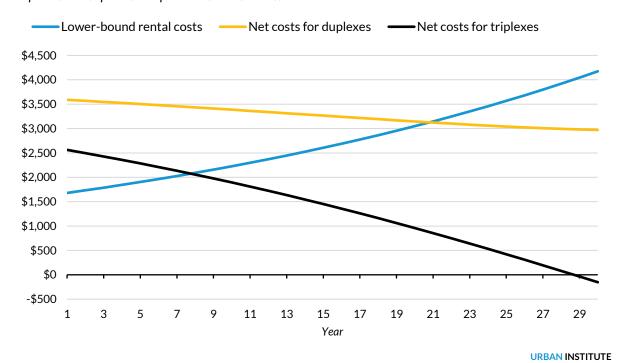
R = Rental income, or (Rental units * (Rent * (1 - Single-family rental vacancy rate)))
```

Figure A.3 shows the monthly housing costs associated with owning two- and three-unit buildings compared with renting. Because of the money generated from rent, the monthly costs of owning a triplex is lower than renting for most of the 30-year period. In fact, three-unit homes generate income after 29 years. The costs of owning a duplex, however, do not become lower than rental costs until after 21 years, showing the benefits of having multiple units generating rent.

FIGURE A.3

Net Monthly Housing Costs, by Housing Type

Duplexes and triplexes compared with rental units



Source: Urban Institute calculations.

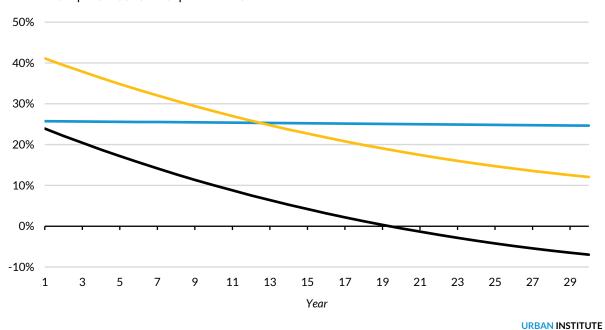
These benefits are also reflected in expense ratios. The share of income spent on housing for owners of two-to-three-unit housing decreases rapidly because of the increased revenue from rising rents. Because of the revenue generated after 20 years, relative to the fixed cost of the mortgage, the owner of a triplex has a negative housing expense ratio (i.e., the money the owner earns on rents is greater than housing costs). Because we include forgone investments from the down payment as part of renter income in the expense ratio calculations, these ratios show two-to-three-unit ownership generating income earlier than in the monthly cost calculations.

FIGURE A.4
Expense Ratios, by Housing Type

Duplexes and triplexes compared with rental units

Expense ratios for renters paying lower-bound rentNet expense ratios for duplex owners

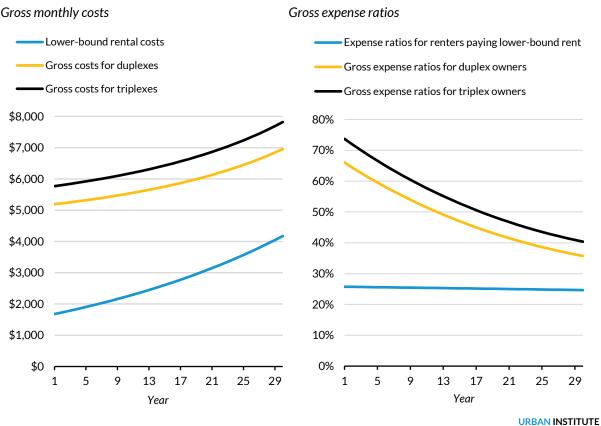
Net expense ratios for triplex owners



Source: Urban Institute calculations.

If we remove the income generated from rent and show only total monthly costs (gross housing costs), the expense ratios associated with owning two- and three-unit housing appear prohibitive in the short run (figure A.5). When rent is not considered (gross costs), the expense ratios for two-to-three-unit housing in the first year are between 66 and 75 percent, significantly above the Los Angeles median DTI ratio on purchase mortgages. When rent is considered (net costs), expense ratios are much lower and in fact remain below expense ratios for renters for the duration of the 30 years (figure A.4).

FIGURE A.5
Gross Monthly Housing Cost Comparison



Source: Urban Institute calculations.

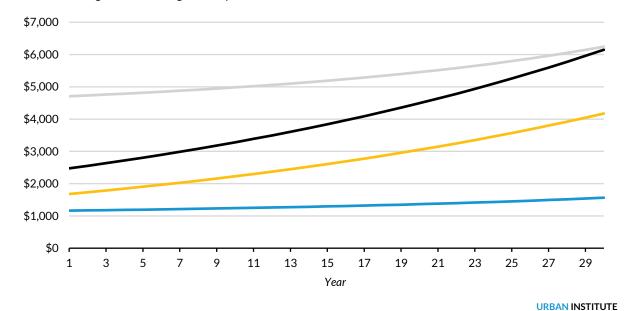
It is worth thinking about the affordability of buying a single unit in a two-to-four-unit building. This scenario is less likely given the legal complications of "condo-izing" units in two-to-four-unit buildings, but the affordability benefits are significant. Property records data shows that one unit in a two-to-four-unit building is less expensive than a single-family home. The result is a much lower monthly payment for owning the single unit rather than renting, both relative to the upper- and lower-bound estimates of rental prices and when compared with average single-family ownership (figure 6).

FIGURE A.6

Monthly Housing Costs, by Housing Type

Single units in multiunit buildings compared with single-family homes and rental units

Average costs for one unit in a two-to-four-unit building
Lower-bound rental costs
Upper-bound rental costs
Average costs for single-family homes



Source: Urban Institute calculations.

Adding an ADU to an Average-Price One-Unit Single-Family Home Lowers the Monthly Housing Costs over the Duration of Ownership but Remains More Expensive Than Renting

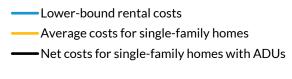
Building an ADU offers an opportunity for homeowners to reduce monthly housing costs. The average cost of constructing an ADU in California is \$150,000. In the examples below, we assume the owner finances the ADU with a renovation loan, which tend to carry high interest rates. Access to financing often relies on homeowners having enough equity in the current home to cash out or having access to other wealth (see chapter 4).

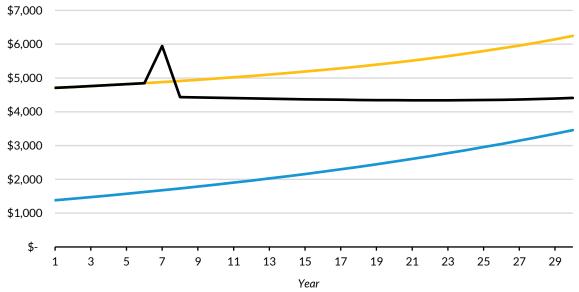
Figure A.7 shows monthly costs if the owner of an average-price one-unit single-family home builds an ADU in the sixth year of their 30-year mortgage (we assume the sixth year is 2020). If construction and finding a tenant takes a year, the monthly costs increase in the sixth year but decline long term because of revenues from rent. The expense ratio (figure A.8) reflects this as well. In both examples, we

see that an ADU can close the monthly affordability gap between owning an average-price single-family home and renting. The benefits of renting an ADU are particularly clear near the end of the mortgage, as rent increases keep the increasing costs of ownership to a minimum.

FIGURE A.7

Monthly Housing Costs, by Housing Type





URBAN INSTITUTE

Source: Urban Institute calculations.

FIGURE A.8

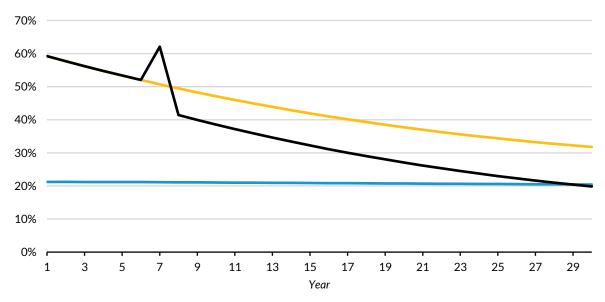
Expense Ratios, by Housing Type

Single-family homes with ADUs compared with those without ADUs and rental units

Expense ratios for renters paying lower-bound rent

Expense ratios for owners of single-family homes

——Net expense ratios for owners of single-family homes with ADUs



URBAN INSTITUTE

Source: Urban Institute calculations.

Homeownership Has Significant Benefits after 30 Years

Given the 30-year period in this analysis, one of homeownership's largest benefits is left out. After 30 years, the household owns the property outright. This has massive benefits for long-term affordability, as the owner then pays only taxes, insurance, and maintenance (Loftin 2021). The owner also can access the home's equity, either by selling or taking cash out. Housing equity may not contribute directly to affordability during the mortgage period, but equity is one of the best ways to build wealth (Goodman and Mayer 2018) and has significant positive impacts on generational wealth.

Appendix B. Internal and External Sources

Abdur Abdul-Malik A Quality Appraisal	
Melissa Alofaituli City of Los Angeles	
Amy Anderson Wells Fargo Foundation	
Michael Anderson Anderson Barker Architects	
Gideon Berger Urban Institute	
Caroline Bhalla University of Southern California Sol Price Center for Social Inno	vation
Amaya Bravo-France Chan Zuckerberg Initiative	
Susan Brown CoreSGB	
Pavlin Buchukov Genesis LA Economic Growth Corporation	
Gavin Caffaro Citibank NA	
Dan Caroselli City of Los Angeles	
Beth Castro Office of the Comptroller of the Currency	
Gilbert A. Cedillo LA City Council	
cristian correa Caliber Home Loans	
Tom De Simone Genesis LA	
Chi Elder Citibank NA	
Pamela Feigenbaum Citibank NA	
Yonah Freemark Urban Institute	
William Fulton Rice University Kinder Institute for Urban Research	
Carole Galante University of California, Berkeley, Terner Center for Housing Inn	ovation
Milena Garcia Neighborhood Housing Services of Los Angeles County	
Lori Gay Neighborhood Housing Services of Los Angeles County	
Richard Gerwitz Citibank NA	
Matthew Glesne City of Los Angeles	
Alejandro Gonzalez Genesis LA Economic Growth Corporation	
Richard Greene University of Southern California	
Solomon Greene Urban Institute	
Gerald Gubatan Los Angeles City Council	
Lawrence Hammond Community Preservation Corporation	
Marqueece Harris-Dawson LA City Council	
Lisa Hasegawa NeighborWorks America	
Christopher Hawthorne City of Los Angeles	
Meg Healy Council Member Raman	
Steve Herman California Bank & Trust	
David Hinson Urban Institute	
Jeanne Holm City of Los Angeles	
Arash Kahvazadeh Mastercard	
Azeen Khanmalek City of Los Angeles	
Joanne Kim Los Angeles City Council	
Monique King-Viehland Urban Institute	
Erin Koons Urban Institute	
Laura Krawczyk City of Los Angeles	
Danielle Lam Mastercard	
Helen Leung Los Angeles City Planning Commission	
Jessica Lynch National Association of Home Builders	
Mashael Majid Los Angeles City Council	
Nicholas Maricich City of Los Angeles	

First name	Last name	Affiliation at time of interview
Mike	McCabe	Housing Partnership Network
Alanna	McCargo	Urban Institute
Meaghan	McCarthy	Housing Partnership Network
Sadie	McKeown	The Community Preservation Corporation
Ben	Metcalf	University of California, Berkeley, Terner Center for Housing Innovation
Alanna	Morro	Urban Institute
Gary	Painter	University of Southern California
Shane	Phillips	University of California, Los Angeles, Lewis Center for Regional Policy Studies
Alison	Rincon	Urban Institute
Natalie	Robles	Mayor's Fund for Los Angeles
Katie	Rodriguez	Housing Partnership Network
Miguel	Sangalang	City of Los Angeles
Skip	Schenker	Guaranteed Rate Affinity
Ann	Sewill	City of Los Angeles
Dottie	Sheppick	Specialty Mortgage Product Solutions
Mott	Smith	Civic Enterprise Development LLC
Olivia	Speck	Forsyth Street Advisors
Theadora	Trindle	City of Los Angeles
Duane	Webb	Citibank NA
Barry	Wides	Office of the Comptroller of the Currency

Notes

- ¹ SB 9 was enacted in 2021 into Government Codes 65852.150 and 65852.2.
- ² Steven Sharp, "L.A. City Council Adopts Plan to Build 500,000 New Homes by 2029," Urbanize Los Angeles, November 30, 2021, https://la.urbanize.city/post/la-city-council-adopts-plan-build-500000-new-homes-2029.
- ³ After significant thought and deliberation, we decided to use "Hispanic" to refer to people of Latin American origin living in the United States. We decided to employ this term to align with the language used by research sources throughout the report. We recognize that "Latinx" is more inclusive of way people in this group may self-identify. The Housing Finance Policy Center and the Urban Institute strive to avoid language that is exclusive and will always attempt to explain the editorial rationale behind labels for groups.
- ⁴ Michael Kimmelman, "Los Angeles Has a Housing Crisis. Can Design Help?" New York Times, last updated October 15, 2021, https://www.nytimes.com/2021/06/22/arts/design/los-angeles-housing-crisis.html.
- ⁵ "Overview," Low Rise Los Angeles, accessed April 28, 2022, https://lowrise.la/Project-Overview.
- ⁶ "Overview," Low Rise Los Angeles.
- Anthony Dedousis, "Single-Family Zoning and Exclusion in L.A. County: Part 1," City Commentary blog, May 24, 2021, https://cityobservatory.org/la_exclusion_pt1/.
- Stephen Menendian, Samir Gambhir, and Arthur Gailes, "The Roots of Structural Racism Project: Twenty-First Century Racial Residential Segregation in the United States," University of California, Berkeley, Othering and Belonging Institute, last updated June 30, 2021, https://belonging.berkeley.edu/roots-structural-racism.
- Linna Zhu and John Walsh, "Low-Density Infill's Role in Fixing Los Angeles's Housing Supply Shortage," *Urban Wire* (blog), Urban Institute, June 23, 2021, https://www.urban.org/urban-wire/low-density-infills-role-fixing-los-angeless-housing-supply-shortage.
- ¹⁰ Kimmelman, "Los Angeles Has a Housing Crisis."
- ¹¹ The California Tax Credit Allocation Committee and the Department of Housing and Community Development Opportunity Map is developed by the state to measure and visualize place-based characteristics linked to critical life outcomes, such as educational attainment, earnings from employment, and economic mobility. The Opportunity Area categories are assigned based on a composite score that considers indicators from three domains: economic, environmental, and education. The state updates the data and mapping tool annually. Additional information on the methodology used to create the map can be accessed at "TCAC/HCD Opportunity Area Maps," Office of the California State Treasurer, accessed April 28, 2022, https://www.treasurer.ca.gov/ctcac/opportunity.asp.
- One attempt to show the permitted combinations is available at Alfred Twu, "How to Use Senate Bill 9," Alfred Twu, last updated September 16, 2021, https://sites.google.com/view/alfredtwu/infographics/sb9.
- ¹³ See the website for Low Rise Los Angeles at https://lowrise.la/.
- Jung Hyun Choi, Sarah Gerecke, and Gideon Berger, "Debunking Three Myths about Low-Density Infill Housing: Lessons from Los Angeles," *Urban Wire* (blog), Urban Institute, May 17, 2021, https://www.urban.org/urban-wire/debunking-three-myths-about-low-density-infill-housing-lessons-los-angeles.
- "Your Rights as a Tenant," Stay Housed L.A., accessed April 28, 2022, https://www.stayhousedla.org/tenant_rights.

- Dan Bertolet and Nisma Gabobe, "LA ADU Story: How a State Law Sent Granny Flats off the Charts," Sightline Institute, April 5, 2019, https://www.sightline.org/2019/04/05/la-adu-story-how-a-state-law-sent-granny-flats-off-the-charts/.
- ¹⁷ Our research identified two pivotal cityLAB reports, but professors and students completed other projects and studios associated with the Backyard Homes initiative. See Cuff, Higgins, and Dahl (2010) and Mukhija, Cuff, and Serrano (2014).
- ¹⁸ SB 1069 in 2016 and SB 229 and AB 494 in 2017.
- ¹⁹ Chapter 3 analyzes ADU completions rather than permits, but permitting figures are more apt here. See Bertolet and Gabobe, "LA ADU Story."
- ²⁰ "ADU," Los Angeles Department of Building and Safety, accessed April 29, 2022, https://ladbs.org/adu.
- ²¹ See the website for the Los Angeles ADU Accelerator Program at https://adu.lacity.org/.
- ²² "The Backyard Homes Project," LA Más, accessed April 29, 2022, https://www.mas.la/affordable-adus.
- ²³ "Standard Plan Program," Los Angeles Department of Building and Safety, accessed April 29, 2022, https://www.ladbs.org/adu/standard-plan-program.
- ²⁴ See the website for Low Rise Los Angeles at https://lowrise.la/.
- ²⁵ SB 9, 2021-22 Leg., Reg. Sess. (Cal. 2021).
- ²⁶ "Senate Bill 9 Is the Product of a Multiyear Effort to Develop Solutions to Address California's Housing Crisis," California State Senate, accessed April 26, 2022, https://focus.senate.ca.gov/sb9.
- ²⁷ "Second Dwelling Unit (Accessory Dwelling Unit) Pilot Program," Los Angeles County Department of Regional Planning, accessed April 29, 2022, https://planning.lacounty.gov/secondunitpilot.
- ²⁸ "Standard Plan Program," Los Angeles Department of Building and Safety, accessed April 29, 2022, https://www.ladbs.org/adu/standard-plan-program.
- ²⁹ See the website for the Los Angeles ADU Accelerator Program at https://adu.lacity.org/.
- ³⁰ "Unpermitted Dwelling Units (UDU)," Los Angeles City Planning, accessed April 29, 2022, https://planning.lacity.org/plans-policies/unpermitted-dwelling-units.
- ³¹ See the website for Low Rise Los Angeles at https://lowrise.la/.
- 32 "Los Angeles ADU Information," Symbium.
- 33 SB 10, 2021-22 Leg., Reg. Sess. (Cal. 2021).
- Washington State might be the next state to adopt provisions similar to those California and Oregon have adopted. See Bob Throndsen, "Two Multifamily Housing Bills Dead, but Measure Supporting Accessory Dwelling Units Passes State House," My Edmonds News, February 16, 2022, https://myedmondsnews.com/2022/02/two-multifamily-housing-bills-dead-but-measure-supporting-accessory-dwelling-units-passes-state-house/; and Dan Bertolet, "Will Washington Do the Right Thing on Backyard Homes This Year?" Sightline Institute, last updated March 4, 2022, https://www.sightline.org/2022/01/09/will-washington-do-the-right-thing-on-backyard-homes-this-year/.
- ³⁵ Middle housing describes a range of residential housing (not apartment buildings) with multiple units (two to four or more) that are compatible in scale and form with detached single-family homes.
- ³⁶ Courtyard housing is common in West Coast cities. Oregon law defines cottage clusters as four or more detached dwelling units of less than 900 square feet that share a common courtyard. Located on individual parcels, town homes are row houses (with two or more dwelling units) that share a common wall. See "Housing

- Choices (House Bill 2001)," Oregon Department of Land Conservation and Development, accessed April 29, 2022, https://www.oregon.gov/lcd/UP/Pages/Housing-Choices.aspx.
- New urbanist architect Dan Parolek and coined the term "middle housing," which has become part of the policy rationale for the recent legislation in California and Oregon. See the website for Missing Middle Housing at https://missingmiddlehousing.com/.
- ³⁸ Oregon's Department of Land Conservation and Development notes that more than a quarter of households in Oregon are a single person living alone.
- ³⁹ See the City of Portland's Bureau of Development Services website, which offers more details and step-by-step guidance for homeowners: "Accessory Dwelling Unit (ADU) Permits," Portland.gov, accessed April 29, 2022, https://www.portland.gov/bds/residential-permitting/residential-building-permits/accessory-dwelling-unit-adu-permits.
- The pandemic likely drove down the number of ADU permits in 2020. See Kol Peterson, "Portland, Oregon's ADU Permit Data for 2020," Accessory Dwellings blog, accessed April 29, 2022, https://accessorydwellings.org/2021/07/22/portland-oregons-adu-permit-data-for-2020/.
- 41 "Residential Infill Project and New Development Projects," Portland.gov, accessed April 29, 2022, https://www.portland.gov/bds/zoning-land-use/residential-infill-project; and Michael Andersen, "Portland Just Passed the Best Low-Density Zoning Reform in US History," Sightline Institute, August 11, 2020, https://www.sightline.org/2020/08/11/on-wednesday-portland-will-pass-the-best-low-density-zoning-reformin-us-history/.
- 42 "Residential Infill Project Part 2 Addressed Larger Residential Lots, Cottage Clusters and Attached Houses," Portland.gov, accessed April 29, 2022, https://www.portland.gov/bps/planning/rip2/news/2021/11/15/residential-infill-project-part-2-addresses-larger-residential.
- ⁴³ SB 458, 2017–18 Leg., Reg. Sess. (Cal. 2017), which passed in 2021, requires cities to streamline their land division processes for smallplexes permitted under HB 2001. SB 458 would allow individual units (say, a fourplex development) to be located on separate lots and be individually owned, rather than relying on converting each unit to condominiums. See "Residential Infill Project Part 2," Portland.gov.
- ⁴⁴ "Accessory Dwelling Unit (ADU) Permits," Portland.gov.
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density through ADUs. Seattle's experience illustrates the potential, perhaps even likely, pushback to these zoning reforms from existing single-family homeowners. At the time of its passage in July 2019, local planning experts heralded the legislation as the most progressive ADU ordinance and program in the nation. See Dan Bertolet and Margaret Morales, "Seattle Says Yes to the Best Rules in America for Backyard Cottages," Sightline Institute, July 1, 2019, https://www.sightline.org/2019/07/01/seattle-approves-best-backyard-cottages-rules-united-states/.

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- ⁵² See the City of Seattle's ADUniverse website at https://aduniverse-seattlecitygis.hub.arcgis.com/.
- ⁵³ As of fall 2021, funding for the pilot was temporarily diverted because of pandemic-related budget constraints. The planning department aims to restart the pilot in 2022.
- In addition to its annual ADU report, Seattle's Office of Planning and Community Development developed an interactive story map with 2022 data to supplement the written report. See "2021 ADU Annual Report: Interactive Data That Supplements the City of Seattle's Latest Annual Report on Accessory Dwelling Units (ADUs)," Office of Planning and Community Development and Seattle Department of Constructions and Inspections, September 14, 2021, https://storymaps.arcgis.com/stories/f8ee6480b1764b1bab219beec38b2d88.
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