

# State of Maine Housing Production Needs Study

Homes to support Mainers and Maine businesses,  
now and in the future.

Executive Summary  
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GOVERNOR'S OFFICE OF  
Policy Innovation  
and the Future



HR&A



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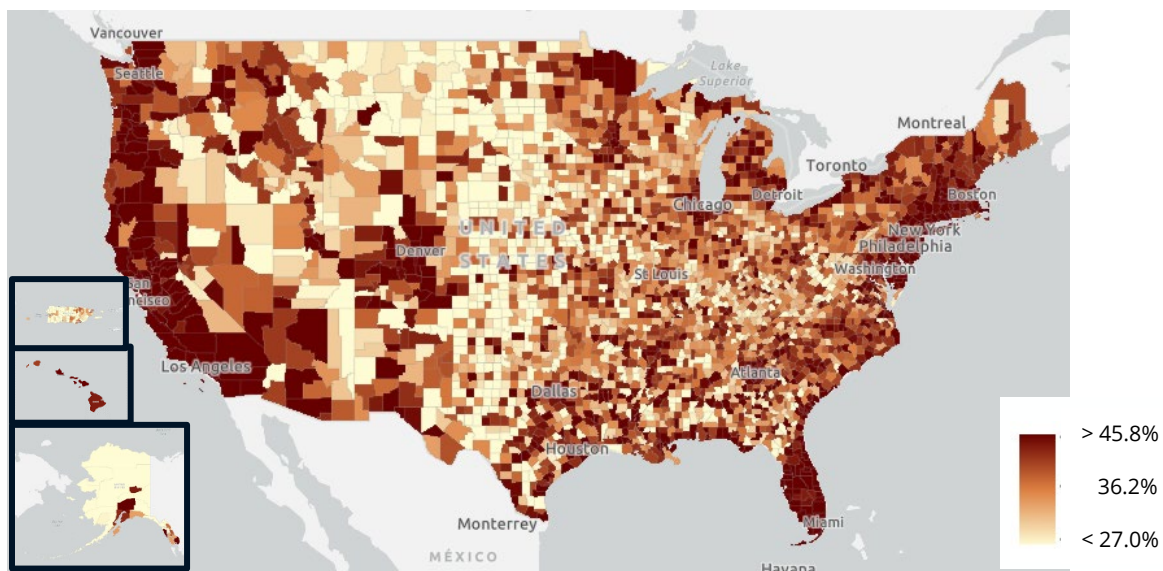


# Executive Summary

## Introduction

In response to a national housing crisis accelerated by the Covid-19 pandemic, policy makers are increasingly asking, *how many and what kind of homes are needed to meet the needs of our constituents and improve affordability?* The scale and nature of housing challenges varies significantly across regions and places but is driven by a primary underlying cause: housing production dropped precipitously after the Great Recession, leading to a nationwide undersupply of homes, especially at low and moderate income price points.<sup>1</sup> These trends were exacerbated by the pandemic through materials and labor shortages just as some places—Maine in particular—experienced a sudden influx of residents due to an increase in remote workers seeking a higher quality of life and an increase in international immigration. What was once primarily a problem for coastal cities has become a national one; almost every county in America now has significant rates of renter cost burden, among other housing challenges (Figure 1).

**Figure 1: Percentage of Cost Burdened Renters by County**



Source: American Community Survey 5-Year 2021

While Maine has historically had a relatively affordable homeownership market, this changed in the years leading up to the pandemic and has worsened since 2020.<sup>2</sup> Maine is also faced with an aging housing stock, leading more of the state’s existing homes to sit vacant in need of reinvestment. These trends have led to a range of housing challenges for Mainers, including reduced housing quality, limited options to age in place, increased homelessness, and rising housing costs. All these issues are important to study further. However, at the most basic level, aligning housing production with population and economic growth is the foundation of a healthy housing market that offers quality homes at a price affordable to

<sup>1</sup> Betancourt, Gardner and Palim. (2022). Housing Insights: The U.S. Housing Shortage from a Local Perspective. Fannie Mae. <https://www.fanniemae.com/media/45106/display>

<sup>2</sup> MaineHousing Affordability Index. (2023). MaineHousing. <https://mainehousing.org/data-research/housing-data/housing-affordability-indexes>

residents. **The first step is to understand how many homes are needed to support broad affordability and availability, which lays the foundation to adopt policies to create those homes.**

Addressing housing supply challenges in Maine will require a comprehensive approach that considers both the **local regulatory changes** needed to increase housing supply through new construction and the **funding** needed to reinvest in Maine's aging homes and create new homes that are affordable to those with lower incomes, including seniors on fixed incomes, households waiting for federal work authorization, and others. Further, strategies to overcome other barriers, such as the capacity of the development and construction industry in Maine and environmental challenges, will all be necessary as part of a comprehensive approach to increase supply.<sup>3</sup> While this will require both local and state-wide strategies, the historic hyper-local response to what is ultimately a regional problem has been one of the primary barriers in Maine and nationwide to building enough homes.

In recognition of this, the State of Maine has taken the lead on a strategy to **build new homes and reinvest in existing homes state-wide** through the passage of LD 2003 and over \$280,000,000 in affordable housing production funding since 2019. LD 2003 requires municipalities to permit a wider range of housing types and commits State financial and technical assistance for municipalities to support local and regional production targets, including through measuring regional housing production needs. LD 2003 recognizes that a data-informed approach to measuring regional and statewide housing production needs is key to a broader state-wide planning effort to increase housing production.

This Study is a key step in this process, and it aims to answer the question, **how many homes are needed in Maine now and in the future to support Mainers to have access to the homes they need, in a location that promotes economic opportunity, and at a price that ensures a high quality of life?** This Study is focused on measuring that need in alignment with the State's specific demographic and economic conditions as well as goals to ensure that Maine can sustain and grow its economy over time. This Study measures "homes" as housing units in any building type, including single family, attached housing and multifamily housing. Building and reinvesting in a diverse range of housing types to meet different household needs and price points will be crucial to meeting Maine's housing supply needs.

This Study, conducted by HR&A Advisors, was overseen by a Steering Committee representing MaineHousing, the Governor's Office of Policy Innovation and the Future (GOPIF), and the Department of Economic and Community Development (DECD), together the "Study Team", which met regularly to coordinate research planning, data collection, and priority areas of analysis.

The Study Team also solicited feedback from a Technical Working Group composed of representatives from the Department of Labor (DOL), the Maine State Economist, the Greater Portland Council of Governments, the Maine Association of Realtors, the Maine Municipal Association, and other experts.

## Approach

Maine has a set of broad policy priorities that inform this Study's approach to measuring how many homes need to be built or reinvested in. The first is to have **enough homes overall to accommodate the existing demand for homes.** When there is an insufficient supply of homes, competition for the limited number of homes available drives up prices to levels that are unaffordable to many existing

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<sup>3</sup> Sturtevant and Curtis. (2023). Availability of Workforce Housing in Maine. University of Maine. <https://usm.maine.edu/shaw-innovation-fellows/wp-content/uploads/sites/406/2023/05/Workforce-Housing-in-Maine-Sturtevant-Curtis-Shaw-Innovation-Fellowship-8-May-2023-1.pdf>.

Mainers. A healthy housing market—one that has enough homes to accommodate existing demand across income groups—has a portion of homes that are vacant and available at any given time<sup>4</sup>. These available homes allow households to move about the state as they change jobs, move out of homes to start their own family, or otherwise need to relocate because of changes in their life. Right now, there are portions of the state where there are simply no homes available for a household to move into.

The second policy priority is to have enough homes **affordable, available and in the right locations to support the workforce necessary to sustain and grow Maine's economy**. The State's Economic Development Strategy focuses on the need for a workforce to support Maine's long-standing industries and to foster growth and innovation in new areas. To achieve these goals, Maine's economy requires workers to fill open positions as an increasing number of Mainers reach retirement and room for new workers to fill positions created as local businesses and the economy grow. Without enough homes for workers filling open job positions, businesses will continue to struggle and at times fail—harming the prosperity of all Mainers.

With these two goals in mind, this Study calculates both the number of additional homes needed currently to remedy **Historic Underproduction** and, by 2030, the **Future Need** to meet these policy priorities. In recognition of Maine's regional economies, Historic Underproduction and Future Need are calculated for three economic regions: the Coastal Region, comprising Cumberland, Hancock, Knox, Lincoln, Sagadahoc, Waldo, and York Counties, the Northeastern Region, comprising Aroostook, Penobscot, and Washington Counties; and the Central Western Region, comprising Androscoggin, Franklin, Kennebec, Oxford, Piscataquis, and Somerset Counties.

Other studies have quantified the need for homes in Maine, particularly for affordable rental homes. For example, the National Low Income Housing Coalition (NLIHC) has estimated a shortage of 22,300 affordable and available rental homes for households making at or below 50% of Area Median Income (AMI) and mostly for extremely low income households. While the State of Maine Housing Production Needs Study considers housing need at the lowest income levels, the primary focus is on measuring overall production needs for both renters and homeowners across the income spectrum in Maine, incorporating the demand for seasonal homes, the need for additional workers, and the recent influx of higher income households to Maine, all of which significantly impact the availability and price of homes in Maine. Different approaches can be used together to understand different elements of housing need in the state.

This Study does not, however, detail the specific physical typologies of homes needed to support different populations including the elderly, asylum-seekers and refugees, those experiencing homelessness, and different household types more broadly. It is important for the State and municipalities to take into account local population needs and make regulatory and funding decisions accordingly, including by reducing regulatory barriers to building the types of homes that households need and securing funding for homes that can support populations with the highest need. Local planning should consider how different housing types, including single family, attached and multifamily rental and for-sale homes, can support availability at the price points needed while also considering local context.

Ultimately, setting production targets is a process that will need to account for regional variation in demographic trends, economic development needs, and existing constraints on housing development.

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<sup>4</sup> Vacant and available homes do not include vacant homes that are not currently available for full-time residence, whether due to disrepair, seasonal use, foreclosure, or other factors.

This Study provides analysis to help guide that process (Figure 2). As local planning follows, local adjustments to these targets should be balanced with the likely impact on the availability and affordability of homes for existing Mainers and the economic health of the state. These production targets will also need to be monitored over time as economic and demographic conditions change and as municipalities take steps to meet these targets. For more information about the Study approach, see report page 12.

**Figure 2: Setting Housing Production & Reinvestment Targets**



## Key Findings

**While trends vary across the state, homes are becoming less affordable and harder to find in Maine.** There are demand-side drivers, including sudden in-migration and declining labor force participation amongst Maine’s aging population, and supply-side drivers, including low housing production and an aging housing stock, that are broadly driving these trends.

### *Demand-Side Drivers*

Recent demand-side drivers, including **sudden in-migration** during the height of the Covid-19 pandemic and a **declining labor force from aging households**, are impacting the number of homes Maine needs. Maine experienced increased in-migration from out of state in recent years, concentrated in York and Cumberland Counties but distributed across the state. These in-migrants have higher incomes on average than existing Mainers and are able to pay more for homes. Maine has also experienced a surge in households seeking asylum, who generally have very low incomes in the short-term as they await federal work authorization.

At the same time, Maine’s population is aging, resulting in a declining labor force. This impacts both the kinds of homes needed to accommodate a retiring population and homes needed to enable employers to attract more workers to the state to fill open job positions. Over the past decade, Mainers 55 and over have grown as a share of the population, and labor force participation among this group has significantly declined since 2017 as the group gets closer to retirement age. As a result, overall labor force

participation has not recovered post-pandemic as older workers retire, even as labor force participation amongst younger groups has remained steady.

**In order to fill the job vacancies created by increased retirement, Maine will need to bring in workers from out-of-state, who will in turn require additional homes to live in.**<sup>5</sup> Maine currently has a very high share of unfilled job positions, with many parts of the state having more vacancies than available workers. Many of these jobs skew somewhat lower income, reflecting a growing mismatch between what many new workers could afford and the price of Maine’s available homes.

#### *Supply-Side Drivers*

These demand-side drivers are exacerbated by supply-side challenges, namely Maine’s **aging housing stock** and **low housing production** over the past decade.

As the housing stock ages, the share of homes that are unavailable to be occupied due to poor condition has increased. As these homes deteriorate over time, the inventory of homes can gradually decline through demolition. There is limited data to quantify the annual loss of homes through demolition or disrepair, however, individual towns and localities may have the information or begin to gather the information through demolition permits to track the loss of homes over time. Ultimately, this data will need to inform local production and reinvestment targets.

Maine has also had **low housing production relative to job growth across all regions**, but particularly in the Coastal Region, which is a key measure of housing supply issues. Both the Central Western and Northeastern regions have seen total housing inventory decline slightly since 2016. The state has also seen a decline in rental homes across all regions, which runs counter to the trend in almost every other housing market in America and is likely exacerbating Maine’s workforce challenges, as workers in entry-level and lower wage positions often require rental housing options.

Finally, **the consistently high demand for seasonal homes means that Maine has historically required a higher number of homes relative to the number of year-round residents and available jobs than states with lower seasonal demand.**

#### *Availability and Affordability*

As a result of low production, reduced rental housing and an aging housing stock, the **availability of homes is declining** and **prices are increasing**, making it very difficult to access and afford homes and fill job openings in some parts of the state. Not all vacant homes in a housing market are available, as some vacant homes might be reserved as a seasonal home, in foreclosure, in disrepair or otherwise unavailable to the market for occupancy. True “availability” of the housing stock is defined as the vacant units that are ready and available for a household to move into. In a healthy housing market, typically about 5% of homes are vacant and available for use at any given time—allowing for housing choice flexibility and

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<sup>5</sup> Maine’s 2020 – 2029 Economic Development Strategy also aims to increase the labor force participation rate of groups with historically lower participation, such as women and people with disabilities. However, the plan acknowledges that in order to support Maine’s economic growth, additional workers will also have to come from out of state.



movement. **Across Maine, the share of homes vacant and available has fallen to an average of 2.3% statewide.**

**Homeownership in Maine is becoming increasingly unaffordable.** Under a standard definition set by the U.S. Department of Housing and Urban Development (HUD), homes are considered affordable if the rent or cost of ownership<sup>6</sup> is less than 30% of household income. Until recently, the cost of purchasing a home in Maine was such that a household earning the median income could afford the mortgage on the median home value. In recent years, however, the demand- and supply-side drivers described above, in addition to macroeconomic trends such as rising interest rates, have caused a significant divergence between the income needed to purchase a home in Maine and the actual median income of Mainers; **households now need to make over \$100,000 annually to afford the median home price** As a result, buying a home in Maine now is not affordable for the majority of Mainers.

Renters in Maine are also facing affordability and availability challenges. Maine has seen a decline in renter-occupied units across the state since 2016, and the majority of renter households below 60% of Area Median Income (AMI)<sup>7</sup> in Maine were **cost burdened** (paying over 30% of household income in rent) in 2021, with the highest rates of cost burden in the Coastal Region. Although renter cost burden rates remained relatively consistent from 2016-2021 (the most recently available data), rents and homes prices increased significantly in 2022 and 2023 and exceeded wage increases, which has likely increased cost burden rates since 2021.

## Measuring Housing Need

**To address these needs and meet the State’s policy priorities, Maine needs approximately 38,500 homes to remedy historic underproduction and will need an additional 37,900 to 45,800 homes to meet expected population growth and household change by 2030** (Table 1). Maine can meet this goal both through the **production of new homes** and **reinvestment in existing homes** that are vacant or unavailable due to disrepair or foreclosure.

**Table 1: Historic Underproduction and Future Need by Region**

<i>Region</i>	<i>Historic Underproduction</i>	<i>Future Need (2021 - 2030)</i>	<i>Total</i>
<i>Coastal</i>	21,200	24,200 - 28,000	45,400 - 49,200
<i>Central Western</i>	13,000	9,700 - 11,700	22,700 - 24,700
<i>Northeastern</i>	4,300	4,000 - 6,100	8,300 - 10,400
<b><i>Maine</i></b>	<b>38,500</b>	<b>37,900 - 45,800</b>	<b>76,400 - 84,300</b>

**Historic Underproduction:** The Study Team defines historic underproduction as the deficit of available homes for the existing population (the availability deficit) plus the deficit of homes for workers needed to

<sup>6</sup> Includes mortgage, property taxes, and insurance.

<sup>7</sup> See Appendix Page 5 for explanation of Area Median Income calculations.

increase the workforce to support Maine’s existing economy (the jobs : homes deficit)<sup>8</sup>. For more information about how the Study Team measured historic underproduction in Maine, see report page 40.

**Future Need:** The Study Team defines future need as the number of homes needed to support Maine’s projected population and household change by 2030, while accounting for Maine’s high demand for seasonal homes. For more information about how the Study Team measured future need in Maine, see report page 52.

To put this need in context, Maine’s total housing inventory in 2021 was about 737,800 homes. Increasing the number of homes to meet historic underproduction alone (38,500 additional homes) would constitute about a 5% increase in total homes across the state. To meet both current and future need by 2030, Maine would need to add 8,500 to 9,300 homes each year (Table 2). Currently, about 4,800 homes are permitted per year in Maine, and meeting this annual need would require a 77% to 94% increase in the number of permits (with geographic variation). It is important to note that annual building permits are not an exact measure of housing production, as not all permitted homes are built. The necessary increase in housing production may be larger than current permitting suggests and will vary based on the annual loss of homes in different regions.

**Table 2: Annualized Production Needs Compared to Annual Building Permits by Region**

	<i>Total Annual Production Need</i>	<i>5-year average (2016 - 2021)</i>	<i>% Change in Permits</i>	<i>Net Change in permits</i>
<i>Coastal</i>	<b>5,100 – 5,500</b>	3,400	<b>50% - 62%</b>	<b>1,700 – 2,100</b>
<i>Central Western</i>	<b>2,500 – 2,700</b>	1,000	<b>150% - 170%</b>	<b>1,500 – 1,700</b>
<i>Northeastern</i>	<b>900 – 1,100</b>	400	<b>128% - 175%</b>	<b>510 - 700</b>
<i>Maine</i>	<b>8,500 – 9,300</b>	4,800	<b>77% - 94%</b>	<b>3,700 – 4,500</b>

The number of additional homes needed varies across Maine’s regions. Much of it is concentrated in the Coastal and Central Western Regions, which together need 34,200 homes to make up for historic underproduction, and another up to 39,700 homes to meet future need. The Northeastern Region, by contrast, needs about 4,300 additional homes to make up for historic underproduction and meet the economic needs of the region and another 4,000 to 6,100 homes to meet future need by 2030.

Even in places where overall population is aging and declining, there is still need for housing production and reinvestment; in fact, household formation can increase in these circumstances (children of an aging population move into their own homes and some existing households split up). For example, while Aroostook, Piscataquis and Somerset Counties are all projected to see a modest total population decline by 2030, all of those counties will still see a net gain in households in that time period as well as a housing stock that continues to age, requiring additional homes and reinvestment. Further, as these regions face a declining workforce, new homes at affordable price points will be essential to attracting workers to the region and ensuring that existing younger households can stay.

<sup>8</sup> The “availability deficit” measures the additional homes needed to create a healthy level of availability in the housing market, with “true availability” representing homes that are vacant and available to live in (defined as For Sale and For Rent in the American Community Survey).

*Income Distribution*

In addition to the number of homes that Maine needs to sustain and grow its economy, it is important to measure the price of homes needed to ensure that households hoping to work or age in place in Maine can afford them. The Study Team created a sample income distribution by allocating the availability deficit based on the income distribution of existing households (Table 3) and the jobs : homes deficit on the expected household income distribution of wages from open job listings (Table 4).

**Table 3: Allocation of Availability Deficit Based on Existing Household Income Distribution<sup>9</sup>**

<i>Household Income</i>	<i>Coastal</i>	<i>Central Western</i>	<i>Northeastern</i>
<b>Regional Totals</b>	<b>9,400</b>	<b>4,900</b>	<b>2,300</b>
<i>Less than 20K</i>	1,100	780	420
<i>20K - 35K</i>	1,000	760	380
<i>35K - 50K</i>	1,000	730	320
<i>50K - 75K</i>	1,700	880	410
<i>75K - 100K</i>	1,400	650	290
<i>100K - 150K</i>	1,700	690	290
<i>150K+</i>	1,500	410	190

**Table 4: Allocation of Jobs : Homes Deficit Based on Estimated Household Wages of Open Job Listings<sup>10</sup>**

<i>Household Income</i>	<i>Coastal</i>	<i>Central Western</i>	<i>Northeastern</i>
<b>Regional Totals</b>	<b>11,900</b>	<b>8,100</b>	<b>2,000</b>
<i>Less than 20K</i>	70	50	10
<i>20K - 35K</i>	660	360	170
<i>35K - 50K</i>	1,230	640	210
<i>50K - 75K</i>	2,000	1,400	410
<i>75K - 100K</i>	2,300	1,600	380
<i>100K - 150K</i>	3,200	2,300	470
<i>150K+</i>	2,500	1,700	350

<sup>9</sup> Income Distributions are allocated based on regional numbers and rounded to the tens for counts in the hundreds, and hundreds for counts over a thousand. Due to rounding, numbers may not sum exactly to regional or state numbers.

It is important to note that low- and moderate-income households are more constrained in their choices and more likely to pay more than they can afford for a home. **Because of that, policy makers should emphasize strategies to increase affordable housing production for low- and moderate-income households** in addition to strategies to increase the supply of homes more broadly. At the local level, this may include weighting the income distribution of needed homes more heavily towards low- and very low-income populations to account for this need.

#### *Geographic Distribution*

**Across regions, individual jurisdictions are contributing more or less to housing demand** based on job growth, demographic and migration trends, and other factors, including the existing inventory of available housing and the share of seasonal homes.

To measure local contributions to housing demand, the Study Team weighted the allocation of regional need to the county level by both population share and job share of each county. Weighting allocation by population and jobs helps ensure that housing to address the State's historic underproduction is being added in places where jobs are, both to support households in living close to where they work and also to ensure that towns and cities that are growing economically are also accommodating the population needed to support that growth. This avoids issues of decreasing affordability when housing is not provided where job growth exists, and unnecessary development in areas where there may not be as significant job or population growth.

There are many alternative ways to allocate housing to more granular geographies across Maine, many of which would incorporate unique criteria specific to certain areas of the State.

## Setting Production Targets

Meeting this housing need will require Maine to **set housing production and reinvestment targets** that address both historic underproduction and disinvestment and account for future need. The next step in the process will be to set housing production and reinvestment targets at the local level and to consider the different housing typologies that can support housing production across the income spectrum. To move from the regional level to the local level will involve consideration of local obstacles such as available infrastructure, development capacity and other factors. It will also involve dialogue among communities about where and how to accommodate growth and target reinvestment within the region.

Ultimately, creating enough homes in Maine is foundational to the wellbeing of *all Mainers* and can only be achieved if the State and federal government, municipalities and the private sector work together on an ongoing basis. This will require **evaluating important metrics**, such as availability rate, housing production, cost burden, job availability, housing loss and others over time and **adjusting housing production and reinvestment targets** to adapt to changing conditions.

In order for stakeholders to monitor these changing conditions and track progress towards local housing production targets, the State will be providing an online data dashboard of baseline housing conditions at the state, county, and municipal level that will be updated on a periodic basis. Moving forward, improved collection of both building permitting and demolition data, as well as continuous tracking of vacancy trends, will also be critical for monitoring new development. For more information on evaluation and implementation, see report page 58.