



U.S. MULTIFAMILY OUTLOOK

OCTOBER 2024



AGENDA

- U.S. Economy: Inflation, Interest Rates & Labor Market
- Current Multifamily Performance & Forecasts
- Multifamily Industry Themes and Competitive Response:
 - Affordability
 - Demographics
 - Work-From-Home
 - Re-Industrialization & Energy Production
- Tax & Housing Election Implications

PRESENTERS

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Yardi Matrix

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Director of Research,
Yardi Matrix

OPENING REMARKS

Yardi Matrix House View – October 2024

MACROECONOMIC UPDATE

- U.S. economic growth remains relatively healthy with GDP growing at a 3% annualized rate in Q2 2024, Q3 looks north of 2%.
- The Fed lowered interest rates by a half-percentage point at the September meeting, the first rate reduction since 2020
 - More short-term interest rate cuts anticipated by EOY 2024 to maintain solid economic growth
 - However, the Fed has implied they don't see a reason to lower rates as aggressively as they did at their most recent meeting
- Inflation moved closer to the Fed's 2% target in September, further easing the path for future rate cuts
 - Unit labor costs, a measure of underlying inflation, have tempered as compensation growth moderates and labor productivity remains strong at 2.7% in Q2 2024
- The labor market has had an overall slowdown this year, but remains resilient
 - Job growth accelerated in September and the unemployment rate fell 10 basis points to 4.1%
 - Resignations are at their lowest since August 2020, a sign that employees are growing less confident in the job market
- 2023 population increase provided a temporary boost to population growth and labor supply, therefore lessening wage pressures
 - Unlikely to change trajectory of slowing population growth in the long-term
- Lack of consensus on immigration policy as 5-8M illegal immigrants enter the labor market
- U.S. economy is expected to slow and then rebound; the yield curve (10YR - 3MTH) is inverted with a soft-ish landing likely mid-2025; but large Federal deficits (>\$1.6 Trillion) are diluting monetary policy and the US 10 Yr has backed up to 4.2%

Yardi Matrix House View – October 2024

MULTIFAMILY UPDATE

- Overall, the multifamily market is performing well, as demand continues to soak up supply
- Market performance confirms the importance of the supply/demand balance:
 - Markets with an influx of new supply have had dampened rent growth as new units get absorbed, but likely a short-term bump in the road
 - Majority of markets are seeing decent rent growth
- Multifamily construction starts have been slowing over the past year, and deliveries are expected to decline after 2024's peak
 - Reduced new supply in 2026 and 2027 will provide a boost to performance
- The supply shortage of U.S. housing is likely to last at least 5-10 years preventing a major reduction in home values, apart from some weakness in Texas and Florida where single-family home inventories are rapidly rising
- Distress in multifamily is only "sort of" showing up
 - However, pressure on owners is increasing as debt funds become more aggressive in taking back assets and banks look to resolve loan extensions to expand new lending

*The structure of today's webinar is built around investment themes and strategies,
a departure from prior webinars*

U.S. ECONOMY: INFLATION, INTEREST RATES & LABOR MARKET

Forecasts for Real GDP Project a Softish Landing in Mid 2025

Evercore ISI / Yardi Matrix Economic Forecasts

	2022	2023	2024 Forecast Annualized	2025 Forecast Annualized
Real GDP	2.9%	Q1: 2.2% Q2: 2.1% Q3: 4.9% Q4: 3.4%	Q1: 1.4%A Q2: 3.0%A Q3: >2.0% Q4: 2.0%	Q1: 1.0% Q2: 0.5% Q3: 2.0% Q4: 3.0%
Nominal GDP	9.2%	Q1: 7.1% Q2: 5.9% Q3: 6.2% Q4: 5.9%	Q1: 5.4%A Q2: 5.7%A Q3: >4.0% Q4: 4.0%	Q1: 3.0% Q2: 2.5% Q3: 4.0% Q4: 5.0%
Inflation (GDP Deflator)	6.3%	Q1: 3.7% Q2: 1.8% Q3: 3.2% Q4: 1.6%	Q1: 3.0%A Q2: 2.5%A Q3: 2.0% Q4: 2.0%	Q1: 2.0% Q2: 2.0% Q3: 2.0% Q4: 2.0%

Evercore ISI / Yardi Matrix Economic Forecasts

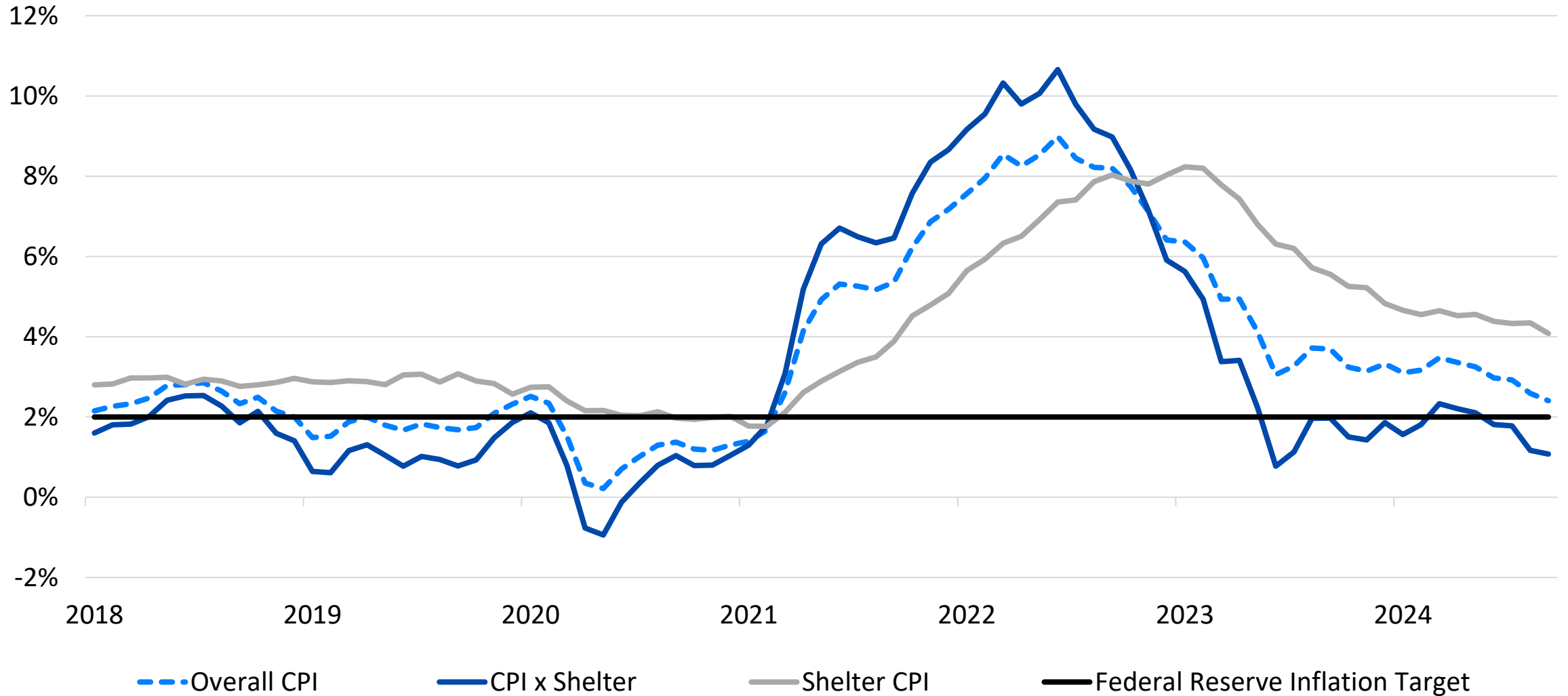
	2022	2023	2024 Forecast Annualized	2025 Forecast Annualized
Unemployment Rate	3.5%	Q1: 3.5% Q2: 3.6% Q3: 3.8% Q4: 3.8%	Q1: 3.8% Q2: 4.1% Q3: 4.1% Q4: 4.5%	Q1: 4.5% Q2: 4.8% Q3: 4.5% Q4: 4.3%
Bond Yield*	3.6%	Q1: 3.7% Q2: 3.6% Q3: 4.1% Q4: 4.4%	Q1: 4.2% Q2: 4.4% Q3: 3.8% Q4: 3.5%	Q1: 3.25% Q2: 3.0% Q3: 3.5% Q4: 3.5%
Fed Funds*	4.1%	Q1: 4.7% Q2: 5.1% Q3: 5.3% Q4: 5.3%	Q1: 5.3% Q2: 5.3% Q3: 5.1% Q4: 4.5%	Q1: 3.75% Q2: 3.0% Q3: 2.75% Q4: 2.75%

*Quarter average. Historical Bond Yield data shown as long-term government bond yields: 10-year: main (including benchmark) for United States, not seasonally adjusted

Source: Yardi Matrix; Evercore ISI, Morning Economic Report; Federal Reserve Bank of St. Louis; Moody's Analytics

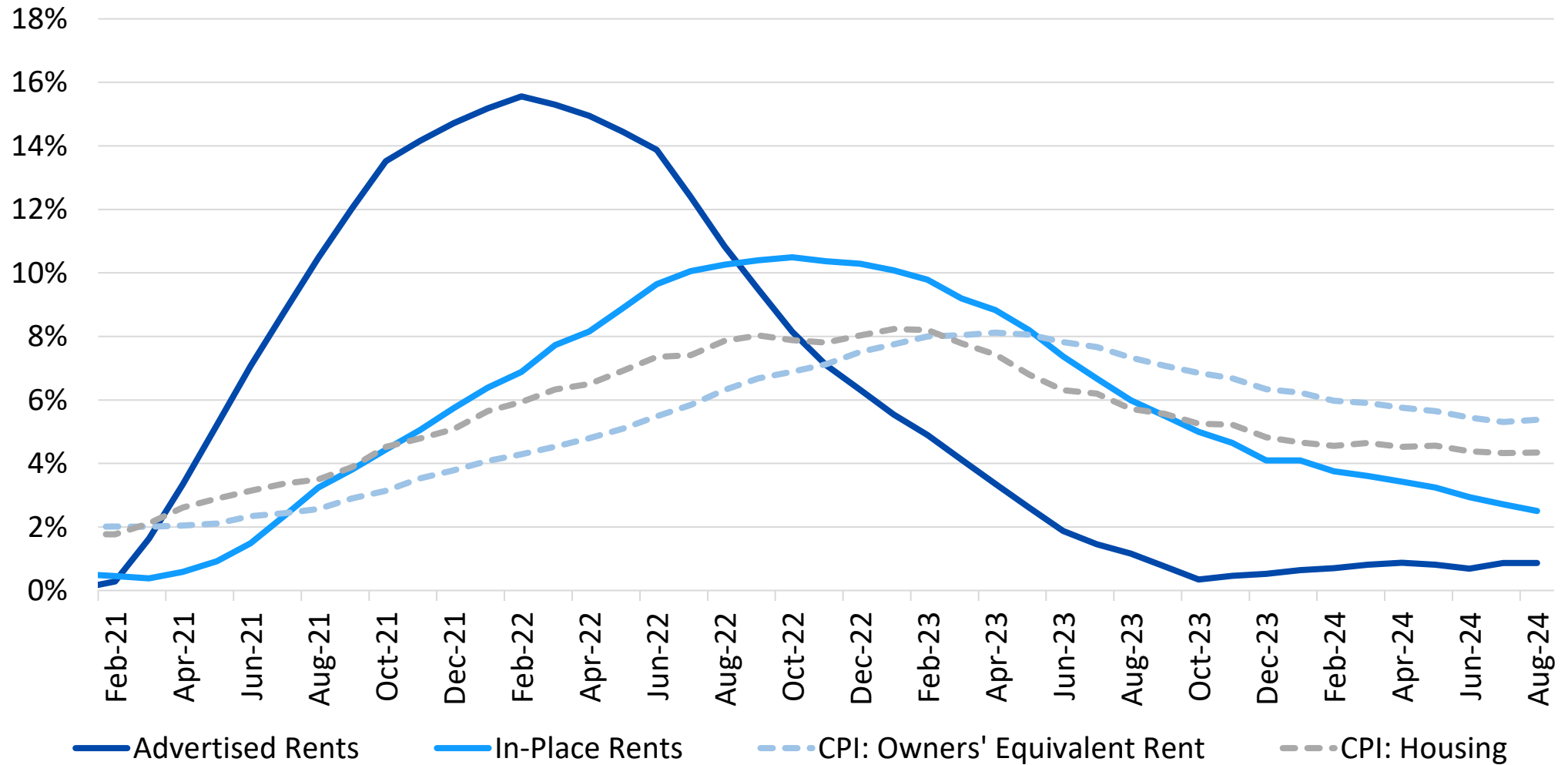
Inflation is Coming Closer to Meeting the Federal Reserve's Target

U.S. Consumer Price Inflation, YOY % Change



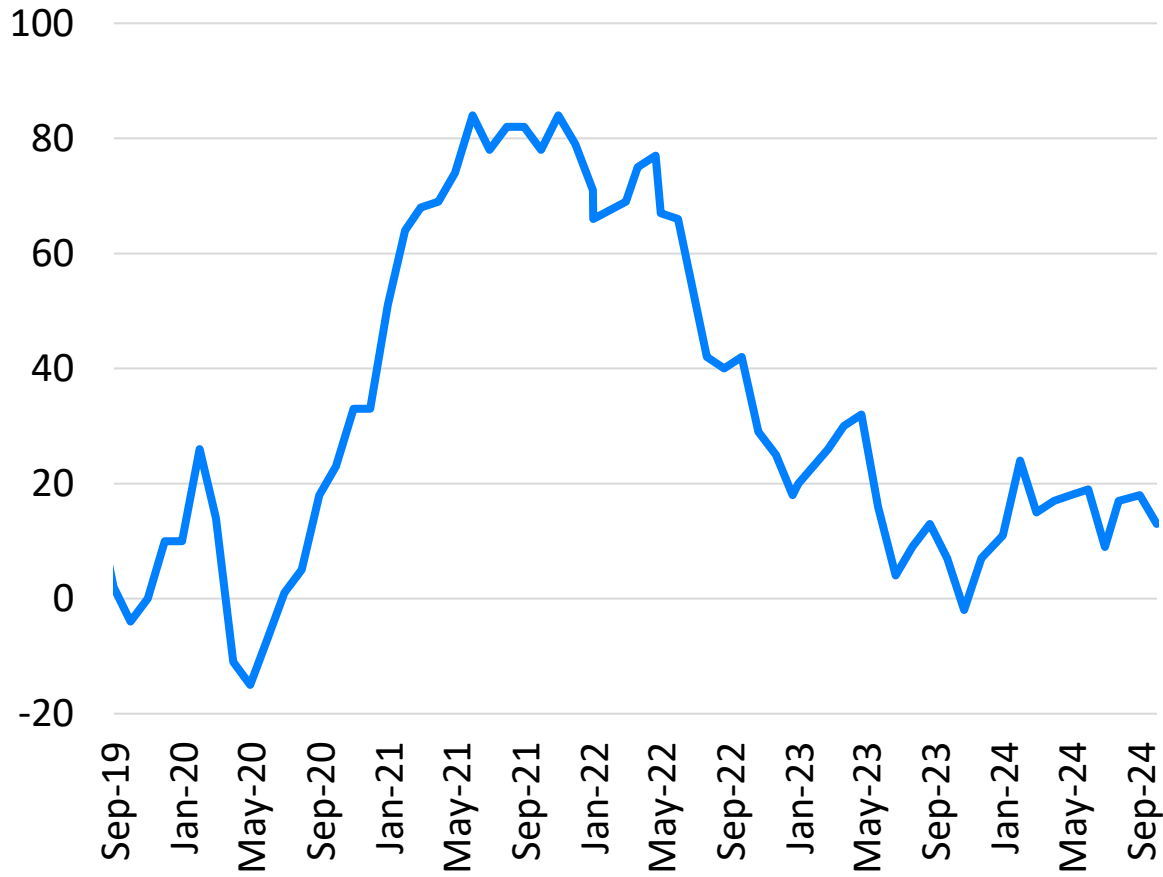
Housing CPI Tracks Closely to U.S. Multifamily In-Place Rents

Annual Growth in Rents vs Housing CPI and Owners Equivalent Rent CPI

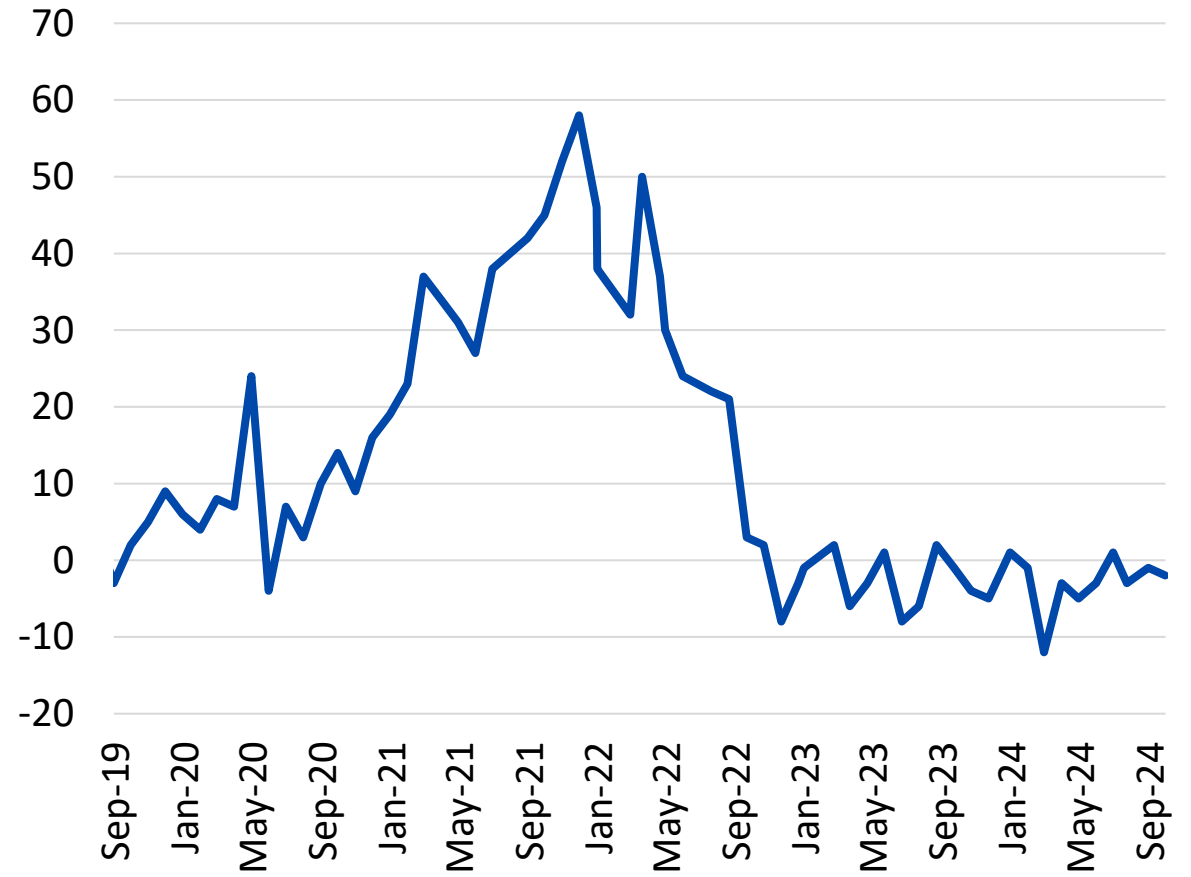


Supply Chain Disruption Easing, as Are Raw Materials Prices

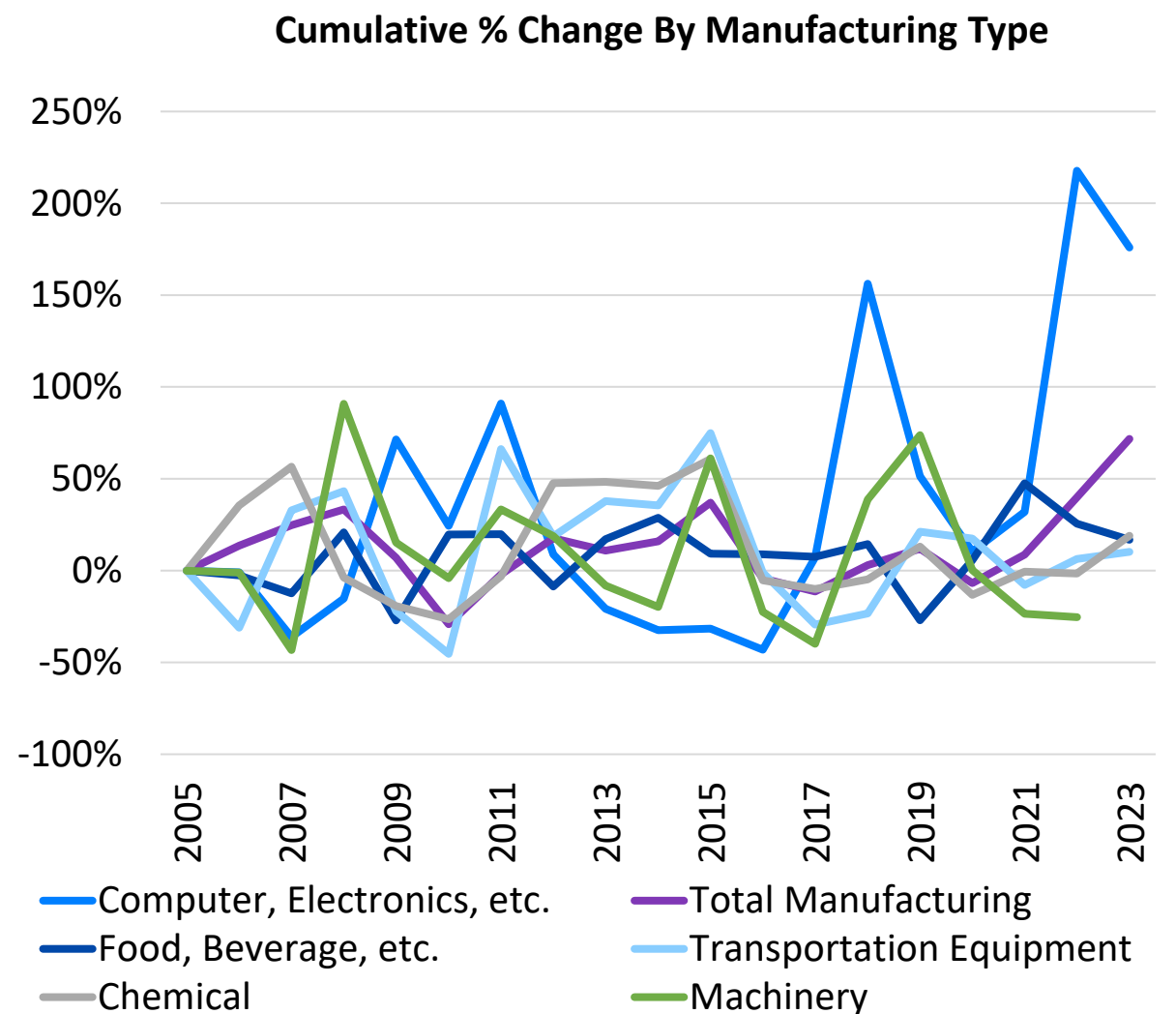
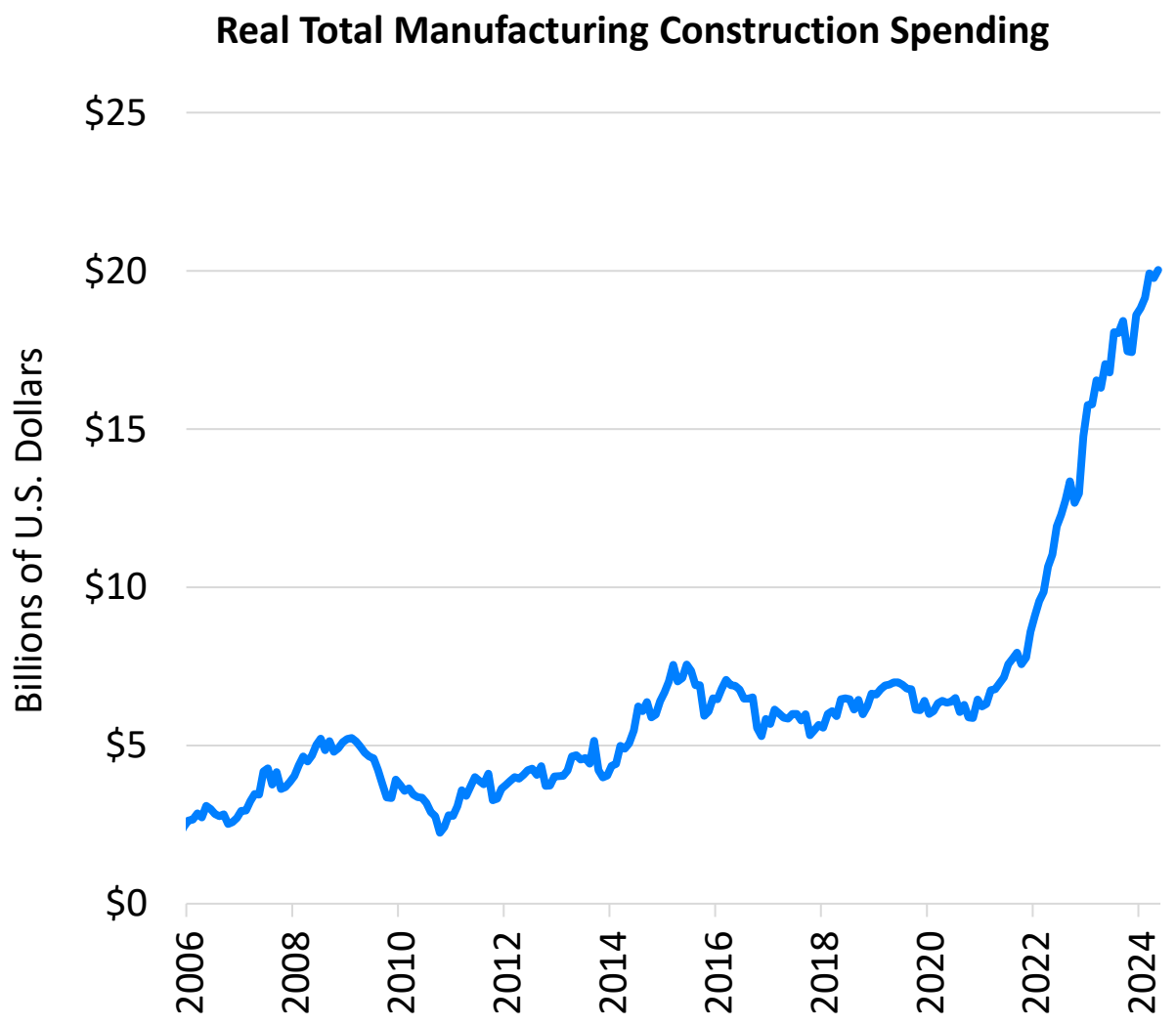
Prices Paid for Raw Materials Versus a Month Ago



Supplier Delivery Time Versus a Month Ago



The U.S. Has Significantly Increased its Domestic Manufacturing Spending, Especially Within the Computer and Electronics Segment



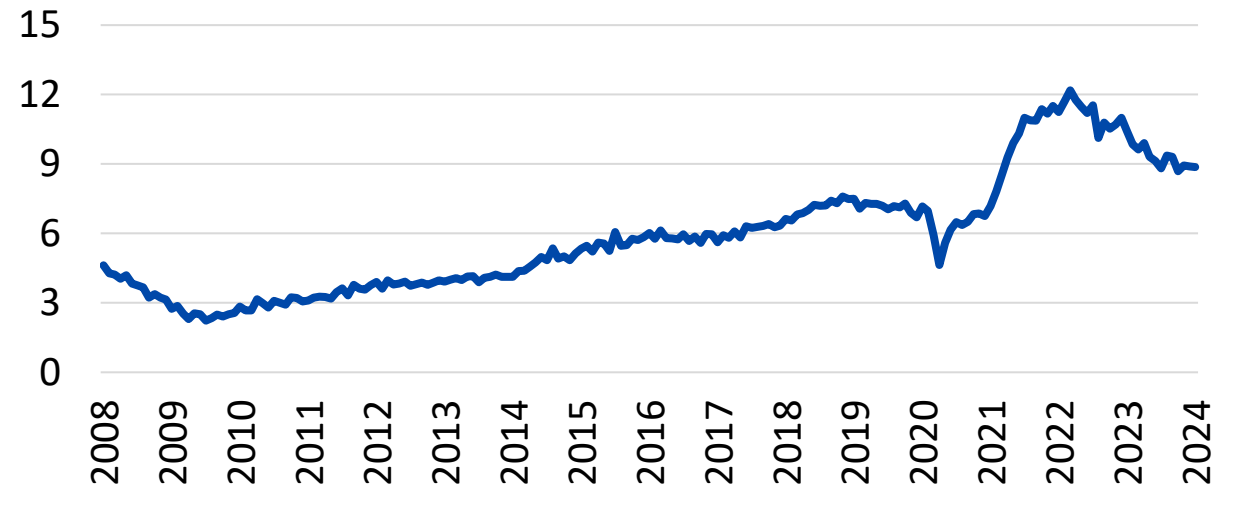
Left chart: Data through August | Source: Yardi Matrix; Moody's Analytics; U.S. Census Bureau

The Labor Market Continues to Loosen

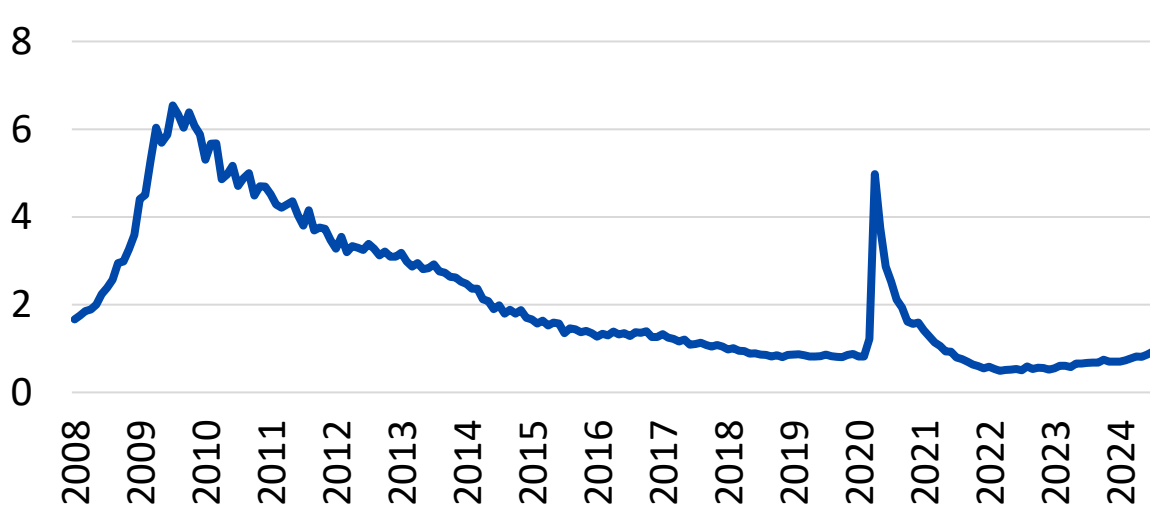
Unemployment & Underemployment



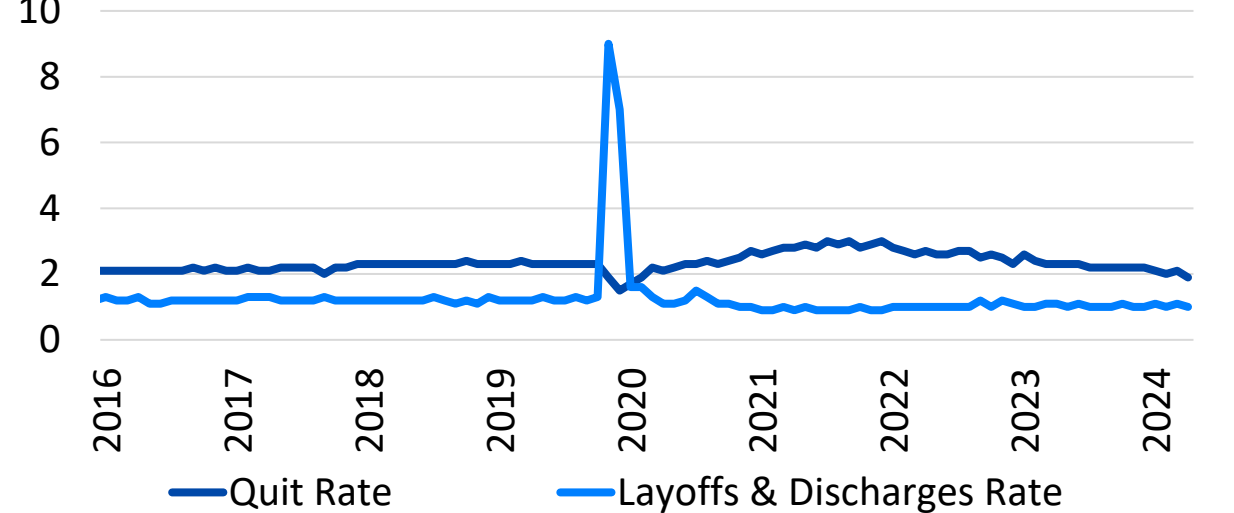
U.S. Job Vacancies, Millions



Unemployed Persons/Job Openings



Quits vs. Layoffs

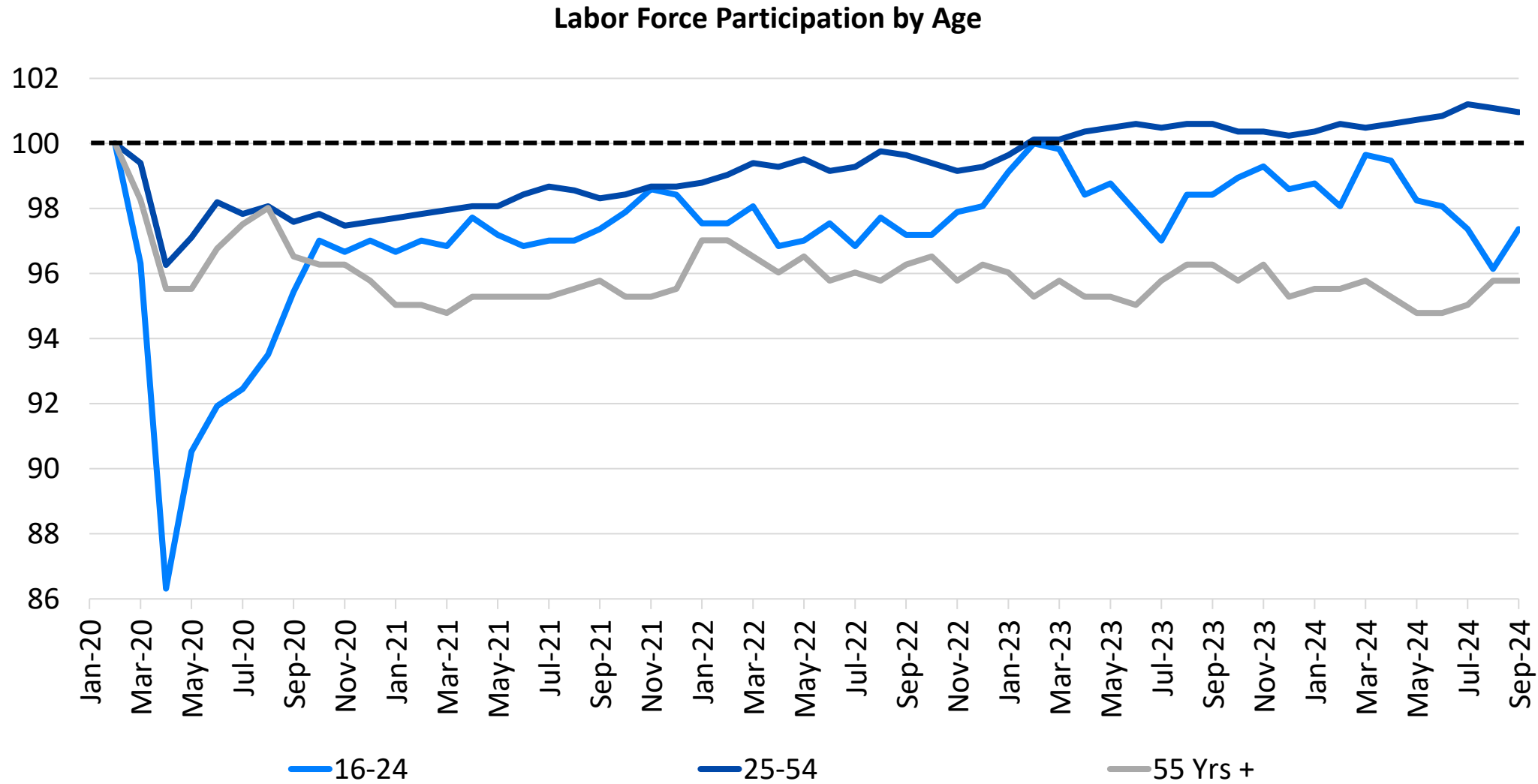


*U-6: Unemployed + Marginally Attached + Part-Time for Economic Reasons. Data through August 2024 except for top right chart (data through January)

Source: Yardi Matrix; Bureau of Labor Statistics; Federal Reserve Bank of St. Louis

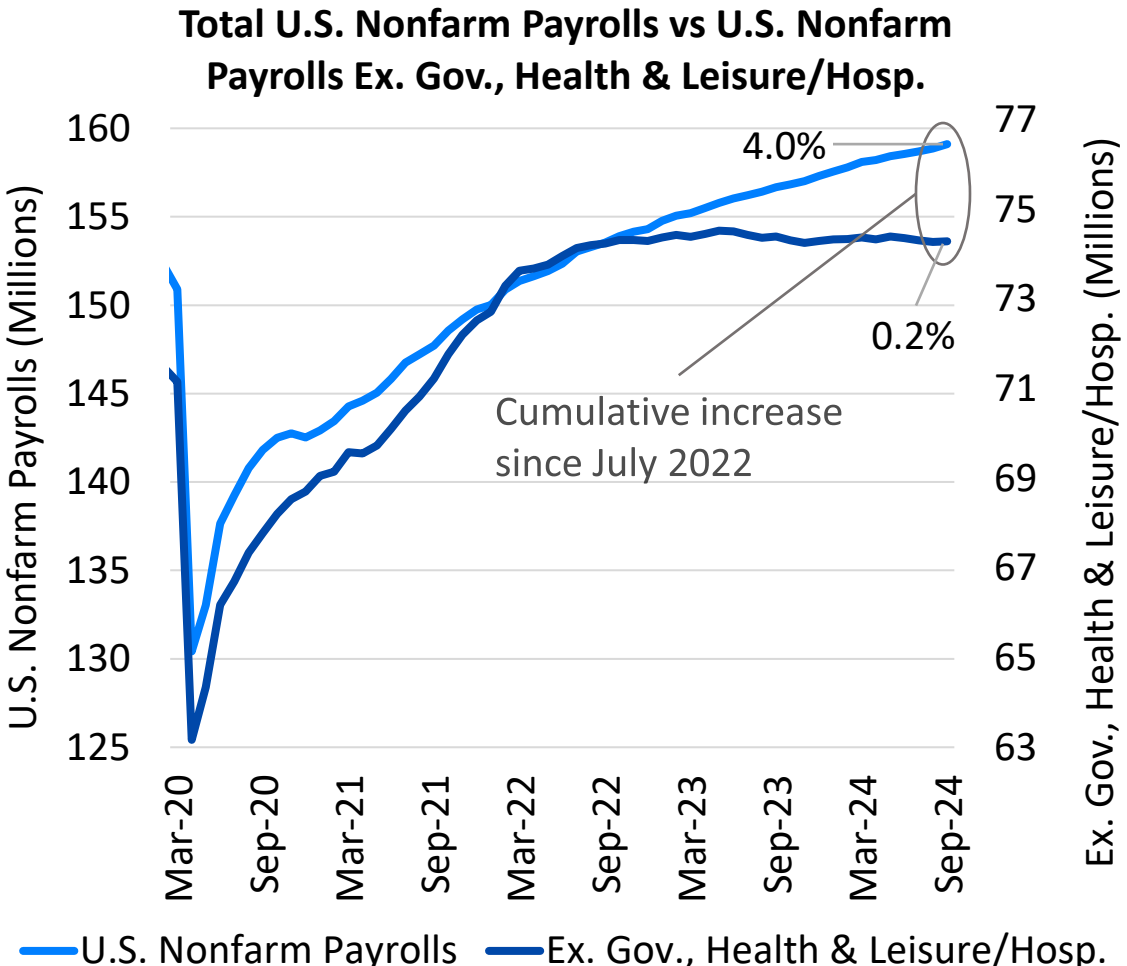
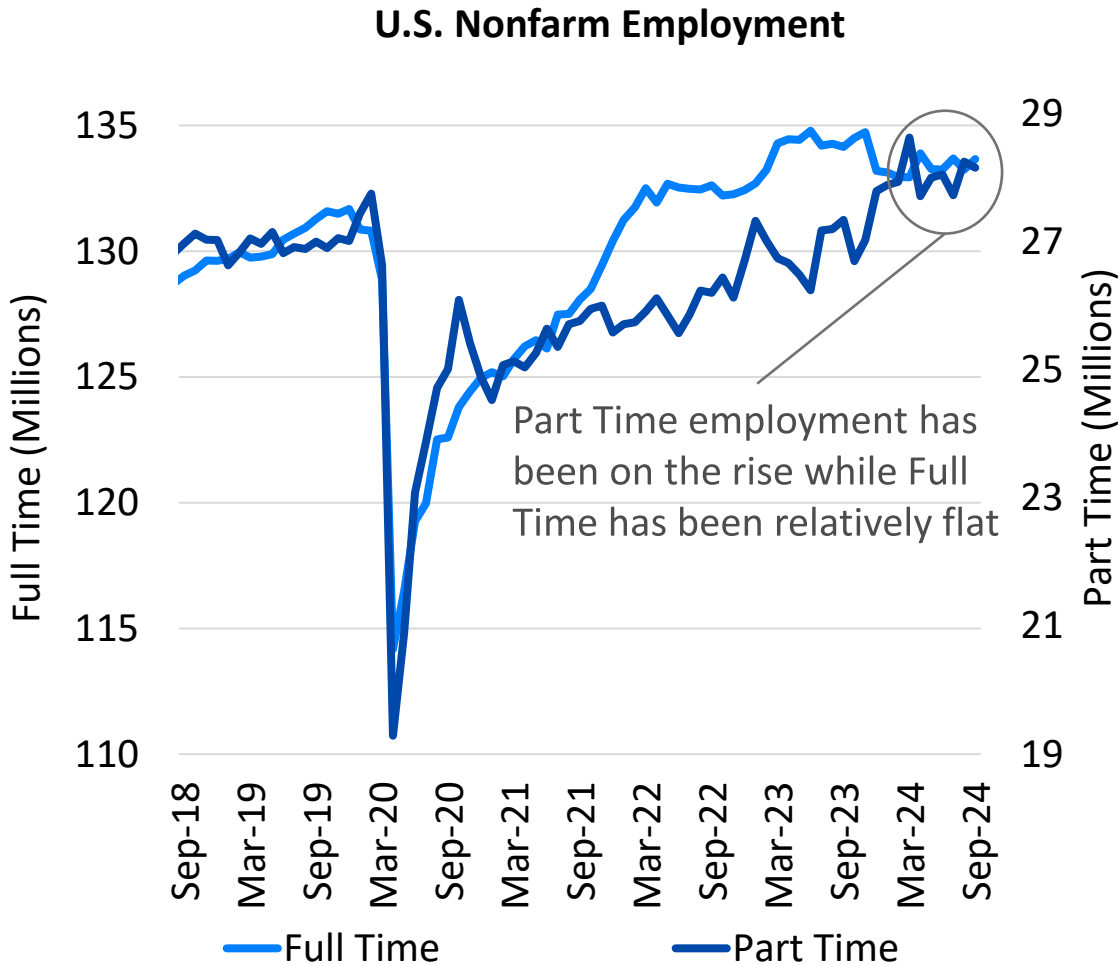


The Labor Force Has Fully Recovered for Prime Age Adults (but Not for Older Americans), thus Mitigating Wage Growth and Tempering Inflation



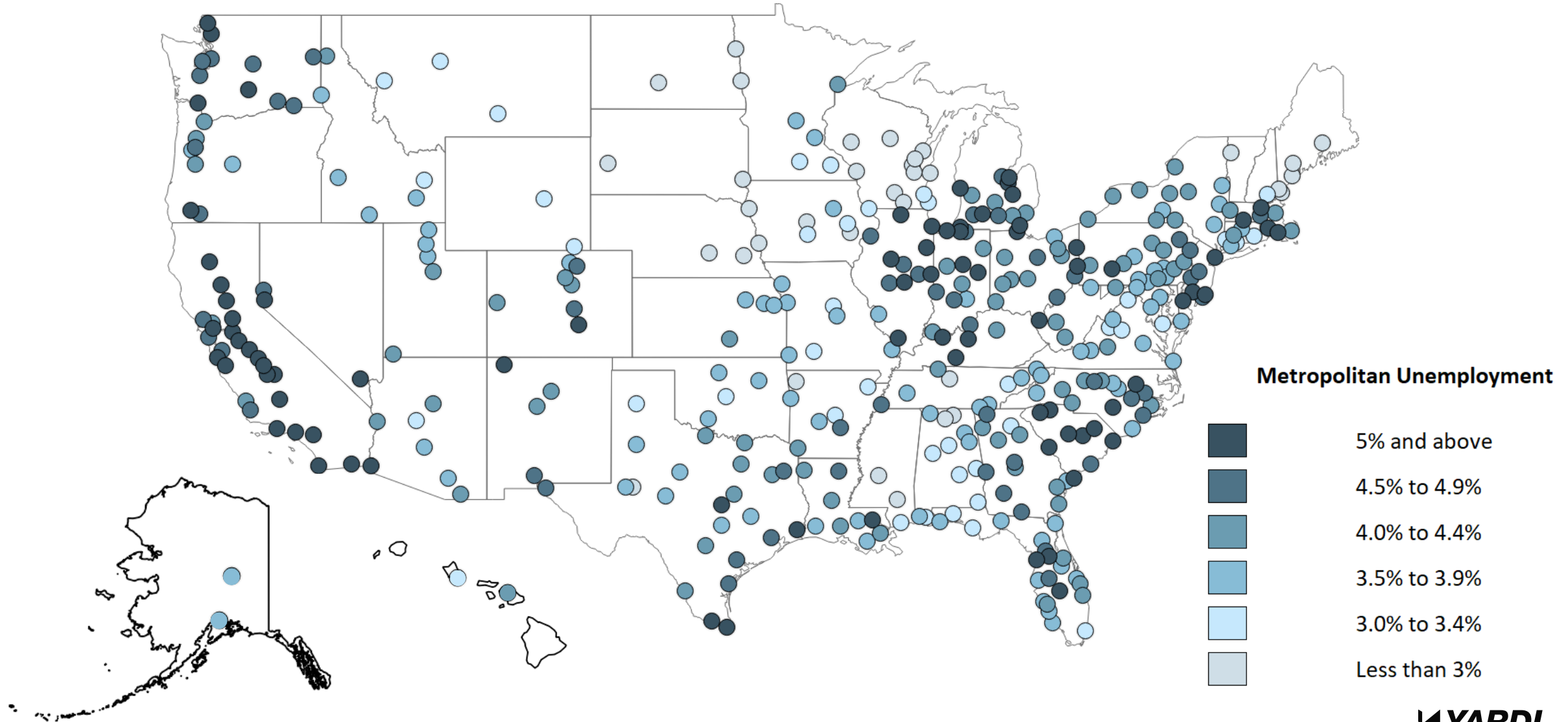
Source: Yardi Matrix; U.S. Bureau of Labor Statistics

Despite a Good Jobs Report, the Employment Picture is Not as Strong as it Seems

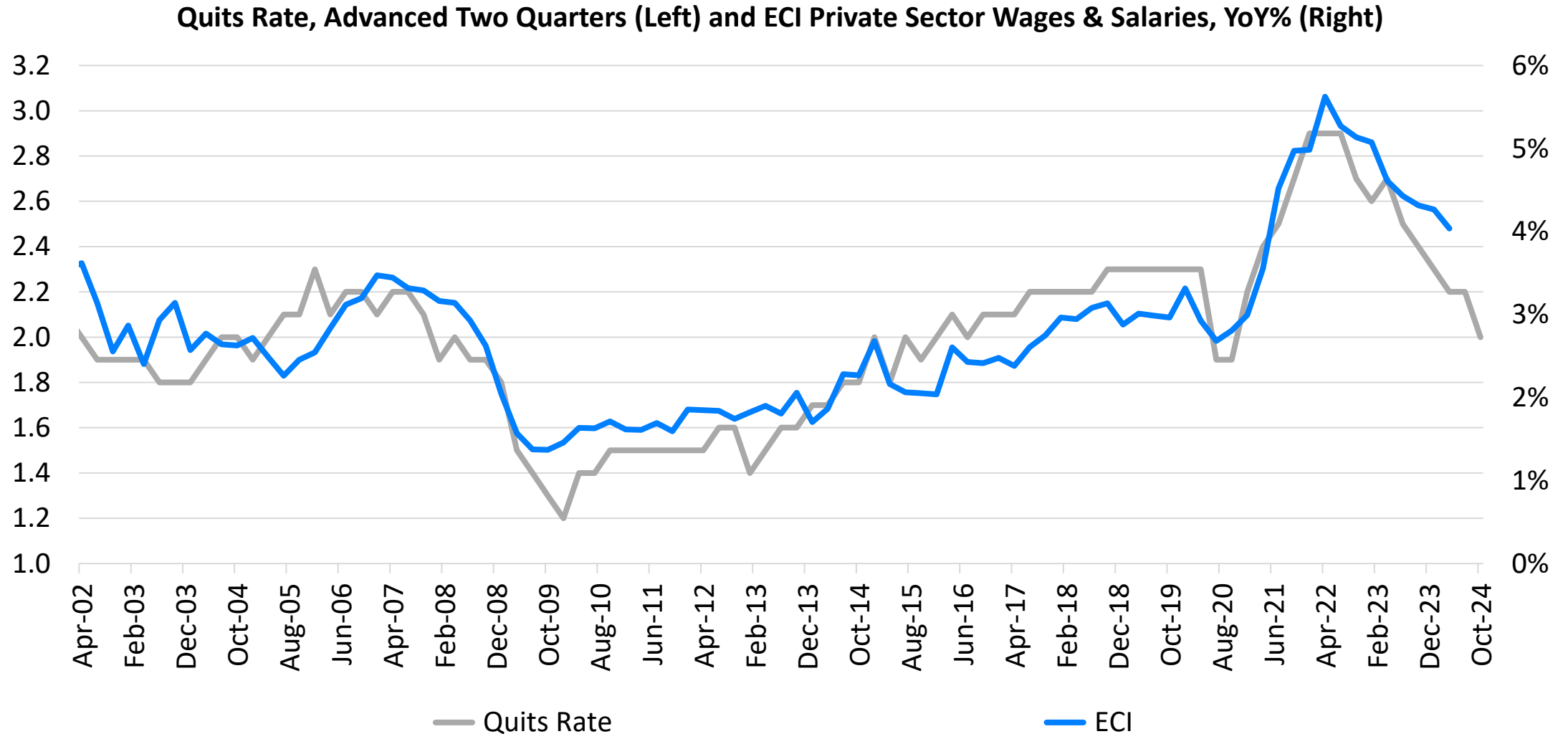


Source: Yardi Matrix; Moody's Analytics; U.S. Bureau of Labor Statistics

West Coast & Midwest Cities Are Experiencing Higher Unemployment Rates

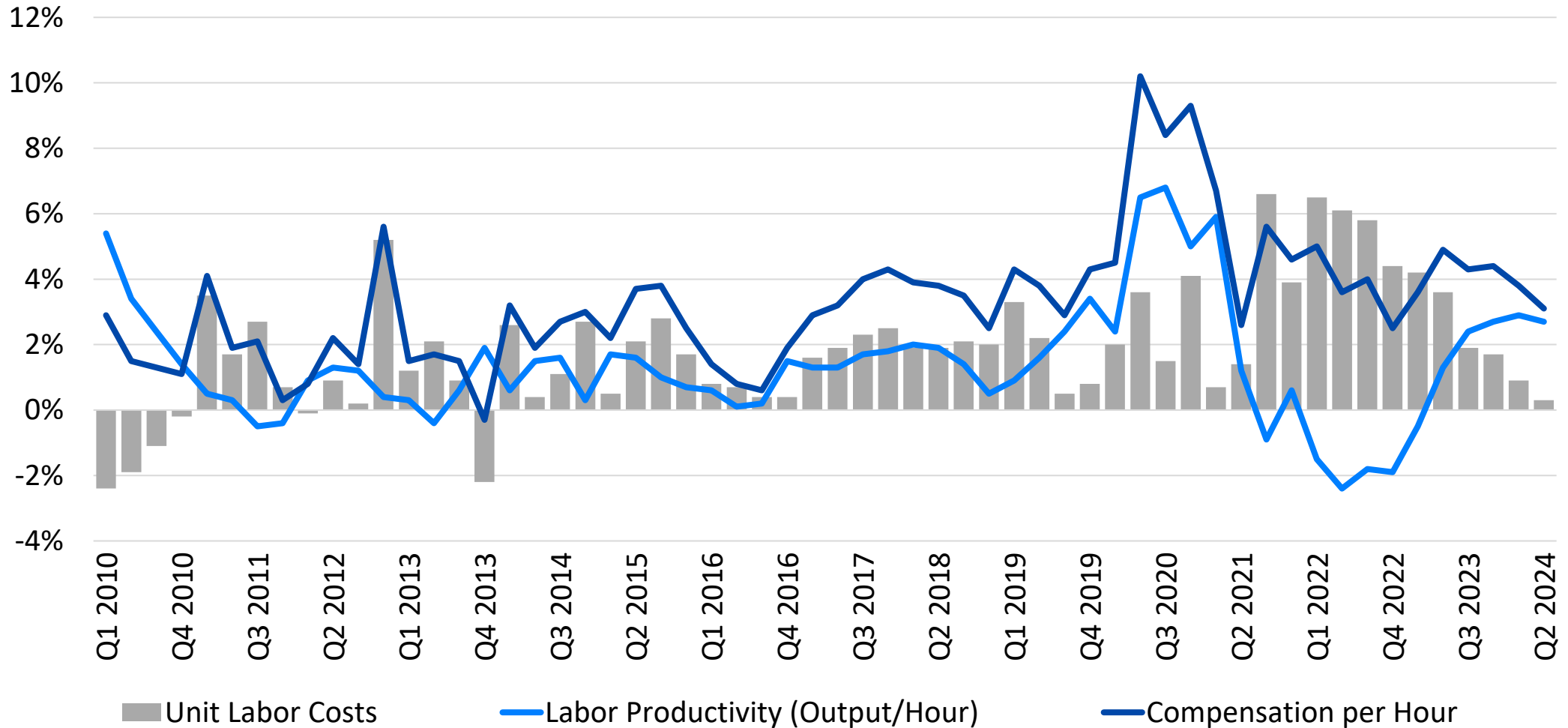


Plunging Quits Suggest a Sharp Slowdown in Wage Growth, a Positive in Controlling Inflation and Supporting Future Short-Term Interest Rate Reductions



Unit Labor Costs, a Measure of Underlying Inflation, Has Moderated as Compensation Growth Slows and Labor Productivity Remains Strong

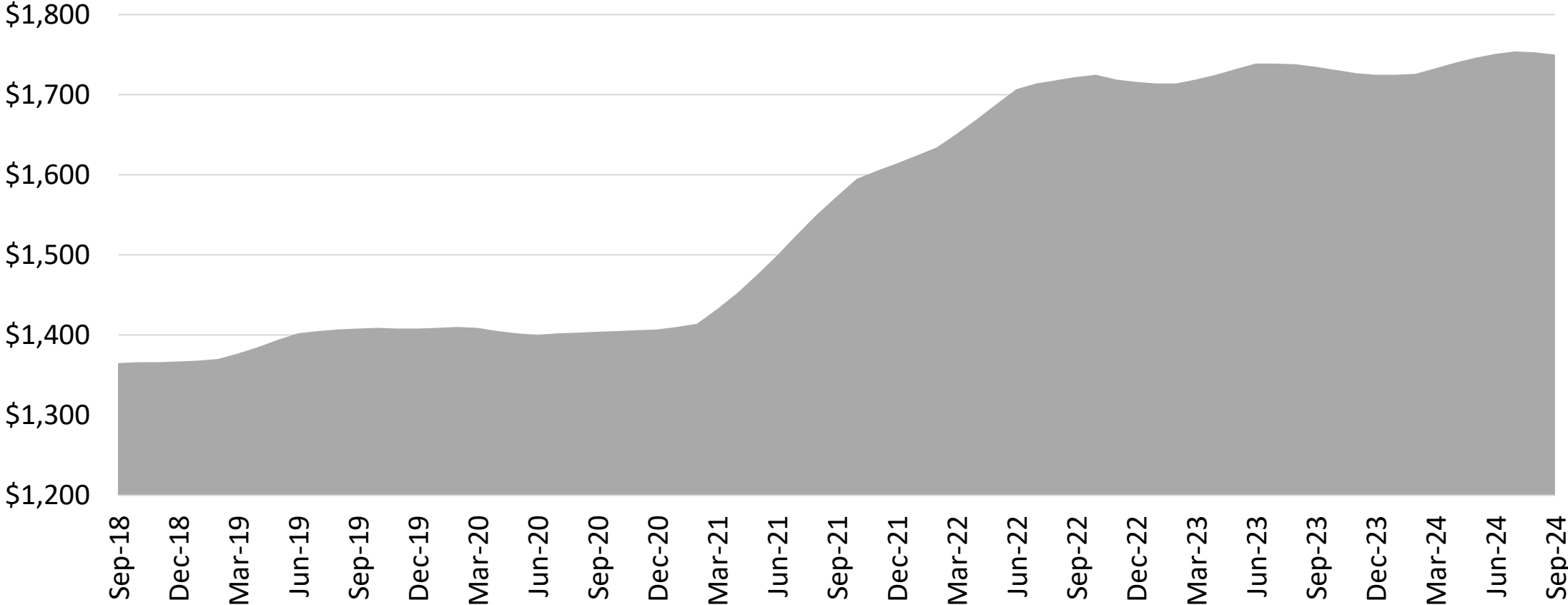
Productivity & Costs: Year-Over-Year % Change



MULTIFAMILY PERFORMANCE AND MEDIUM-TERM FORECASTS

National Multifamily Rent Growth Has Remained Fairly Stable in Recent Months

National Average Rents

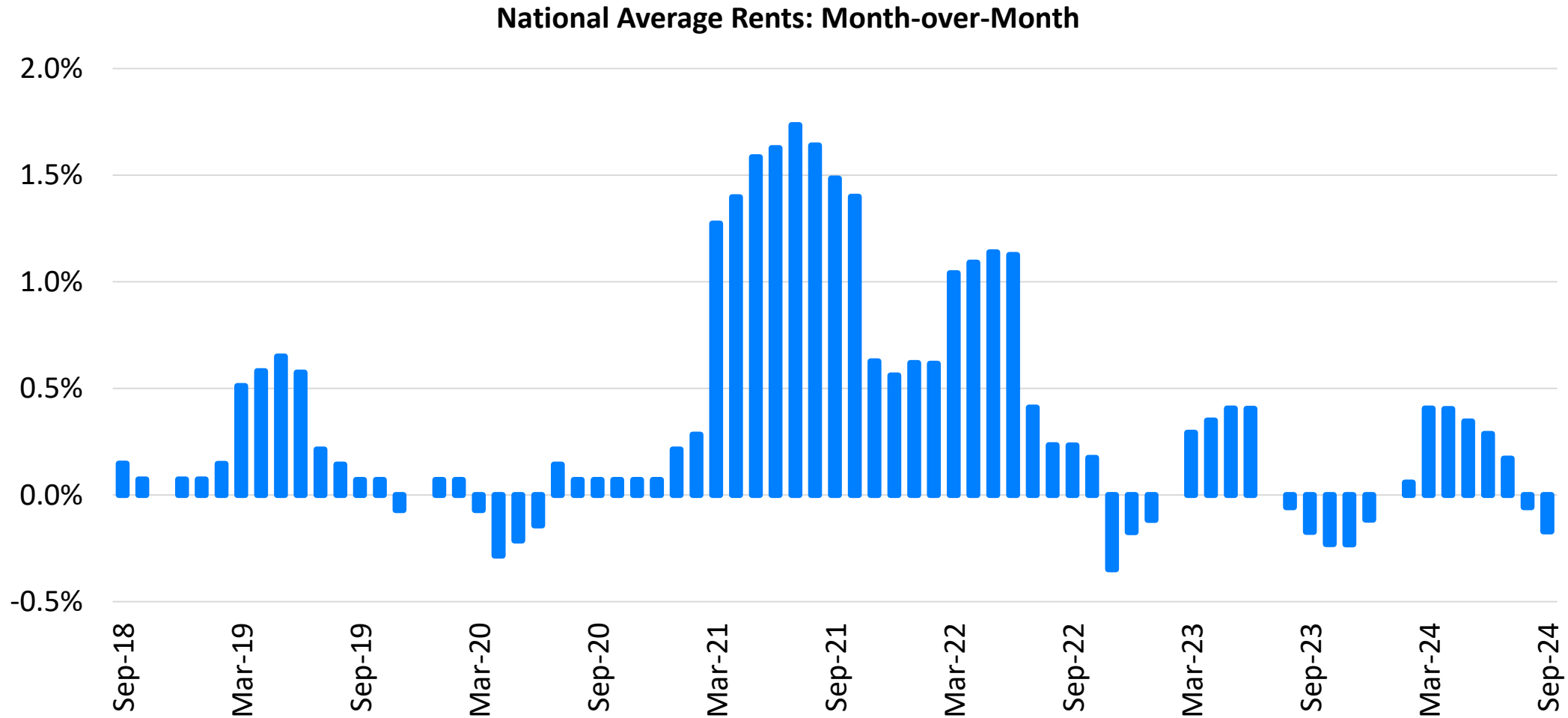


	% Change	\$ Change
Year-over-Year: Sept '23 – Sept '24	0.9%	\$15
Month-over-Month: Aug '24 – Sept '24	-0.2%	-\$3
Pre-pandemic to Current: Feb '20 – Sept '24	24.1%	\$340

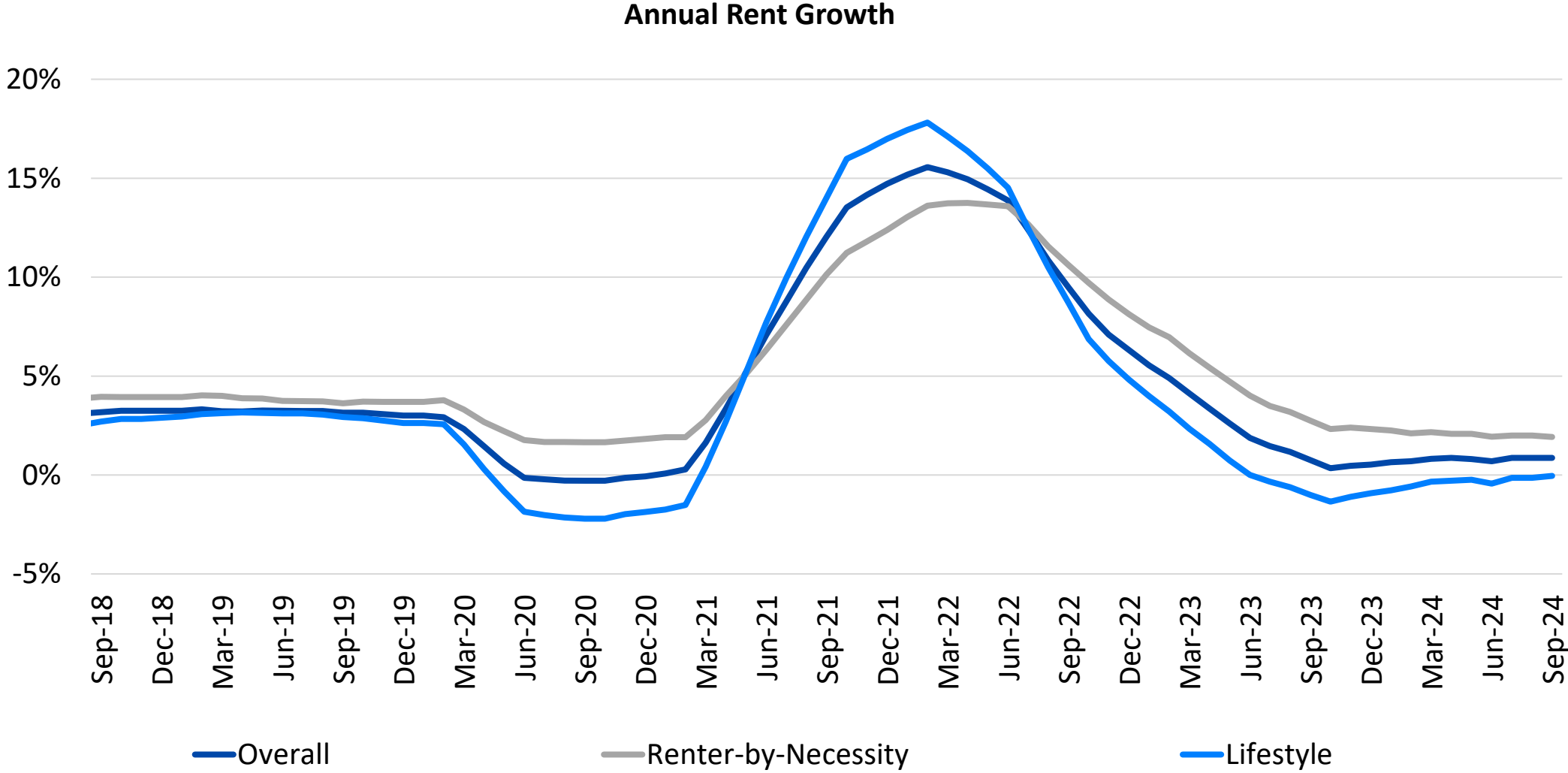


Source: Yardi Matrix

Monthly Rent Growth Dipped in September, Following Typical Seasonal Patterns

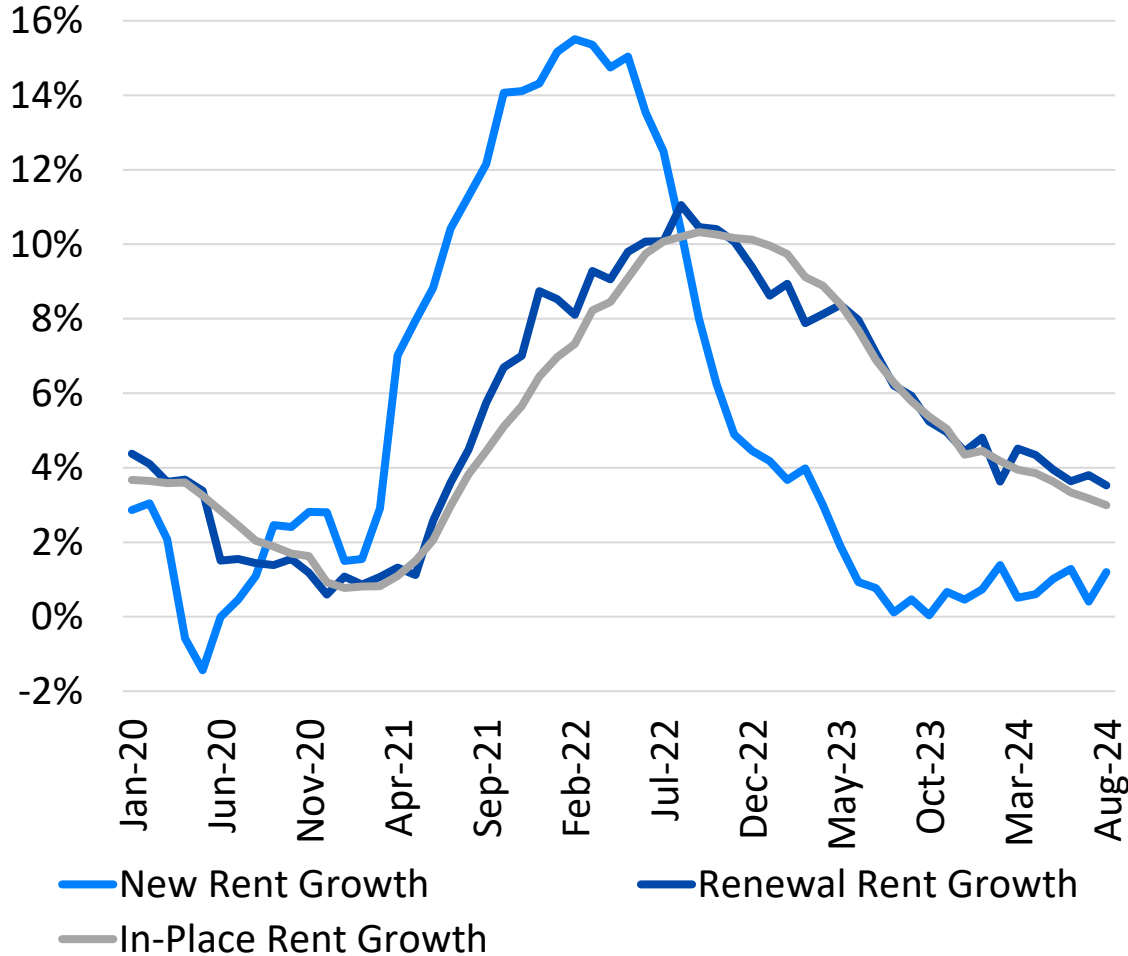


Lifestyle Rent Growth Surged in Early 2021, but Has Since Fallen Behind Renter-by-Necessity Rent Growth

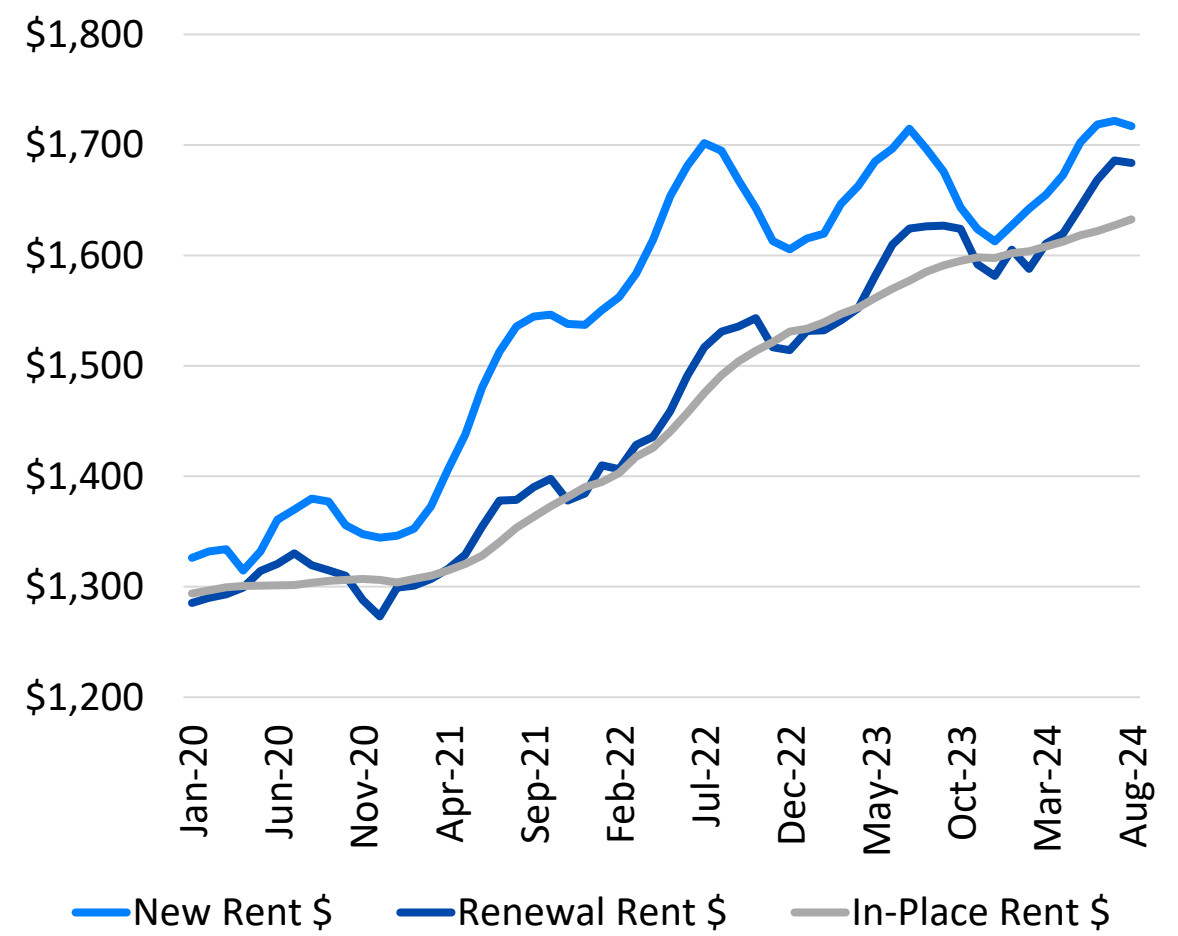


Multifamily Rent Growth on New, Renewal and In-Place Transacted Leases Remain Positive

National Year-over-Year Rent Growth



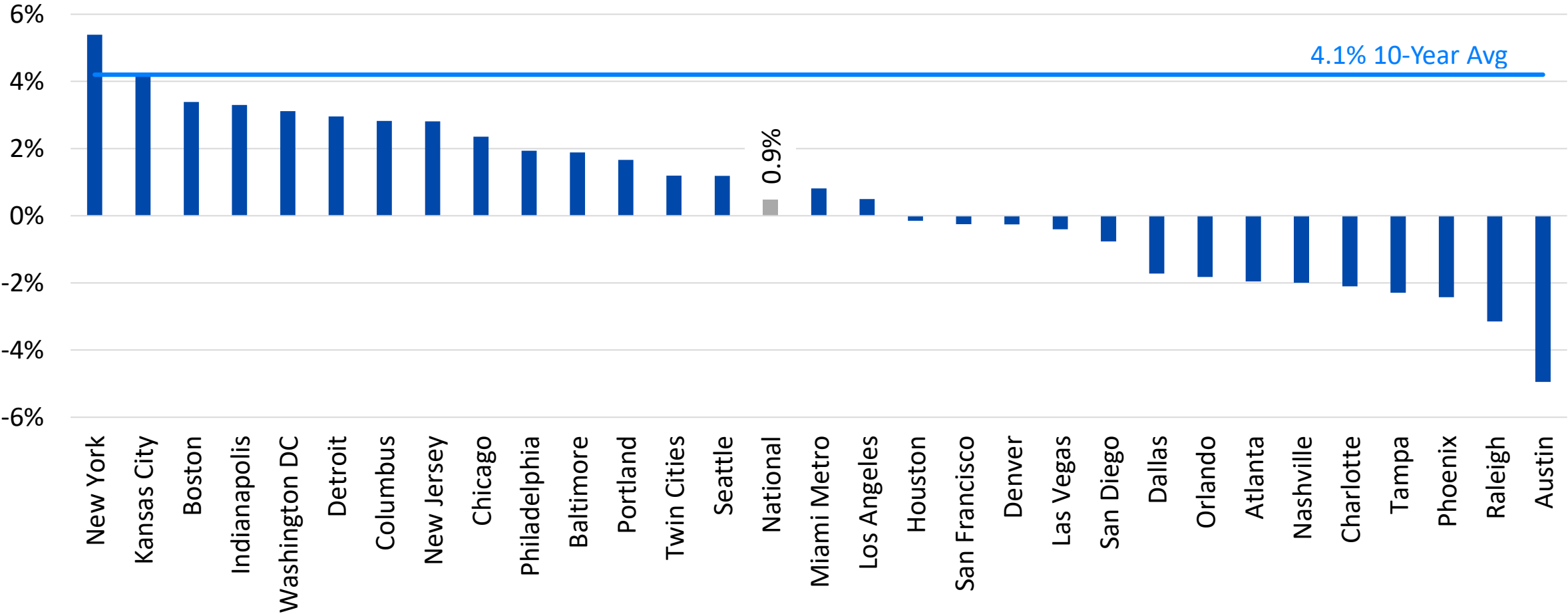
National Average Rents



Source: Yardi Matrix Expert

Rent Growth Has Been Softening in Many Matrix Top Markets

Year-Over-Year Rent Growth - All Asset Classes



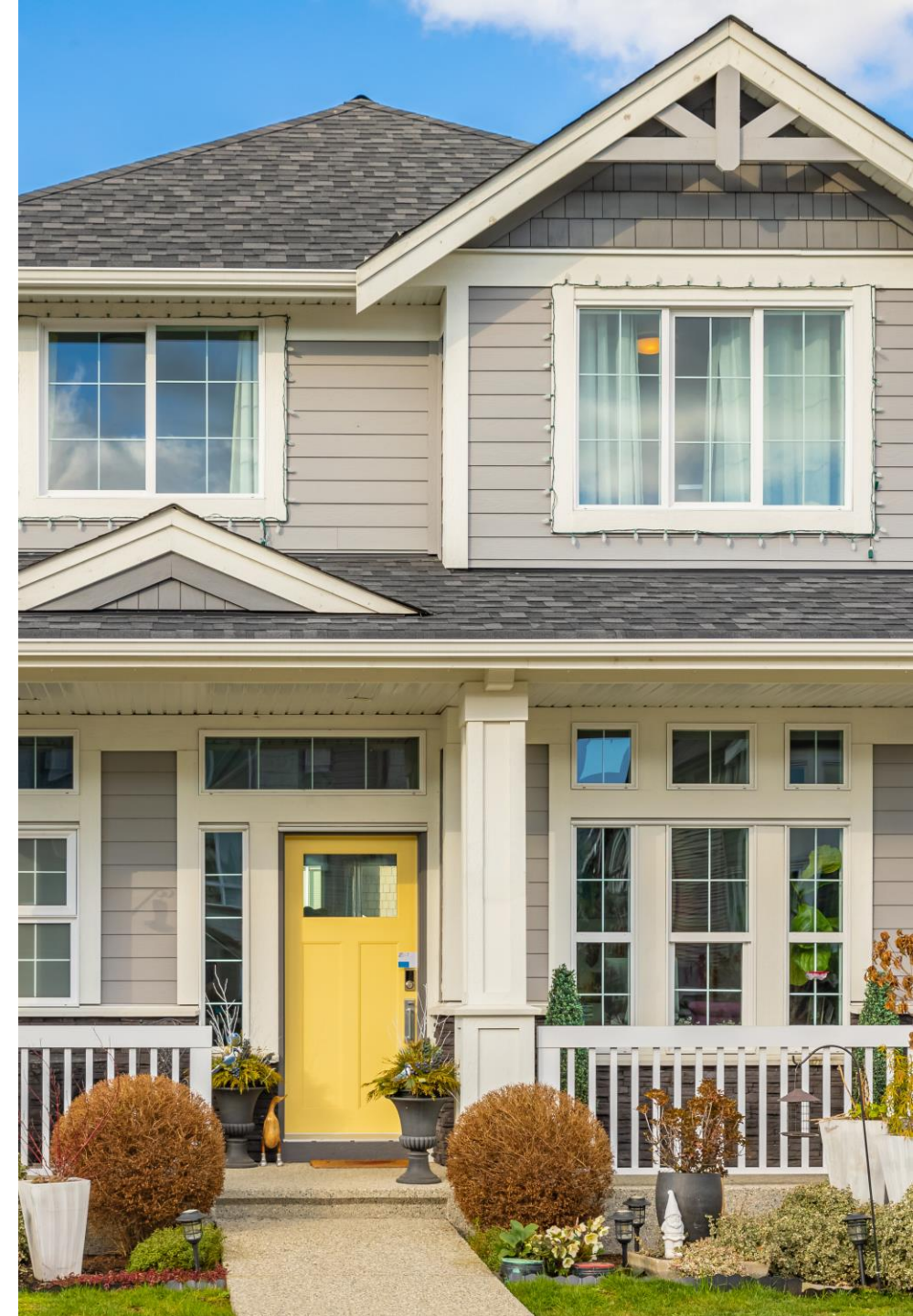
Yardi Matrix Multifamily Forecast Summary

Year-End	Rent	Rent Growth	Occupancy	Occupancy Growth	Inventory Forecast
2024	\$1,744	1.7%	94.6%	0.0%	554,288
2025	\$1,827	4.8%	94.7%	0.1%	508,089
2026	\$1,954	7.0%	94.7%	0.0%	371,509
2027	\$2,039	4.3%	94.7%	0.0%	326,911
2028	\$2,086	2.3%	94.6%	-0.1%	404,559
2029	\$2,151	3.1%	94.5%	-0.1%	426,485



Takeaways from Our September 2024 Multifamily Rent and Occupancy Forecast

- National multifamily advertised rents decreased month-over-month by 0.2% to \$1,750 in September, while year-over-year rent growth was unchanged at 0.9%
- Secondary markets in the Midwest and Northeast are still seeing the strongest rent growth, while markets that saw explosive growth during the pandemic are dealing with a large influx of supply that is now tempering rent growth as new units get absorbed
- Our national rent forecast has decreased to 1.7%
- Overall, we are experiencing normalization in rent growth across markets and a compression in the overall spread of rent growth
 - Rental growth in the next two years will be stronger than this year, as it will take some time for the Fed's eventual rate cuts to meaningfully impact consumer demand



Tech Hub and Gateway Markets Are Forecasted For a Modest Year of Multifamily Rent Growth

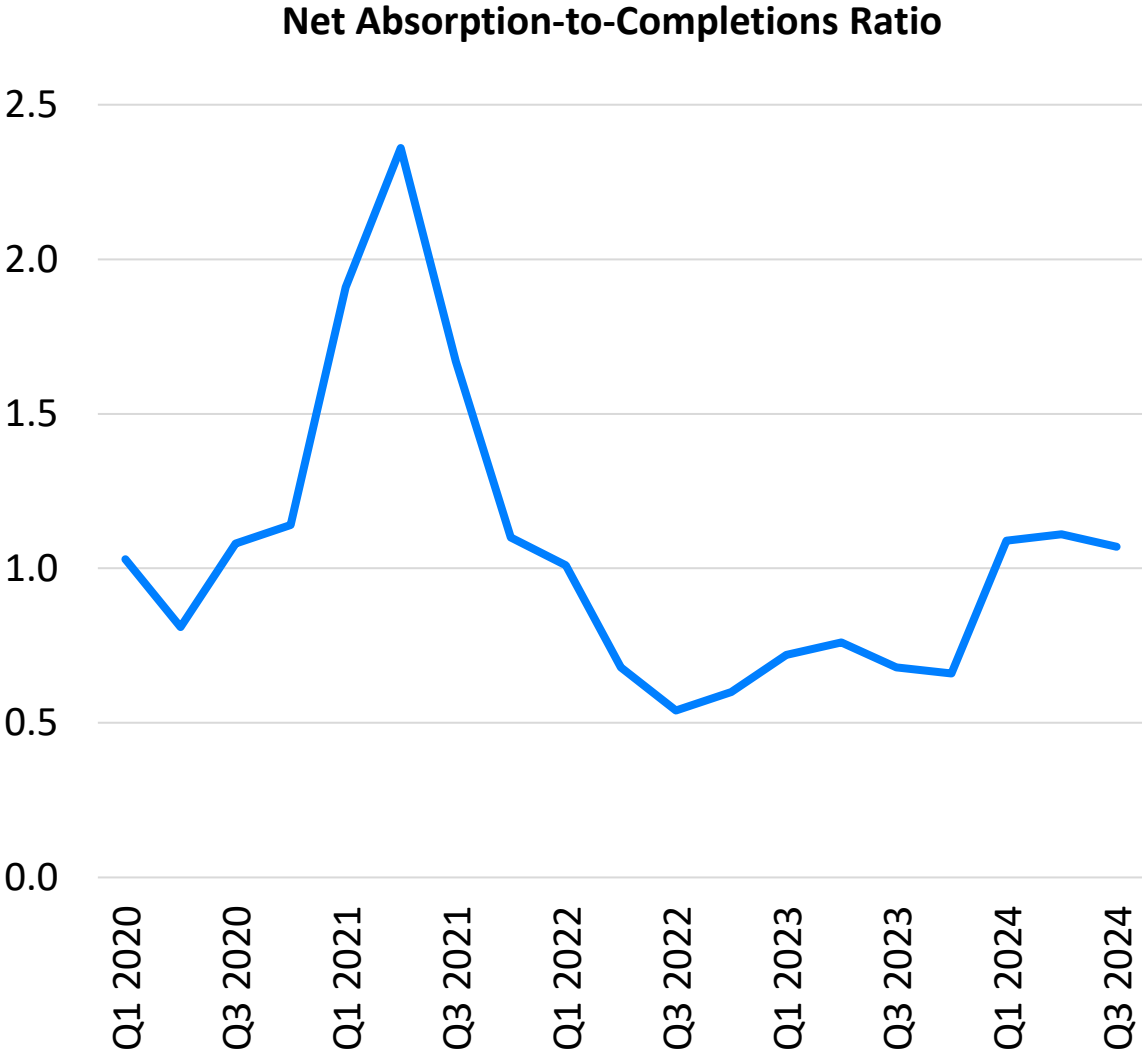
Market	YoY Rent Growth Year-End 2024	Occupancy Year-End 2024	YoY Rent Growth Year-End 2025	Occupancy Year-End 2025
New York	4.7%	98.2%	4.9%	98.4%
Kansas City	4.0%	94.6%	5.8%	94.8%
Indianapolis	3.4%	94.0%	4.4%	94.2%
Boston	3.3%	96.4%	4.9%	96.5%
Columbus	3.3%	94.8%	3.8%	95.0%
New Jersey	3.3%	97.1%	4.2%	97.3%
Washington DC	3.2%	95.1%	4.4%	95.2%
Chicago	2.8%	95.6%	3.7%	95.7%
Philadelphia	2.1%	95.6%	3.4%	95.7%
Miami	2.0%	95.5%	3.0%	95.6%
Detroit	1.8%	94.7%	3.4%	94.8%
Seattle	1.6%	95.3%	3.8%	95.4%
Baltimore	1.4%	94.6%	3.4%	94.7%
Twin Cities	1.3%	95.0%	3.1%	95.1%
Denver	0.9%	94.9%	3.0%	95.0%

Market	YoY Rent Growth Year-End 2024	Occupancy Year-End 2024	YoY Rent Growth Year-End 2025	Occupancy Year-End 2025
Portland	0.3%	94.8%	4.5%	94.9%
San Diego	0.3%	96.1%	3.1%	96.2%
Houston	0.3%	92.6%	2.9%	92.8%
Los Angeles	0.0%	95.9%	3.6%	96.0%
Las Vegas	-0.4%	93.5%	1.8%	93.7%
San Francisco	-0.7%	95.3%	1.8%	95.4%
Dallas	-1.3%	93.0%	2.5%	93.1%
Tampa	-1.3%	94.2%	2.1%	94.4%
Nashville	-1.4%	94.1%	2.7%	94.3%
Charlotte	-1.5%	93.6%	2.4%	93.8%
Orlando	-2.1%	94.2%	1.2%	94.3%
Atlanta	-2.6%	92.6%	2.2%	92.8%
Raleigh - Durham	-2.6%	93.7%	1.7%	93.9%
Phoenix	-2.8%	93.4%	1.3%	93.5%
Austin	-4.5%	93.0%	1.3%	93.2%



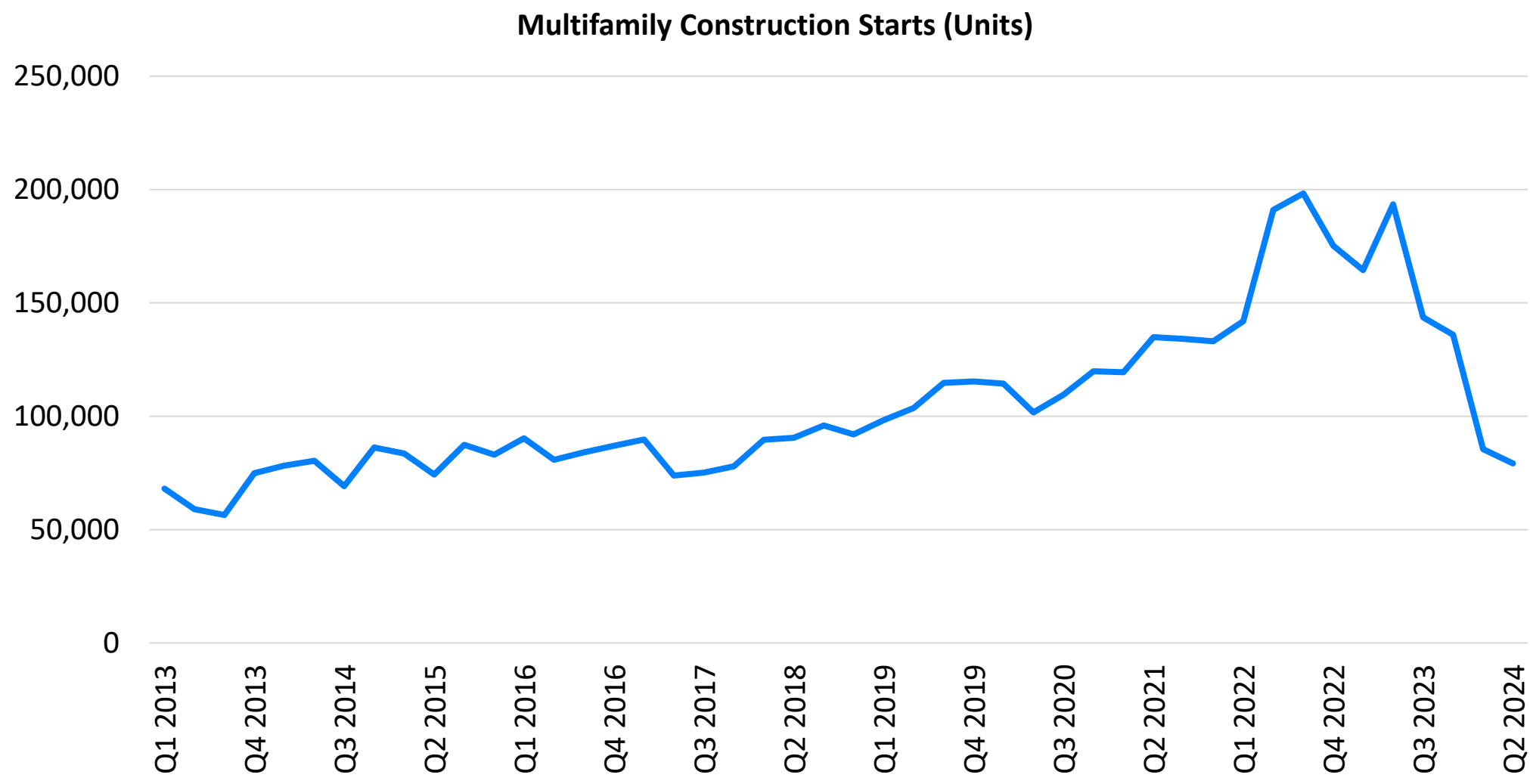
Compared to 2022 & 2023, Net Absorption-to-Completions Have Increased in 2024

Quarter	Completed Units	Net Absorbed Units	Net Absorption-to-Completions Ratio
Q1 2020	80,402	82,537	1.03
Q2 2020	67,230	54,124	0.81
Q3 2020	81,773	88,702	1.08
Q4 2020	91,292	104,506	1.14
Q1 2021	93,000	177,921	1.91
Q2 2021	85,344	201,072	2.36
Q3 2021	101,392	169,427	1.67
Q4 2021	93,846	102,936	1.10
Q1 2022	77,348	78,404	1.01
Q2 2022	80,758	54,751	0.68
Q3 2022	87,402	47,437	0.54
Q4 2022	78,570	47,101	0.6
Q1 2023	79,890	57,699	0.72
Q2 2023	98,876	75,309	0.76
Q3 2023	111,280	75,399	0.68
Q4 2023	120,103	79,486	0.66
Q1 2024	102,450	111,229	1.09
Q2 2024	115,503	127,779	1.11
Q3 2024	84,656	90,194	1.07



Values for recent quarters will be restated as new completions are confirmed | Source: Yardi Matrix

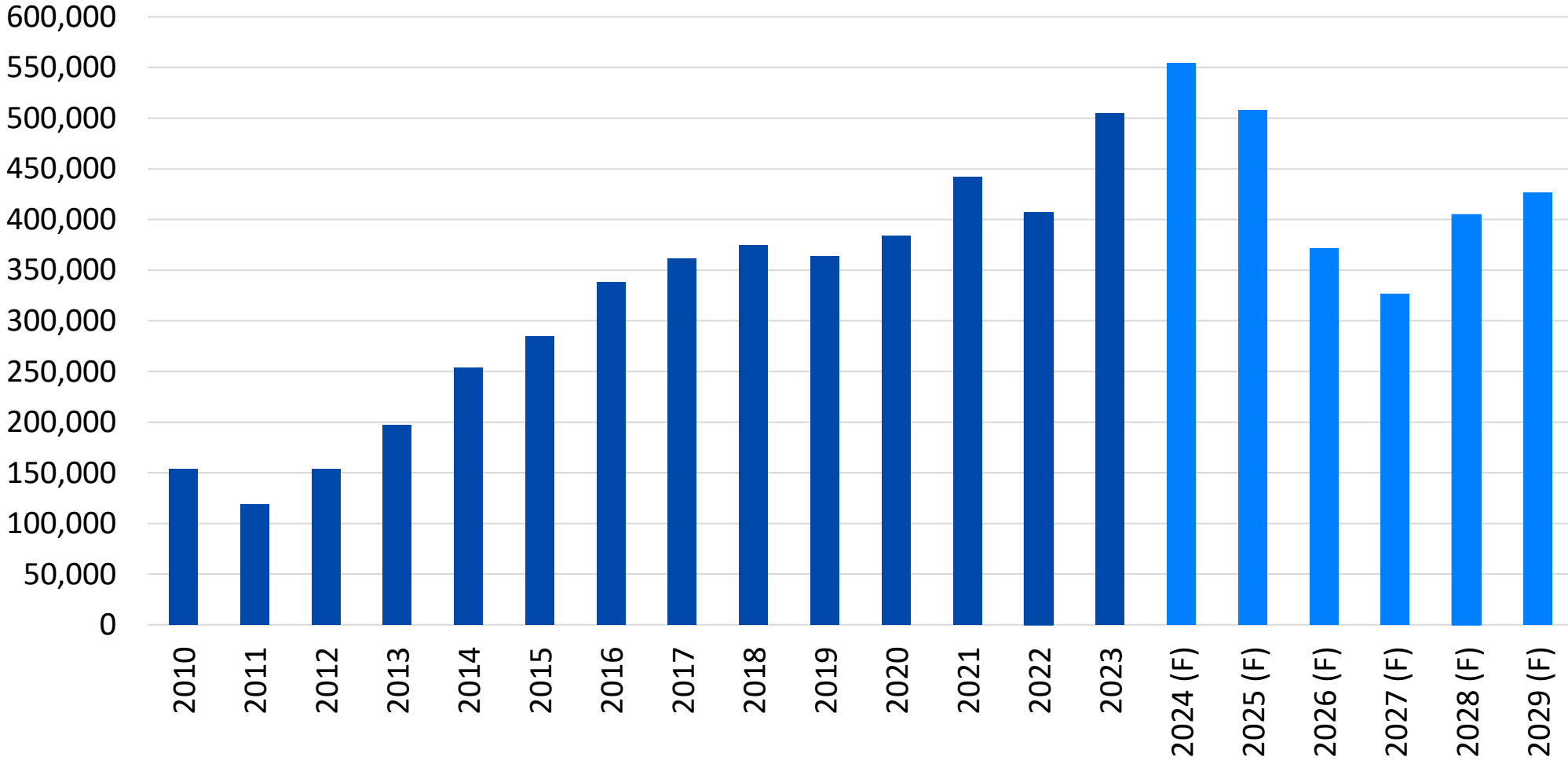
Multifamily Construction Starts Have Been Trending Down Since Q2 2023



Source: Yardi Matrix

New Multifamily Supply is Expected to Decline After 2024's Peak

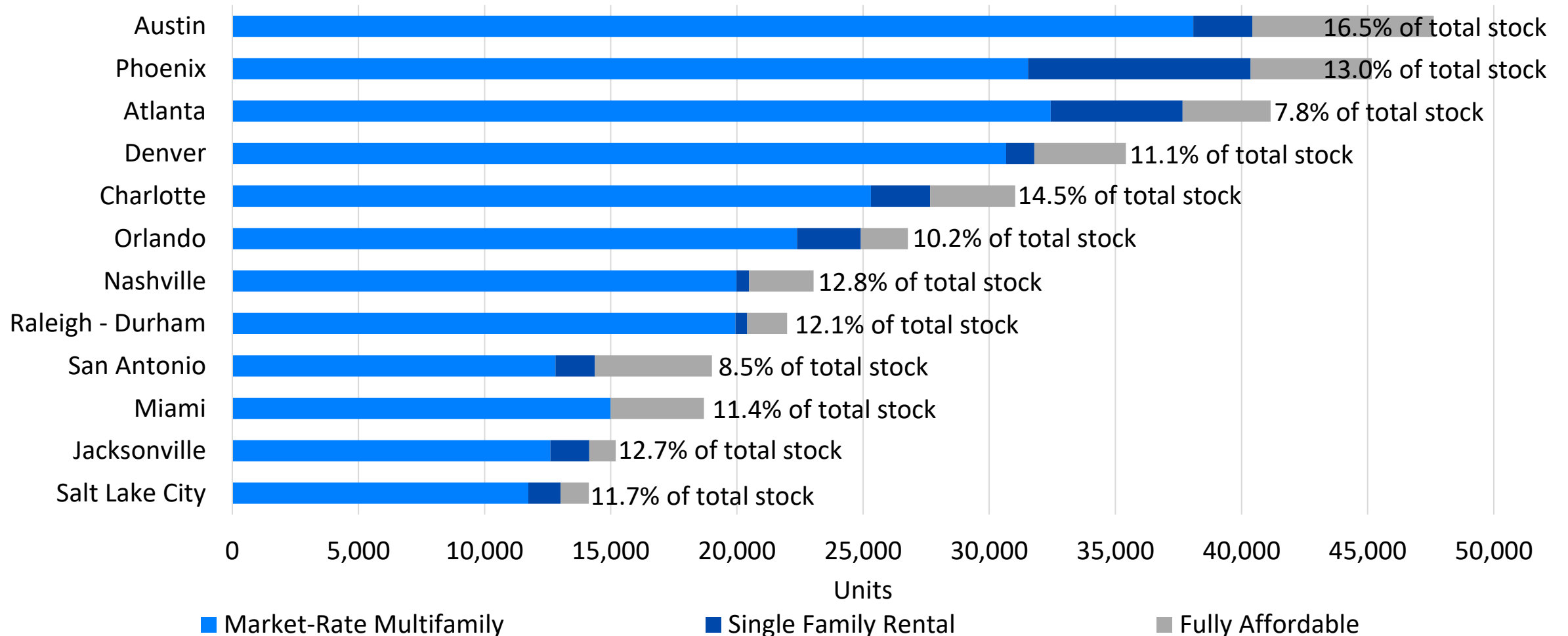
Multifamily Supply Pipeline



Inventory forecast includes single-family rentals and affordable housing and excludes student housing | Source: Yardi Matrix

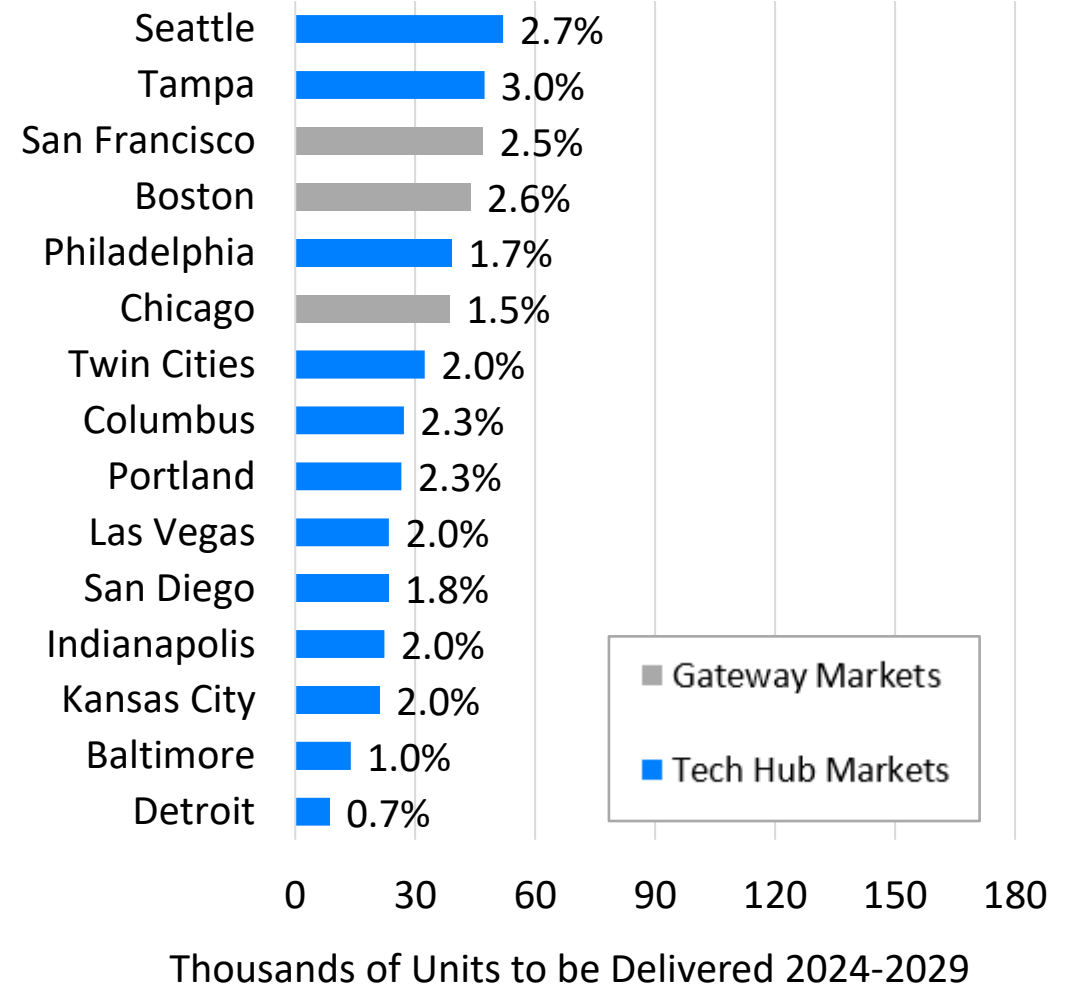
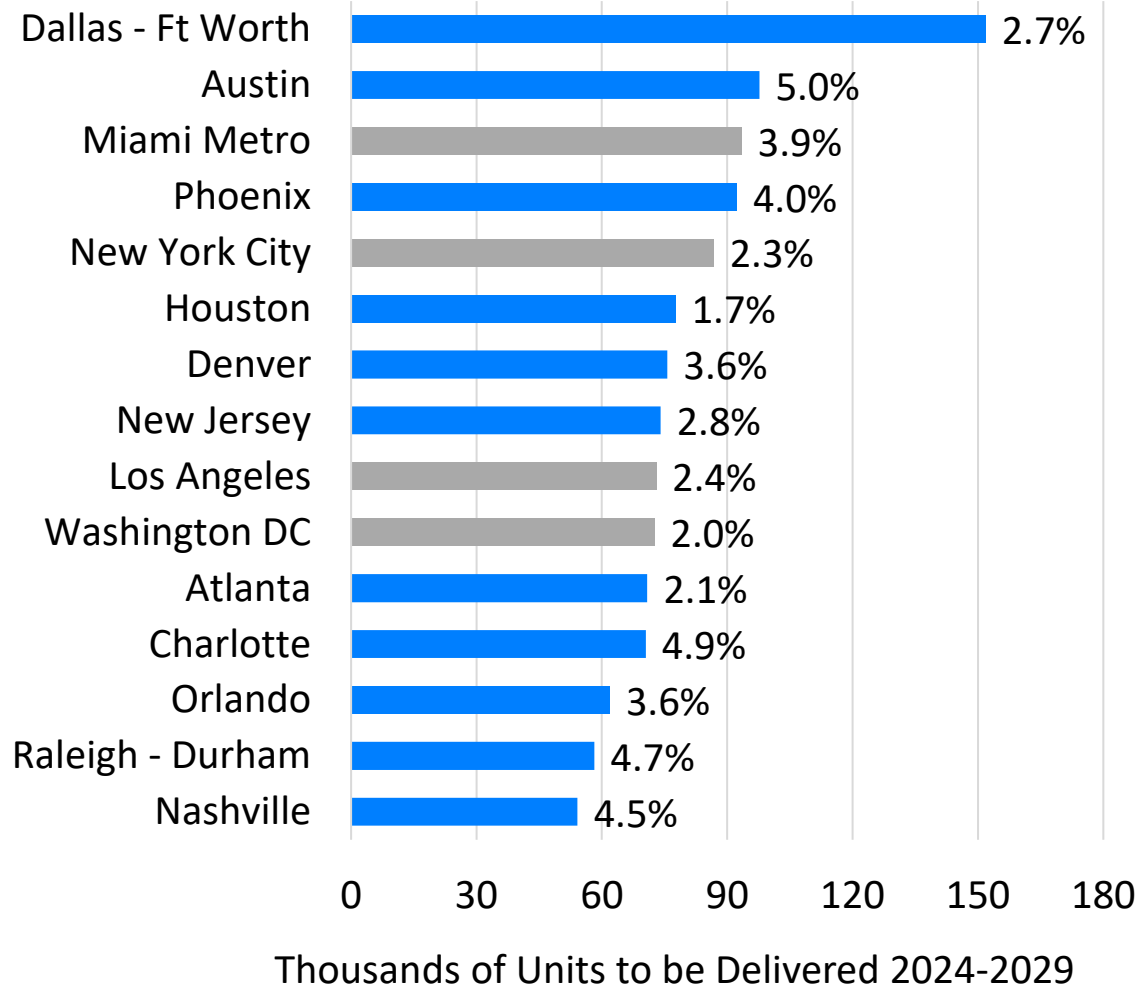
There are ~15-20 Markets with a Lot of Supply to Digest in '24- '25

Forecasted New Unit Deliveries (2024-2025)



For Almost All Markets, the Amount of New Supply Over a 5 Year Period is Quite Manageable, and Not Enough to Resolve the Supply Shortage

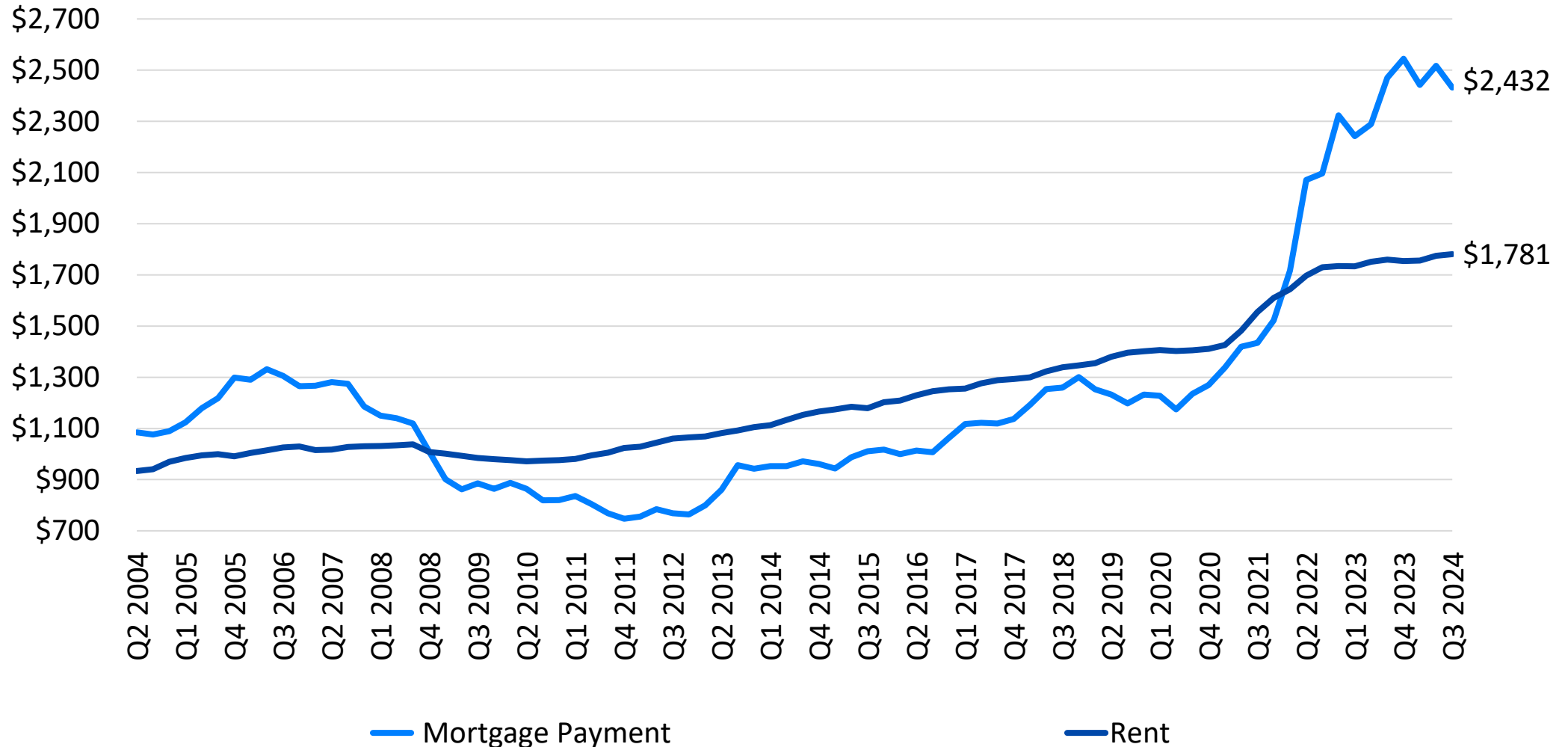
Forecasted New Unit Deliveries 2024-2029 - Percentages Denote Compound Annual Growth Rates



AFFORDABILITY

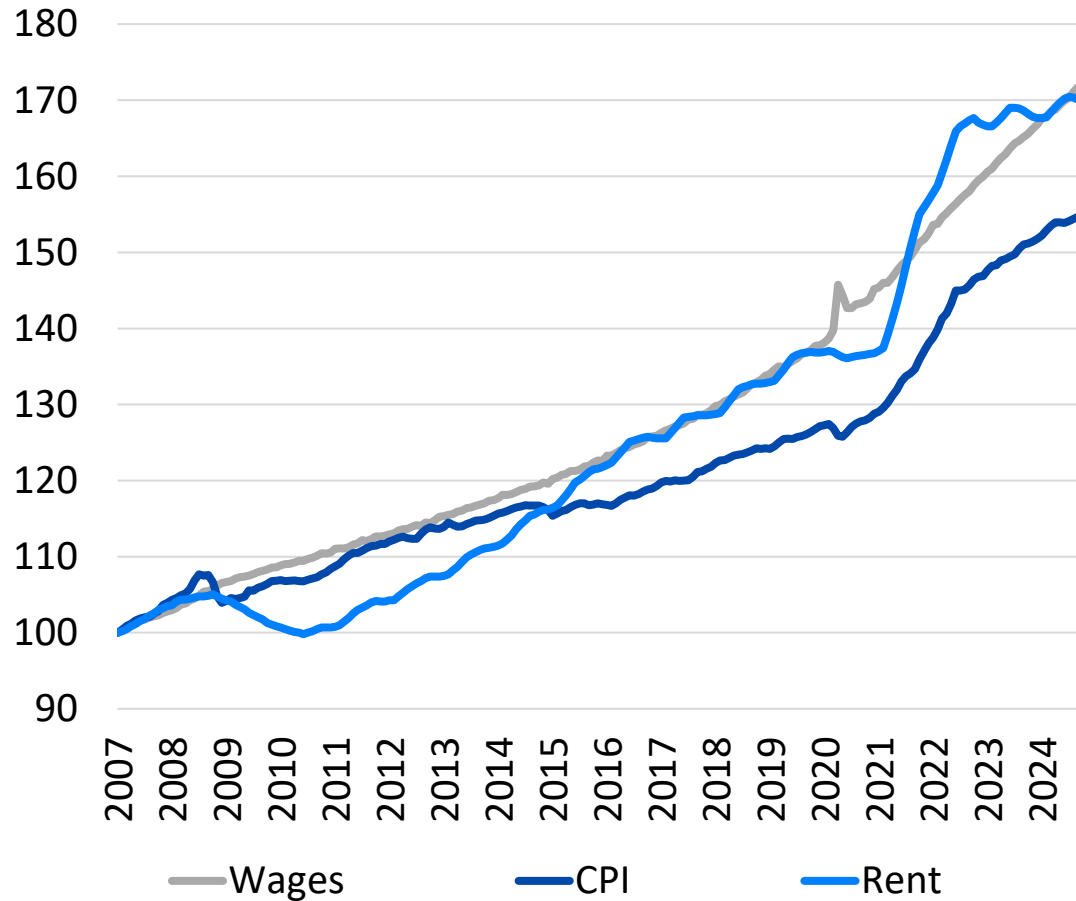
Renting is Still a Better Deal Compared to the Cost of Owning

Home Mortgage Payment vs. Rent

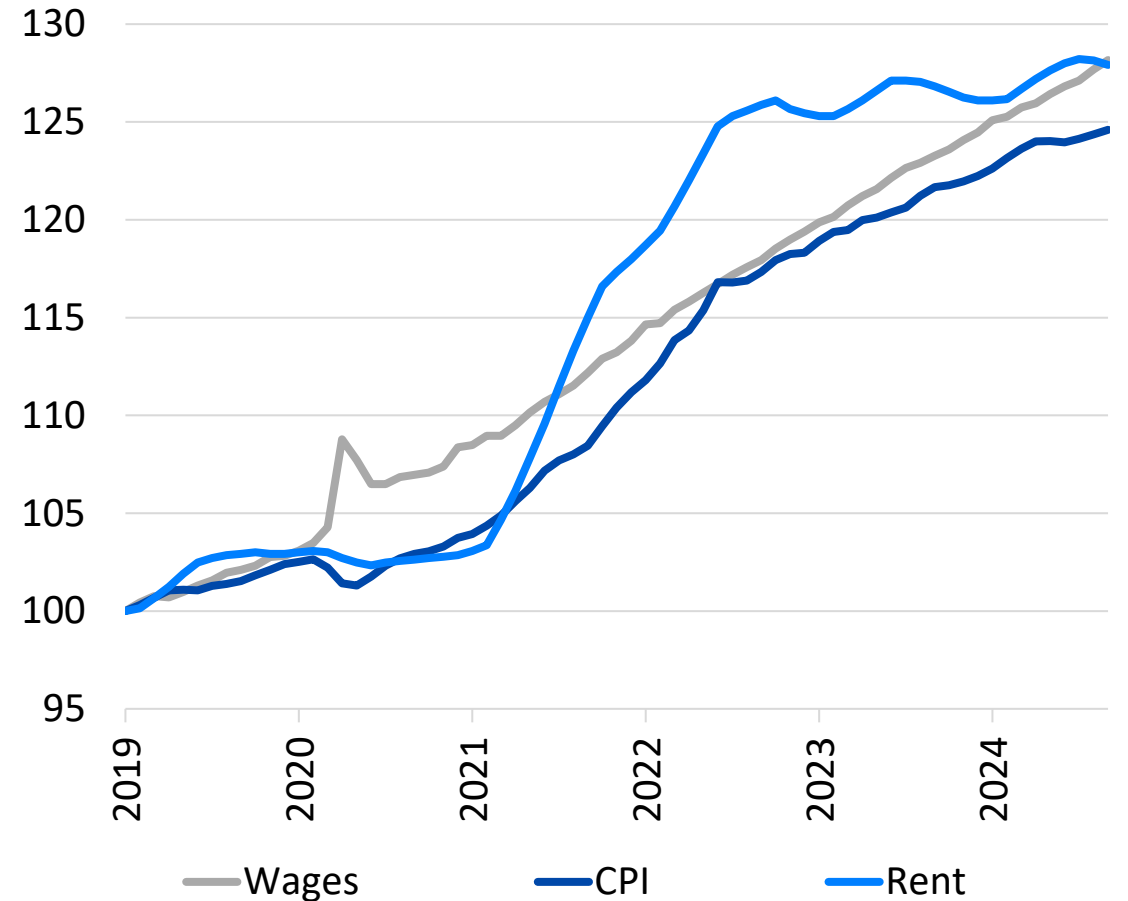


Wage Growth Has Caught Up to Rent Growth, as Both Outpace Inflation

Average Asking Rent vs. CPI vs. Wages 2007 to Present

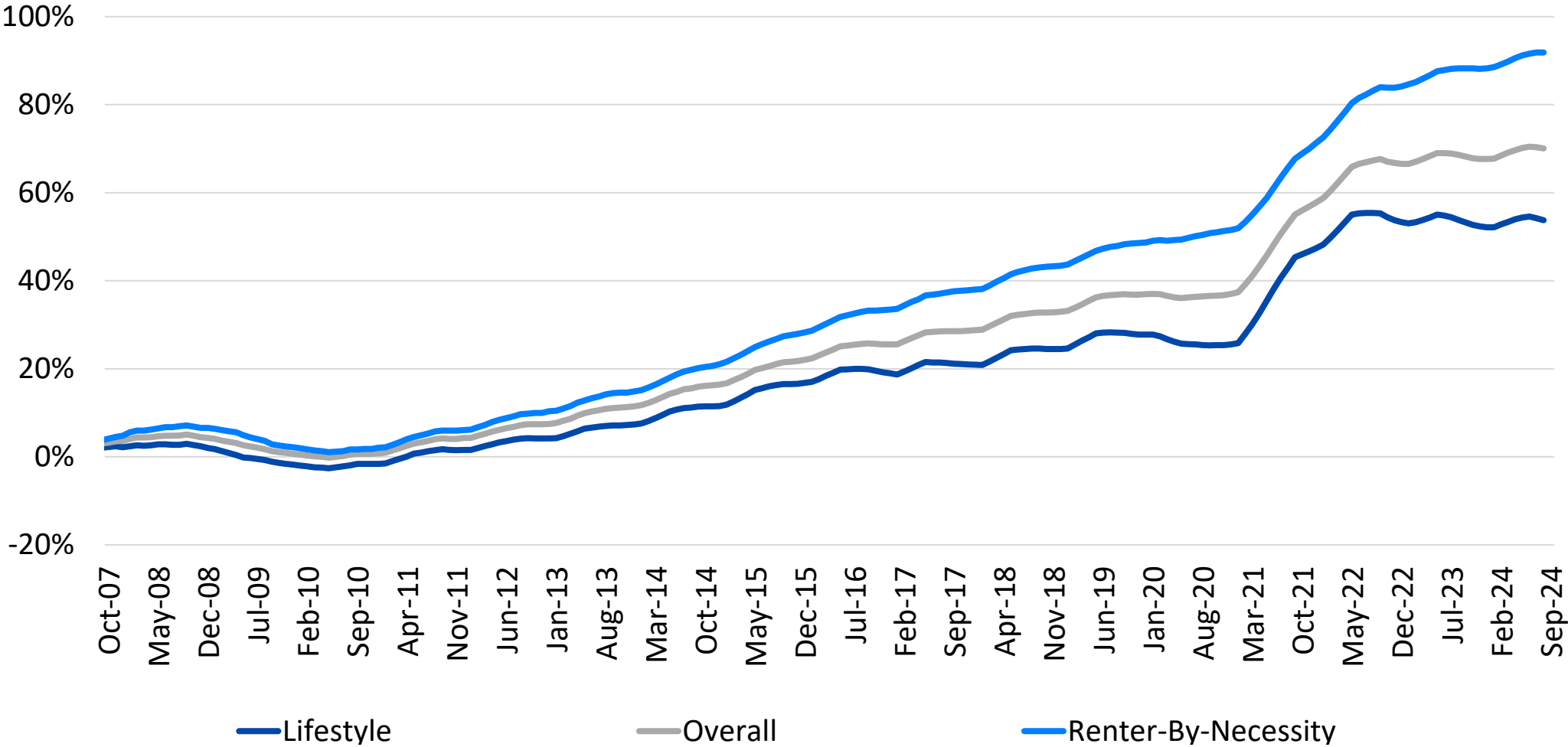


Average Asking Rent vs. CPI vs. Wages 2019 to Present



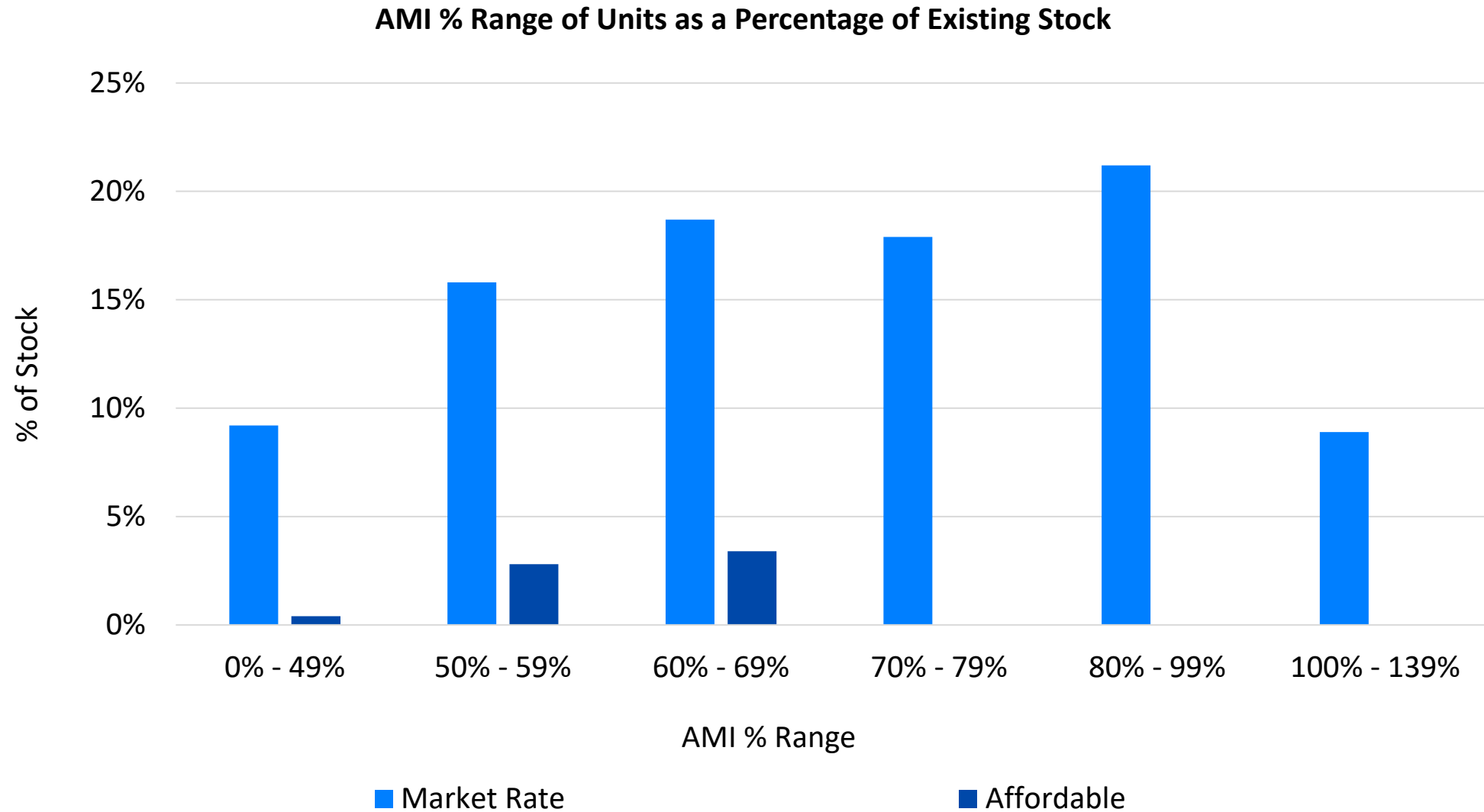
Renter-By-Necessity Properties Saw the Largest Cumulative Increases in Rents Post-Pandemic

Cumulative Rent Growth Since 2007



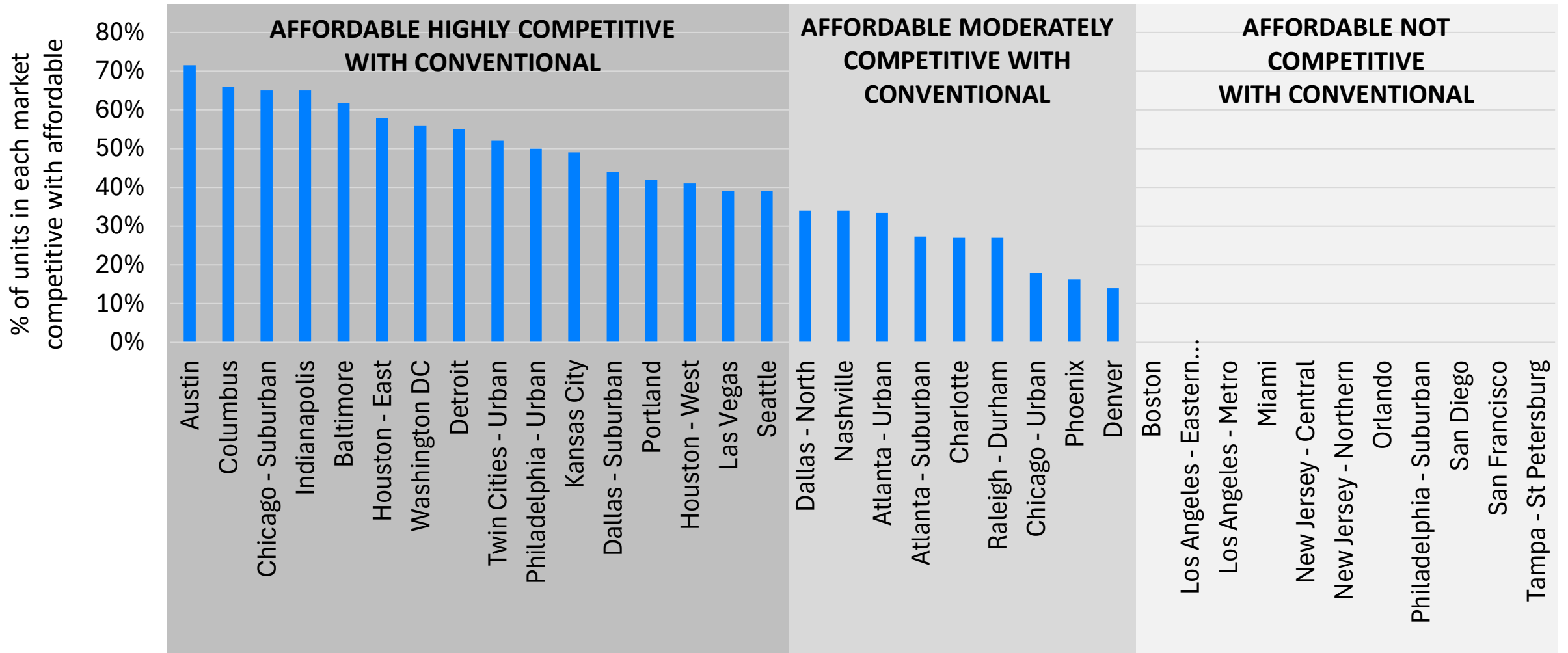
Source: Yardi Matrix

Most Multifamily Inventory is in the Semi-Affordable Range



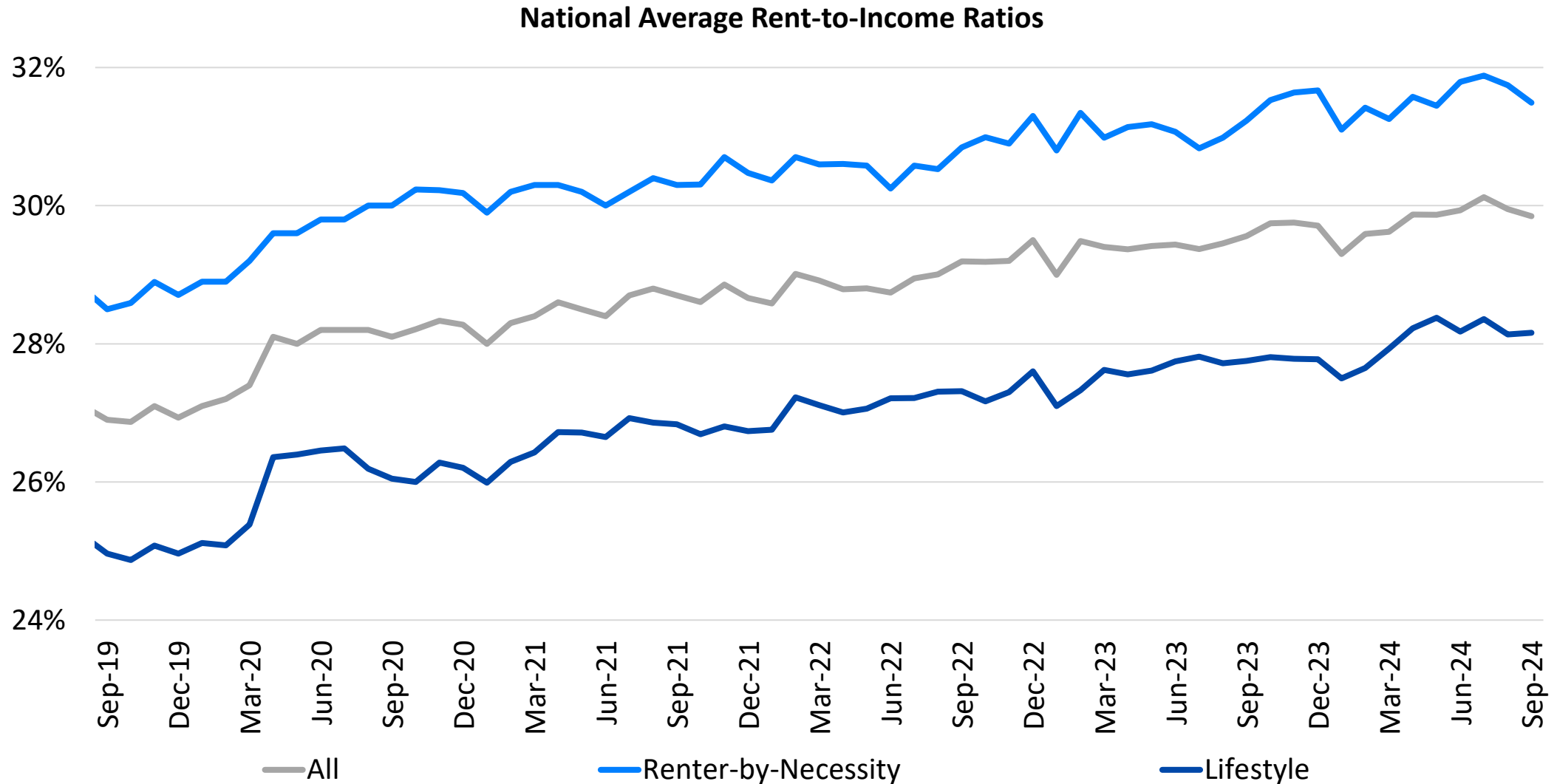
In Some Markets, Affordable Housing Has to Compete With Conventional, Not What It Was Designed to Do

Percentage of Market-Rate Stock in Competition with Fully Affordable Developments



Percentage of stock is by number of units. Competing units are defined as a <10% difference in AMI% Premiums between market-rate and fully affordable – private sector properties | Source: Yardi Matrix

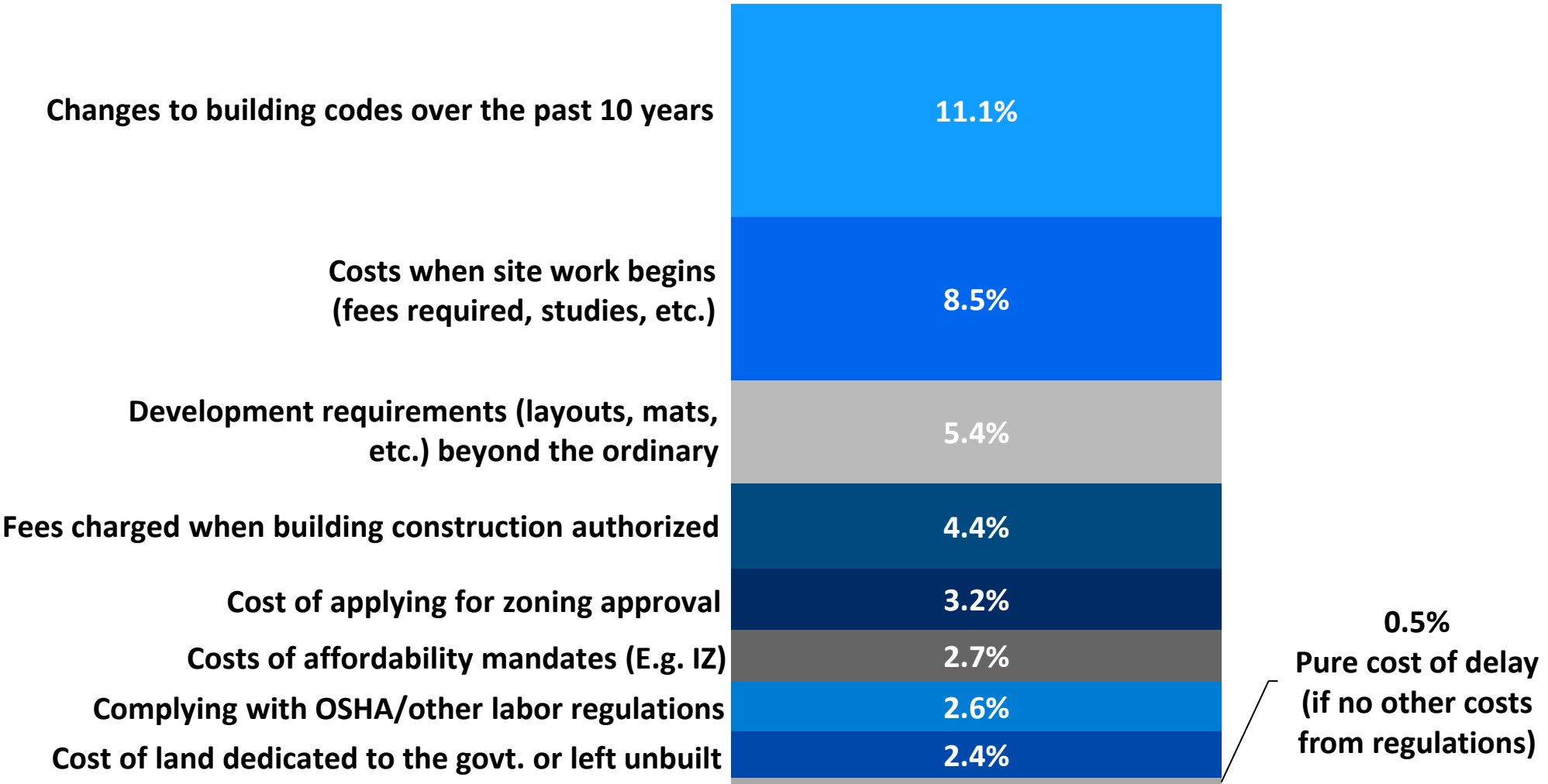
Rent-to-Income Ratios Highest in Renter-by-Necessity Class



High Rent-to-Income Ratios at the Lower-End Put Pressure on Those Already Cost Burdened

Market	Lifestyle Units			Renter-by-Necessity Units		
	September 2023	September 2024	Change	September 2023	September 2024	Change
Chattanooga	23.5%	25.0%	1.5%	44.3%	65.3%	21.0%
Worcester - Springfield	25.2%	27.2%	2.0%	38.3%	49.4%	11.1%
Bridgeport - New Haven	31.5%	30.4%	-1.0%	40.3%	41.4%	1.1%
Central Coast	31.3%	40.3%	9.0%	36.4%	41.0%	4.6%
Memphis	28.1%	28.3%	0.1%	40.5%	40.2%	-0.4%
Corpus Christi	22.6%	17.0%	-5.7%	34.1%	38.6%	4.4%
North Central Florida	29.3%	32.2%	2.9%	33.8%	38.4%	4.5%
Central New Jersey	32.9%	37.2%	4.2%	31.2%	37.1%	5.9%
White Plains	28.5%	28.7%	0.2%	36.7%	36.8%	0.0%
Washington DC	33.2%	33.8%	0.6%	36.6%	36.4%	-0.2%
Central Valley	31.0%	22.4%	-8.6%	30.3%	36.2%	5.9%
Pensacola	25.9%	29.2%	3.3%	30.8%	36.1%	5.3%
Long Island	27.7%	33.6%	5.9%	42.9%	36.1%	-6.9%
Seattle	27.6%	31.9%	4.3%	33.8%	36.0%	2.2%
Lubbock	25.8%	27.6%	1.8%	32.7%	35.3%	2.6%

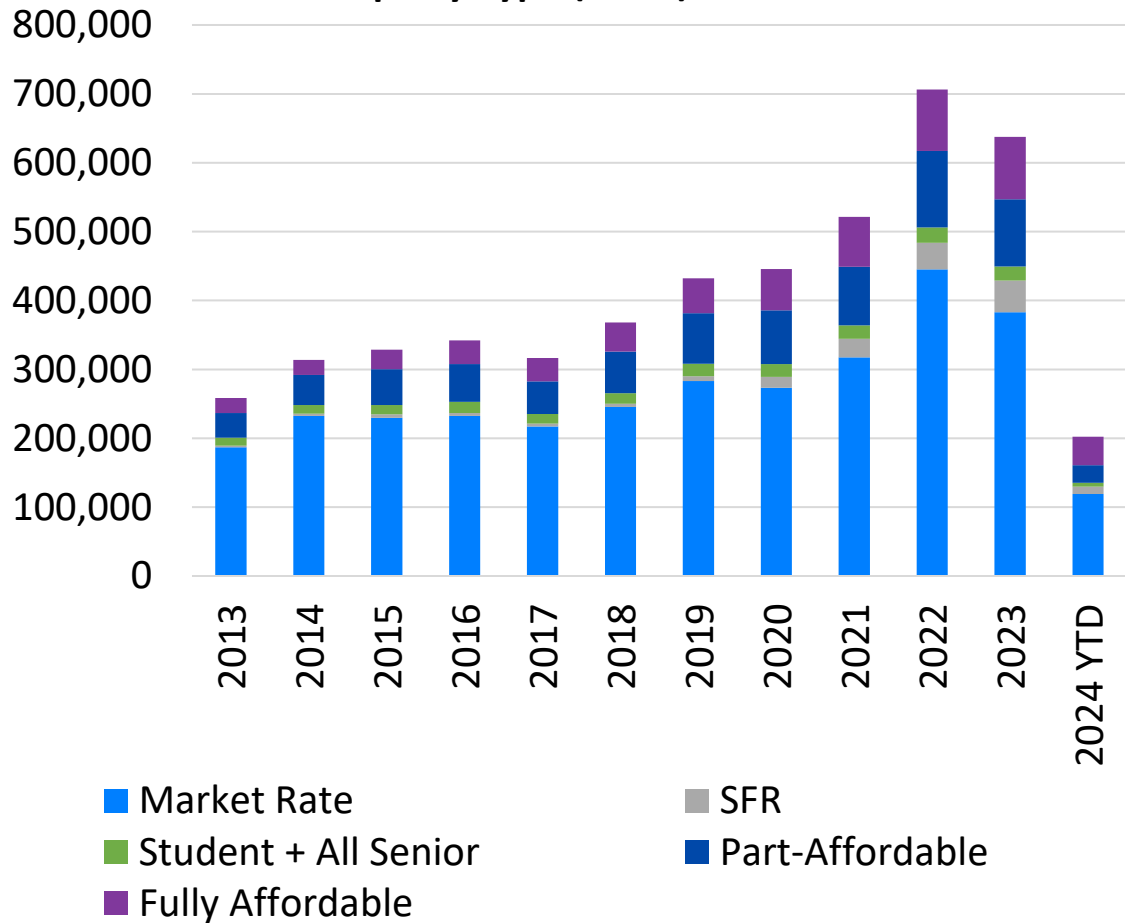
Regulations Account for 40% of Multifamily Development Costs, Inhibiting Sufficient New Supply Growth – Not New, But Worthy of Repeating!



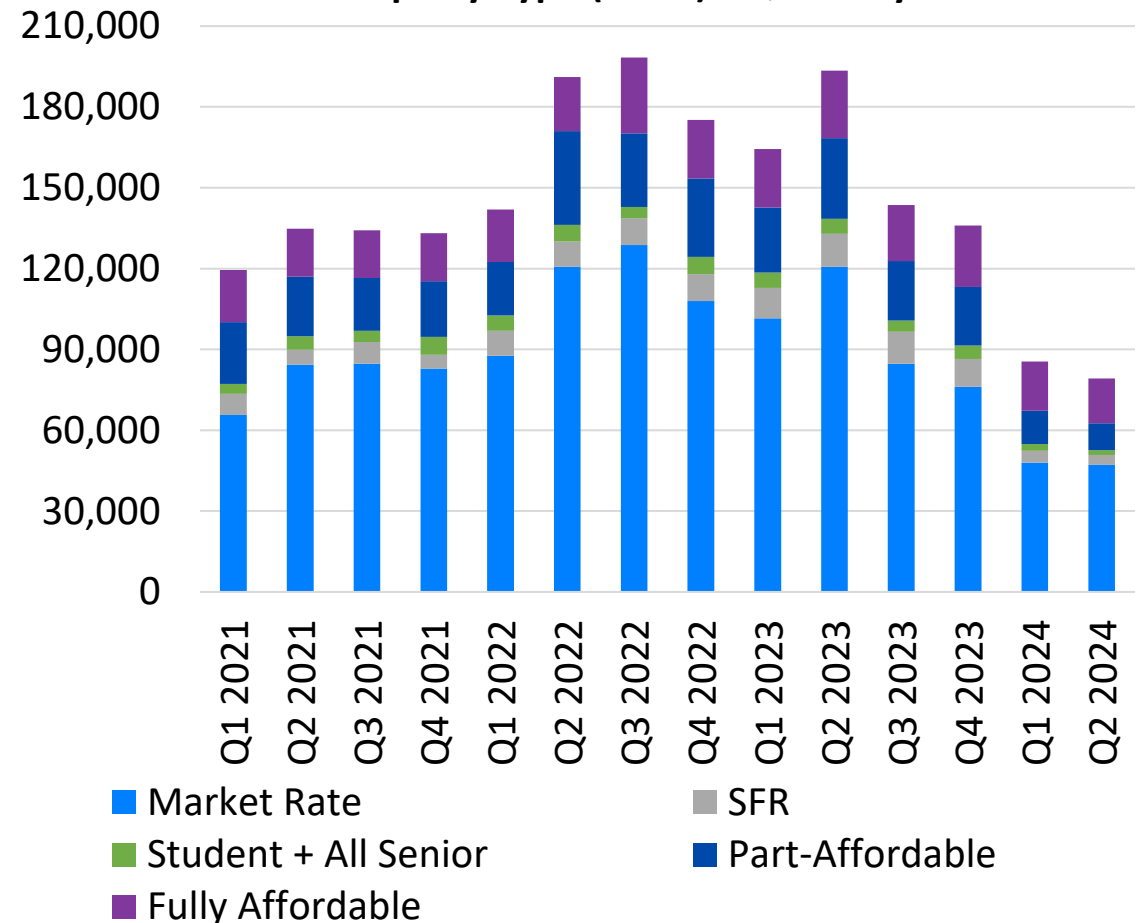
Source: Yardi Matrix; NMHC, NAHB, “NMHC-NAHB Cost of Regulations Report”

Total Starts Have Slowed Since 2022, but Affordable Has Slowed to a Lesser Degree Than Other Property Types

Multifamily Construction Starts by Property Type (Units) - Annual



Multifamily Construction Starts by Property Type (Units) - Quarterly



Responses to Affordability

MARKET RESPONSES TO AFFORDABILITY

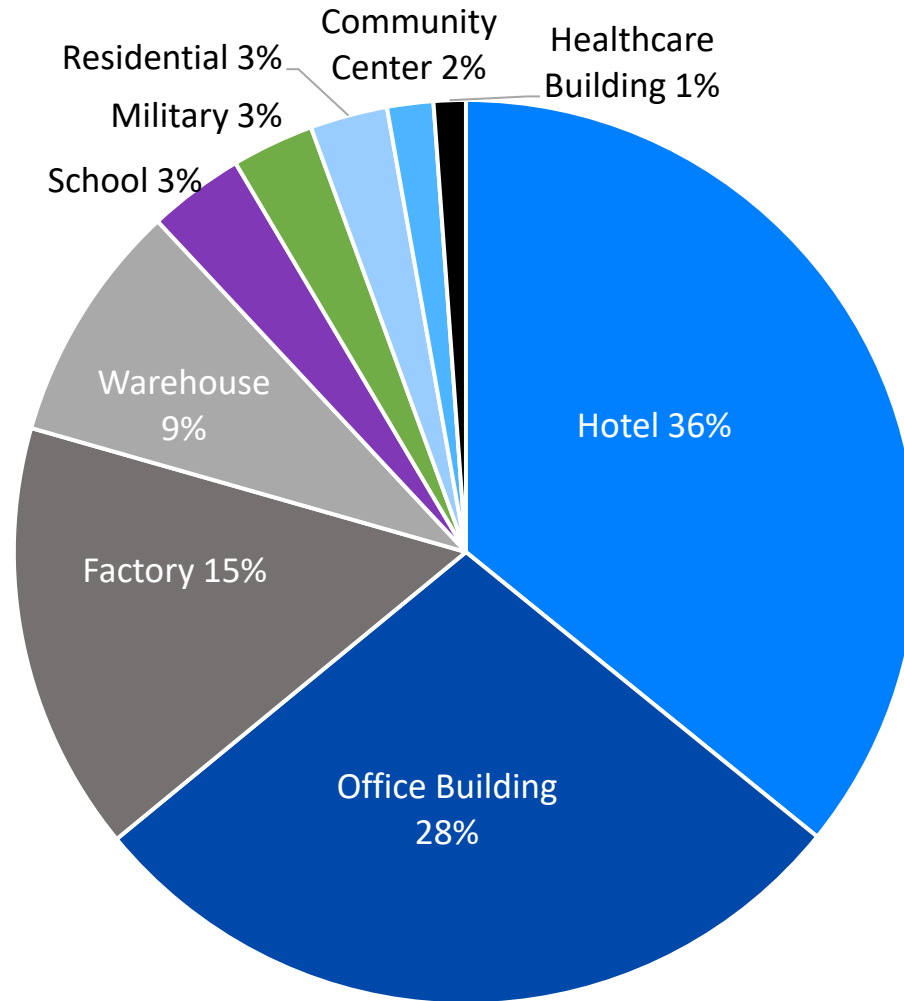
- 1) Co-living – Minor Impact
- 2) Short-term Rentals – Minor Impact
 - a) Airbnb Sublet Deal with Apartment Landlords
- 3) Conversions – Small Nationally, Relevant Locally
 - a) Office to Apartments
 - b) Hotels to Apartments
- 4) BUILD! – But cost to build must be reduced

PUBLIC POLICY RESPONSES TO AFFORDABILITY

- 1) Curtail Demand – Slow Economic Growth & Household Formation
- 2) Encourage Supply – Market Rate, Partial AFF, Fully AFF
 - a) Zoning Reform – State & Local
 - b) Tax Incentives – State
 - c) Tax Incentives – Federal
 - i. Maintain LIHTC - \$25B between 9% and 4% Tax Credits for <=60% AMI Households
 - ii. Expand to 60-100% of AMI - Workforce Housing Tax Credit Proposal
- 3) Federal – Explicitly Cross-Subsidize Certain Populations
 - a) Housing Choice Budget already \$32B
 - b) Project Based Sec 8 Budget already \$16B
 - c) HUD Budget Flat in 2025
- 4) Regulate/Suppress Market Forces: Rent Control, etc.
 - a) New York, Calif, Oregon- never works

Hotels Led Conversions in 2023, but Other Building Types Are Gaining Momentum

Top Building Types Converted to Apartments in 2023



- Office and factory conversions experienced an increase in 2023
- Hotels thrived with a five-year high in conversions at 36%
- Vacant stock and zoning regulations affected factory conversions, registering a 15% increase compared to 2022
- Smaller niches (schools, healthcare buildings, warehouses) are gaining momentum

Local Programs Aim to Promote Office-to-Residential Conversions

SAN FRANCISCO, CA

- Commercial to Residential Adaptive Reuse and Downtown Economic Revitalization Ordinance
 - Modifies the regulations on zoning & building codes to provide exemptions for qualifying adaptive reuse projects
 - The reduced restrictions make converting properties more feasible and accessible

CHICAGO, IL

- LaSalle Street Reimagined
 - Aims to convert 2.3M SF of vacant office space into residences
 - 30% of units will be affordable housing
- Tax Increment Funding (TIF) would subsidize affordable developments and adaptive reuse projects

NEW YORK CITY, NY

- Office Conversions Accelerator
 - Streamlines the process for adaptive reuse plans
 - Analyzes the feasibility, regulations, and finds ways to overcome barriers for conversions
- Tax incentive for commercial conversion projects that include affordable housing

WASHINGTON, D.C.

- 20-year Tax Abatement
 - Up to \$2.5M allocated annually from 2024-2027
 - Additional allocation for qualifying residential conversions in 2027 and beyond
 - 10-18% of units would be affordable rentals

New Office-to-Multifamily Conversion Feasibility Index

Office-to-Multifamily conversion feasibility index based on the following rating criteria for existing office properties:

Rating Criteria:

Walkability

Year Built

Building Dimensions

Square Footage

Floor Shape

Primary Use Sub-Type

Accessibility

Ceiling Height

Green Building

Number of Stories

Each existing office property was rated Tier 1, Tier II or Tier III:

Rating Definitions:

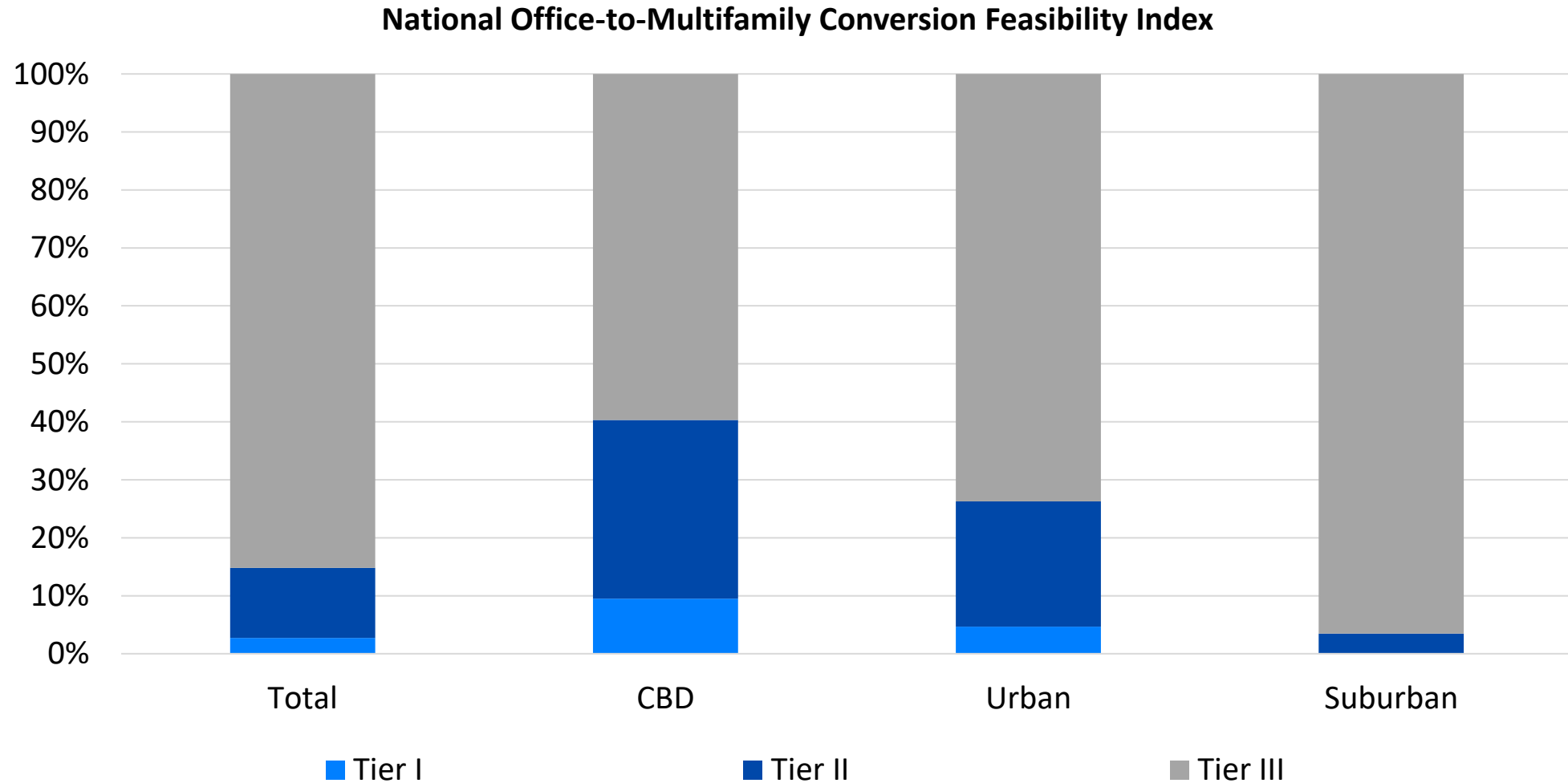
Tier I - Top Conversion Candidate

Tier II - Quality Conversion Candidate

Tier III - More Difficult Conversion Candidate



About 3% of Office Space Nationwide Are Tier I Candidates for Multifamily Conversion, with a Concentration of Those Properties in CBDs



Experimentation to Reduce Costs to Build

- Some companies are attempting to reduce build costs by completely reconfiguring the supply chain
 - Source their own raw materials, move their own crews, etc.
 - Essentially construction companies that are vertically integrated
- Deliver brand new, market rate product up to a 30% discount off of normal costs because they control the entire supply chain
- **Hillpointe** is a fully integrated real estate development and investment management firm focused on the development of market rate workforce housing across the Sun Belt
 - Currently developing in Florida, Georgia and South Carolina
- Experimentation going on in this area, but it hasn't scaled

Affordable Concepts Bleed Into Conventional Housing – LIHTC is the Reference Point

- **Created in 1986 to assist with the financing and construction of affordable housing**
 - An indirect subsidy in the form of future tax credits is awarded to developers
 - These **tax credits may be sold to private investors** to raise capital for LIHTC projects
 - The goal is to encourage investment in affordable units with restricted rents
- **Investors are incentivized to provide financing for LIHTC projects through federal tax reductions**
 - A dollar-for-dollar reduction would be awarded annually in the form of tax credits
 - Federal tax credits are usually distributed over a 10-year period once the project is completed
- **States receive federal allocations of LIHTC on a per capita basis or a minimum threshold**
 - In 2024, LIHTC allocation is the greater of $\$2.90 \times \text{State Population}$ or $\$3,360,000$ for small states

GSE Loan Programs Incentivize "Affordability" in Conventional Multifamily

WORKFORCE HOUSING PRESERVATION

(Freddie Mac)

- Private borrowers may voluntarily agree to restrict rents on units for residents at 80% Area Median Income (AMI)
- At least 20% of units must be set aside to meet these affordability standards
- Rents must be preserved for the lesser of the term of the loan or 10 years
- Freddie Mac Loan Agreement regulates rent restrictions with annual rent monitoring to ensure affordability
- 1.25x/80% max credit parameters & competitive loan pricing

SPONSOR-INITIATED AFFORDABILITY

(Fannie Mae)

- Incentivizes voluntary preservation and creation of affordable units via competitive loan pricing
- Conventional properties may qualify if at least 20% of units are affordable (30% of income) at 80% AMI
- 5-30 year loans at competitive rates and flexible terms
- 1.25x/80% maximum credit parameters
- Possible 1.20 DSCR if in eligible market, borrower is an affiliate/sponsor, at least 50% of units are restricted at 80% AMI, and actual rents are at least 10%

TENANT ADVANCEMENT COMMITMENT

(Freddie Mac)

- Borrowers restrict rents on conventional properties
- Enter into a Master Financing Commitment with Freddie Mac
- Min 7-year fixed & floating rate loans with favorable terms
- Loans receive full mission pricing benefits
- Preservation of Affordable Rent Covenant (PARC) helps determine the percentage of restricted rent units
- Annual rents may be no more than 30% of income @ 60-80% AMI

TARGETED AFFORDABLE HOUSING BRIDGE LOAN

(Freddie Mac)

- Short-term financing to help acquire/refinance non-LIHTC and LIHTC properties near end of compliance period
- Helps borrowers bridge the gap to later recapitalize using 4% LIHTC or long-term Freddie Mac financing & public subsidies
- 24-month, interest-only floating rate loan with 6 month extension at 1.15x/85% LTV for LIHTC eligible and 1.20-1.25x/80% LTV for non-LIHTC eligible
- Non-LIHTC eligible: 10-20% of units rent restricted at 80-120% AMI depending on market. Other units at market rent



A Growing Number of Employers Are Taking a More Direct Role in Solving the Affordability Crisis

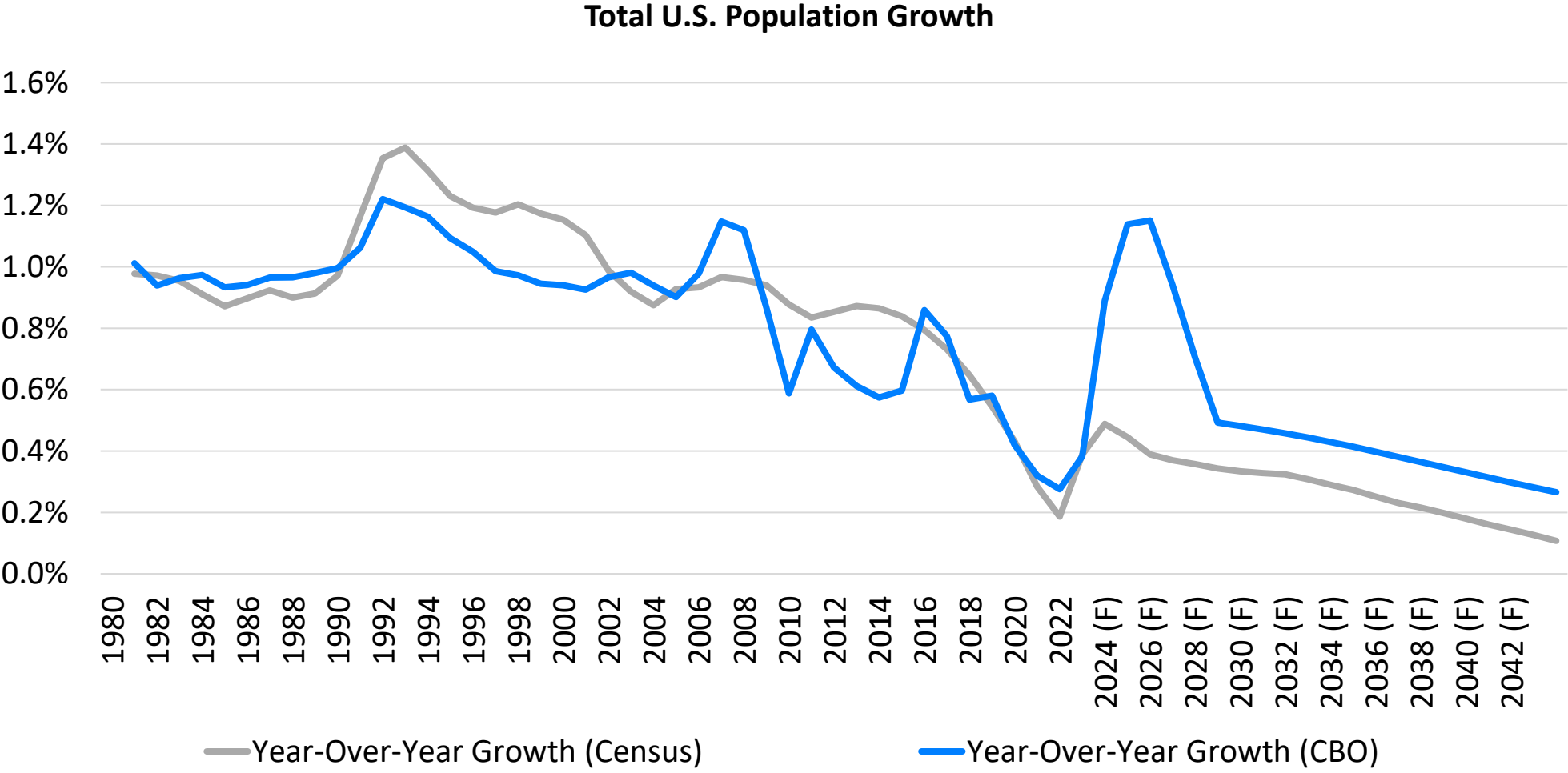
- *Some employers have begun building affordable housing for their employees to recruit & retain their workforce*
- **Win-win solution** for both employers and employees
 - Employees benefit from having low-cost housing available in areas where rents are normally much higher
 - Employers benefit by being able to recruit and retain employees who otherwise might decide to move to less expensive cities or states
- In **Florida**, multiple employers are building housing to overcome their employee's affordability issues
 - **Tampa General Hospital** plans to build a 160-unit apartment complex with below-market rents for employees who earn between 80% and 120% AMI
 - **Walt Disney Company** is developing 1,400 units near its Walt Disney World park in Orlando that will be for families in the 80% AMI range (approximately \$50,000 to \$90,000)
 - **Pinellas County Schools** plans to convert the Tomlinson Adult Learning Center into units affordable for its workforce
 - **Miami-Dade Public Schools** are working to build affordable apartments for teachers and other school district employees who earn less than 80% AMI
 - **Miami's Jackson Health System** wants to replace an old office building on their campus with new apartments with at least 50% of the units reserved for workers who earn between 60% and 120% AMI
- In **Austin**, **Tesla** has built a town called Snailbrook of over 100 rental homes with rents starting as low as \$800/month

Given These **Affordability** Themes, What are Some Strategies?

- **Operating in free market, regional economies that respond to affordability issues by encouraging supply**
 - Markets that try to help supply respond to demand are dynamic and growing economies
- **Markets with regulatory risk and very little competition between affordable housing and conventional multifamily**
 - Markets with very little competition have a shortage of housing at the lower-end
 - Boston, Los Angeles, Central New Jersey, Northern New Jersey, Suburban Philadelphia, San Diego & San Francisco
- **Markets with a concentration of industries where employers are becoming involved in providing housing for employees**
 - Certain industries that have high levels of mid-range employees are having to create company-supported housing
 - Healthcare, Education & Hospitality
 - Market-specific examples include Orlando, Miami & Tampa
- **Markets facing affordability issues using office-to-residential conversions as one attempt to solve it**
 - However, not always an affordability play...can also be an attempt to solve an abundance of office space in markets
 - Manhattan, San Francisco, Chicago, Washington DC & Denver
- **Reconfiguring the housing production system**
 - Vertically integrated development models, where firms handle every phase of a project's lifecycle in-house, can deliver housing at a significantly lower cost

DEMOGRAPHICS

Both the Census and CBO Forecast Population Growth Peaking in the Next Couple Years Before Gradually Declining, However the CBO Projects a Higher Pop



Source: Yardi Matrix; Moody’s Analytics; U.S. Census Bureau; Congressional Budget Office; “Noncitizen Coverage and Its Effects On U.S. Population Statistics,” J. David Brown, Misty L. Heggeness and Marta Murray-Close (2023)



The Greatest Population Growth Over the Next 5 Years on a Percentage Basis Will Be in Secondary Markets

Top 15 Markets: 2024-2029 Population Growth

Market	2023 Population	2024-2029 (F) Population Growth	Absolute Change
Boise	824,657	11.6%	97,916
Las Vegas	2,336,573	9.9%	235,638
Austin	2,473,275	9.8%	248,822
Phoenix	5,070,110	8.3%	425,181
Raleigh - Durham	2,118,110	7.9%	170,631
Orlando	3,613,477	7.1%	260,012
Dallas	8,422,908	6.7%	576,708
Houston	7,481,317	6.5%	496,594
Salt Lake City	2,878,765	6.4%	186,453
Charlotte	2,783,218	6.3%	177,773
Savannah	746,262	5.2%	39,722
Nashville	2,102,573	5.1%	109,788
Colorado Springs	768,832	5.0%	38,521
Denver	4,062,175	4.9%	200,474
Seattle	3,116,141	4.9%	152,546

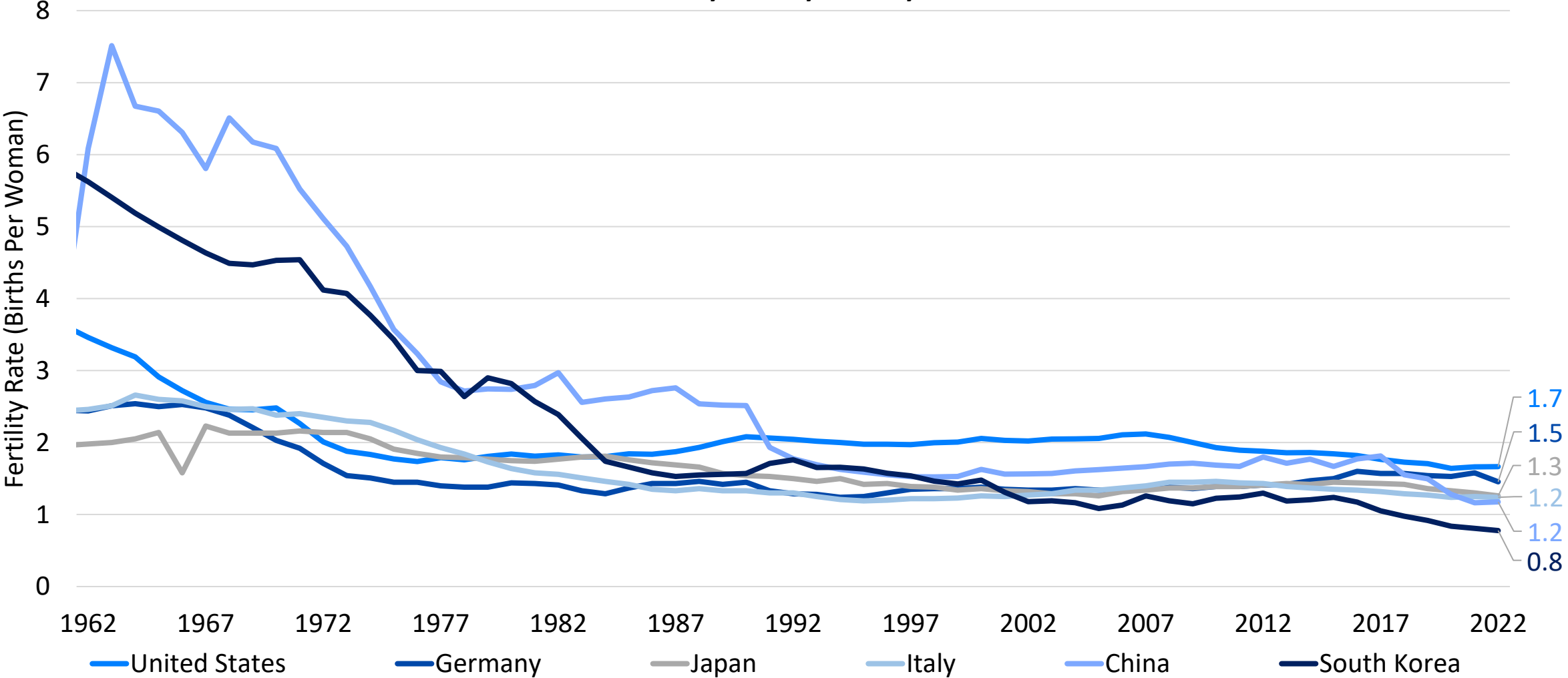
Bottom 15 Markets: 2024-2029 Population Growth

Market	2023 Population	2024-2029 (F) Population Growth	Absolute Change
Chicago	9,430,313	-1.6%	-150,604
Pittsburgh	2,338,253	-1.0%	-24,199
Los Angeles	9,663,345	0.1%	5,507
San Diego	3,269,973	0.1%	3,418
New York	14,339,351	0.1%	19,234
Philadelphia	6,246,160	0.4%	24,566
Albuquerque	1,078,252	0.5%	4,907
Boston	5,346,533	0.7%	35,807
San Francisco	5,631,207	1.3%	72,417
Kansas City	2,341,896	2.0%	47,907
Grand Rapids	1,611,265	2.0%	33,136
Huntsville	685,889	2.2%	15,375
Tulsa	1,044,757	2.3%	24,056
Omaha	1,328,356	2.8%	37,847
Portland	2,508,050	2.9%	72,940



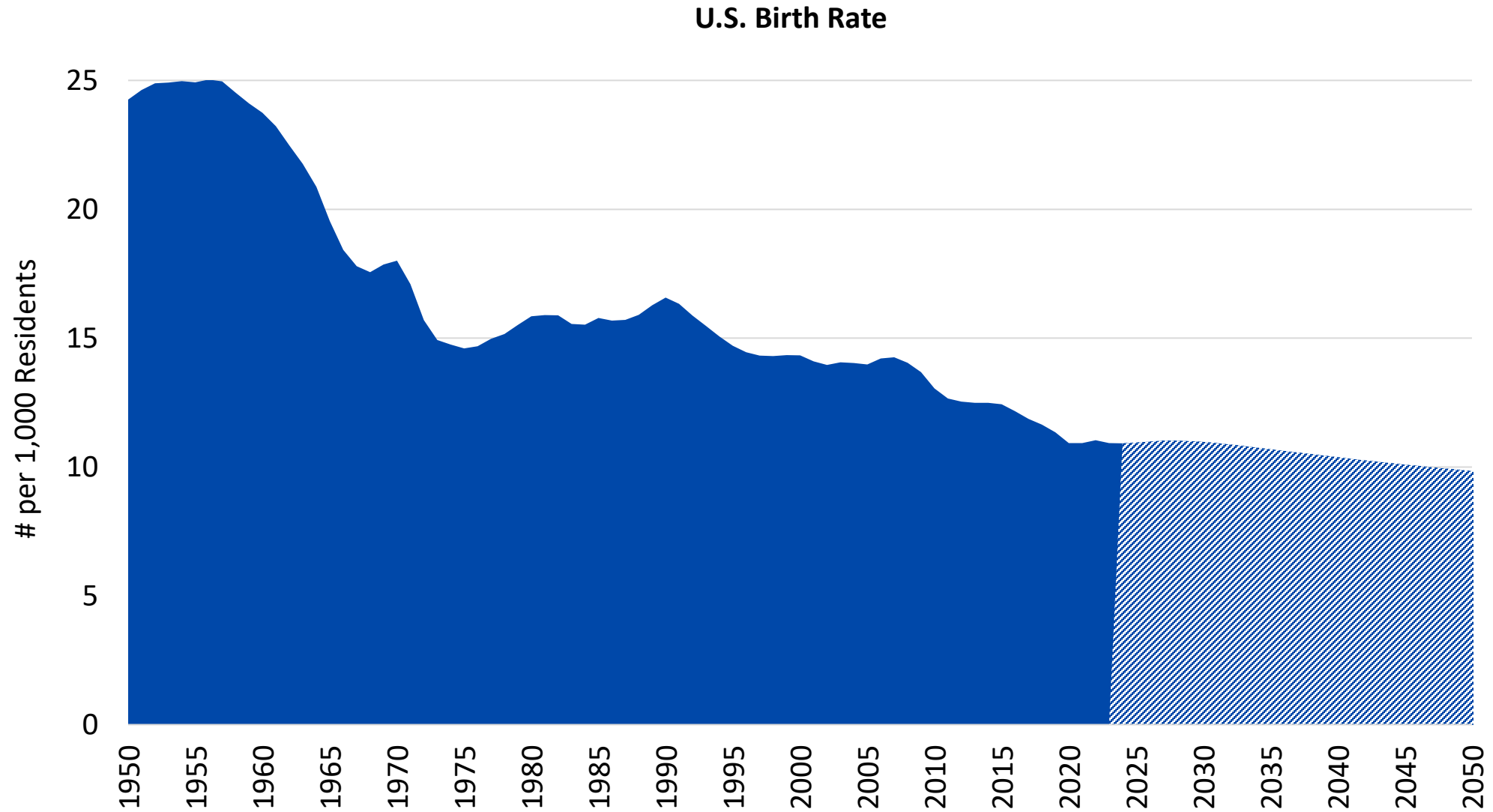
The U.S. Birth Rate is Declining, but is Faring Better Than Other Developed Nations

Fertility Rate By Country

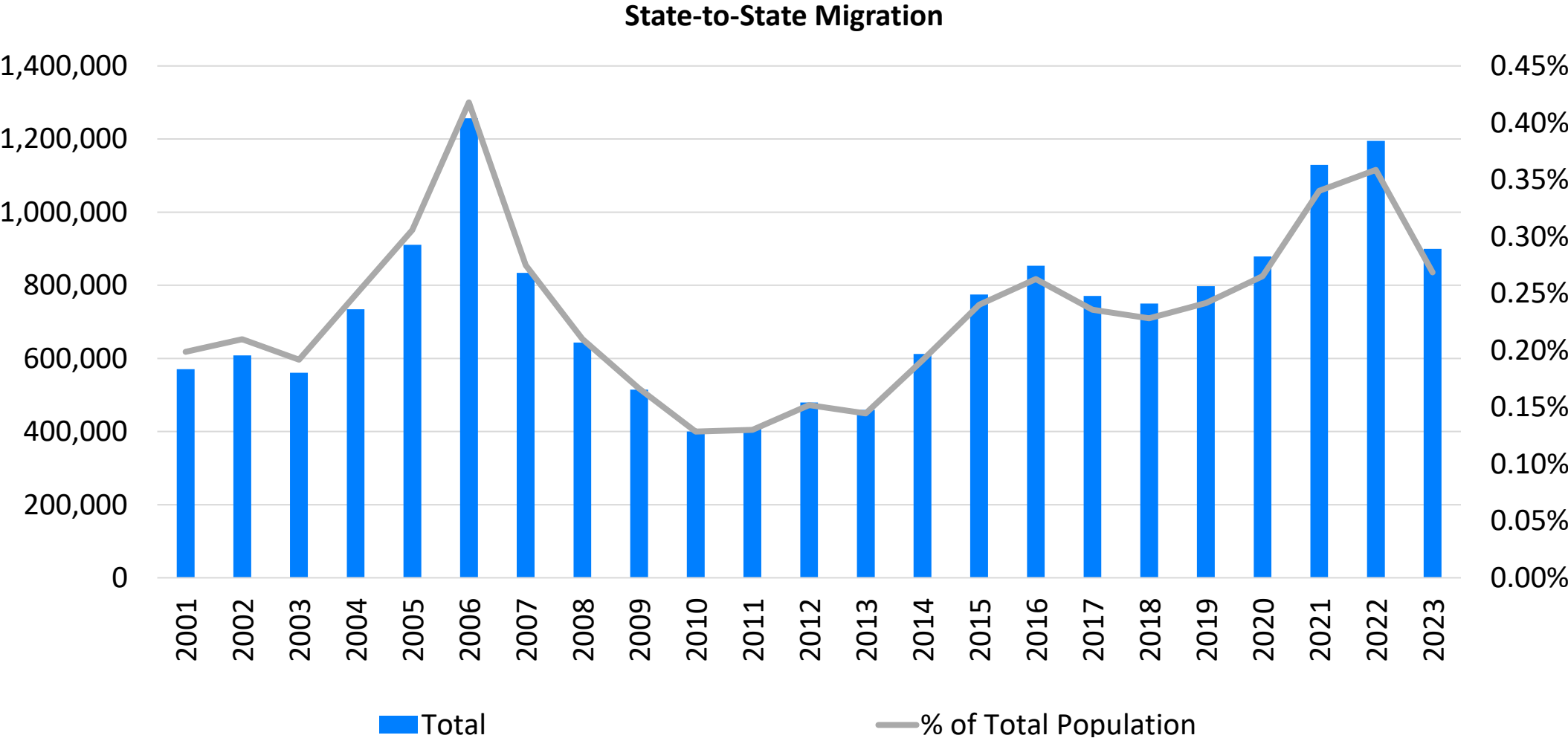


Source: Yardi Matrix; The World Bank

The U.S. Birth Rate Is Projected To Continue To Decline



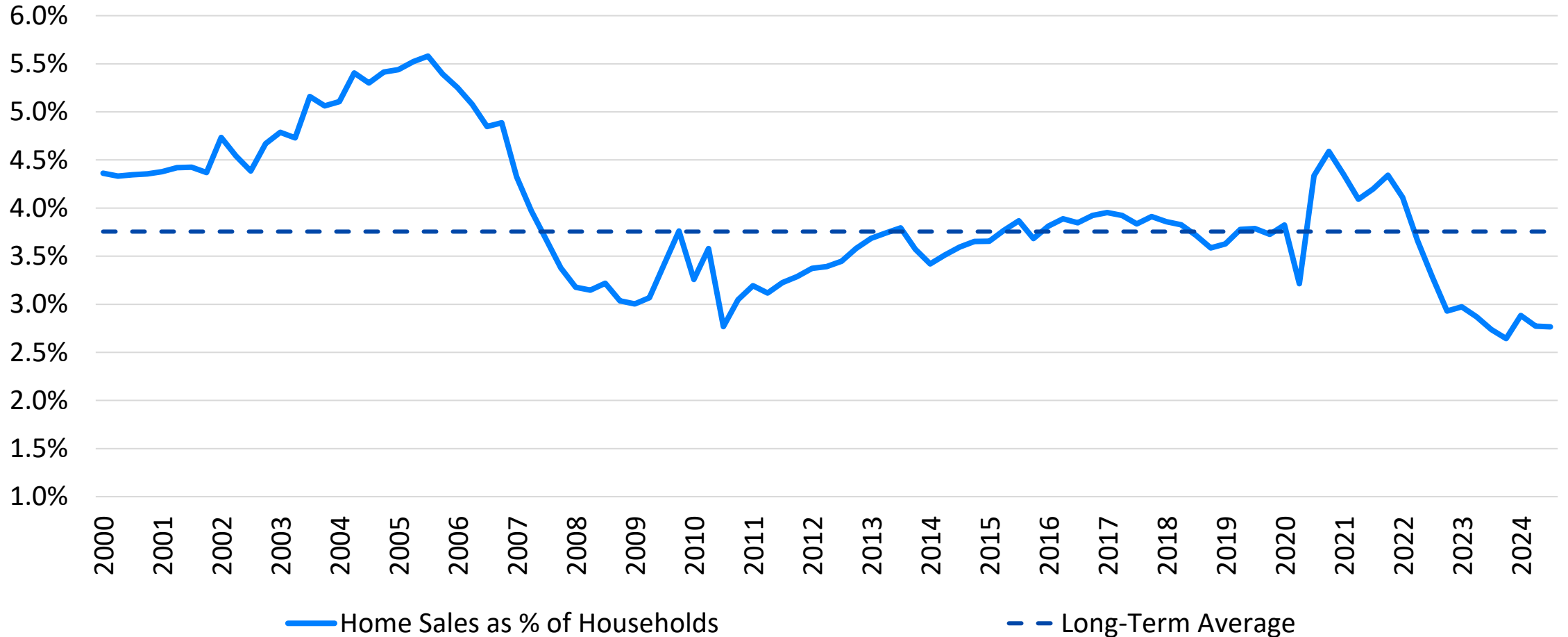
State-to-State Migration Decreased in 2023, Nearing a Return to Pre-Pandemic Norms



Migration data is for July – July of each year | Source: Yardi Matrix; U.S. Census Bureau

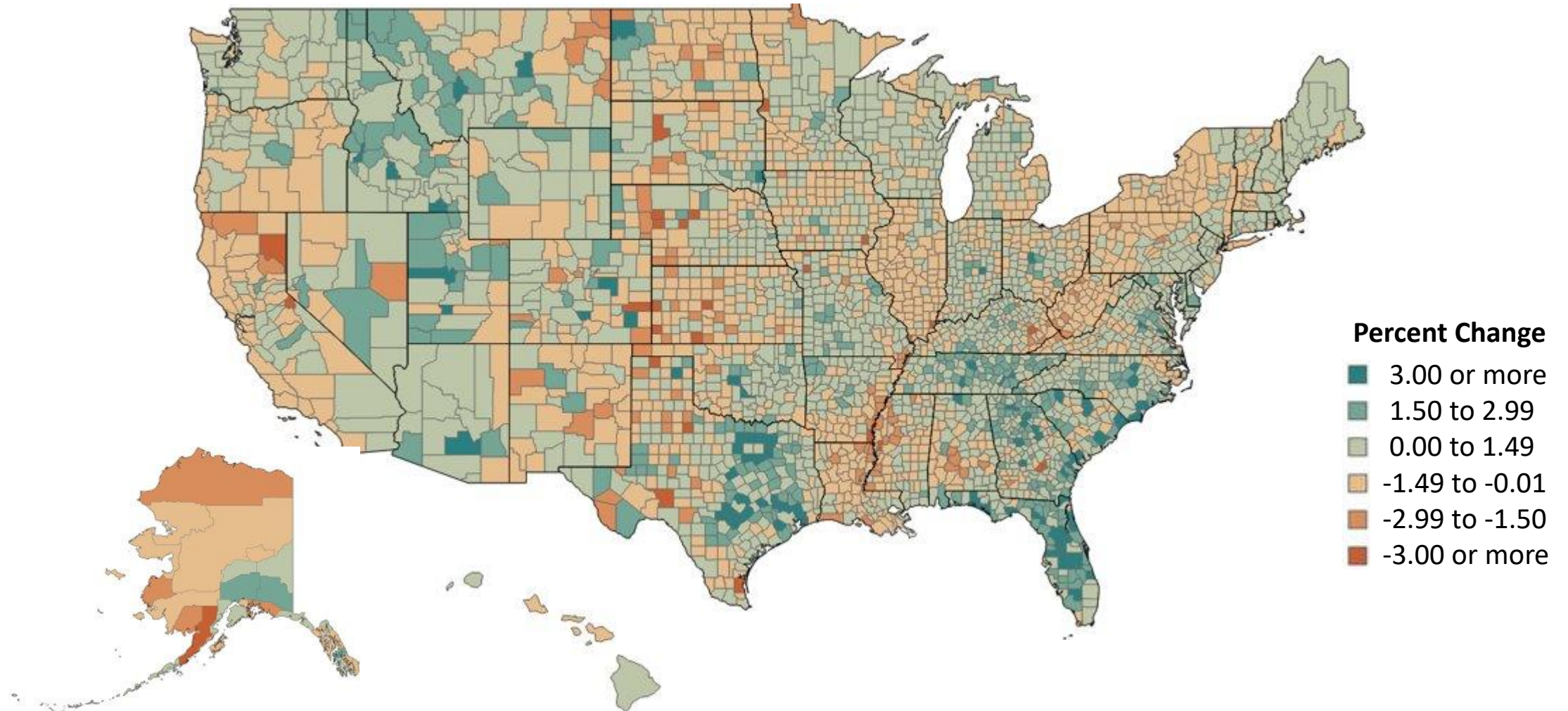
Home Sales as a Percent of Households is Down to GFC Levels, 99 Basis Points Below Long-Term Average

Home Sales as a Percent of Households



Western and Southern States Have Experienced Significant Population Growth

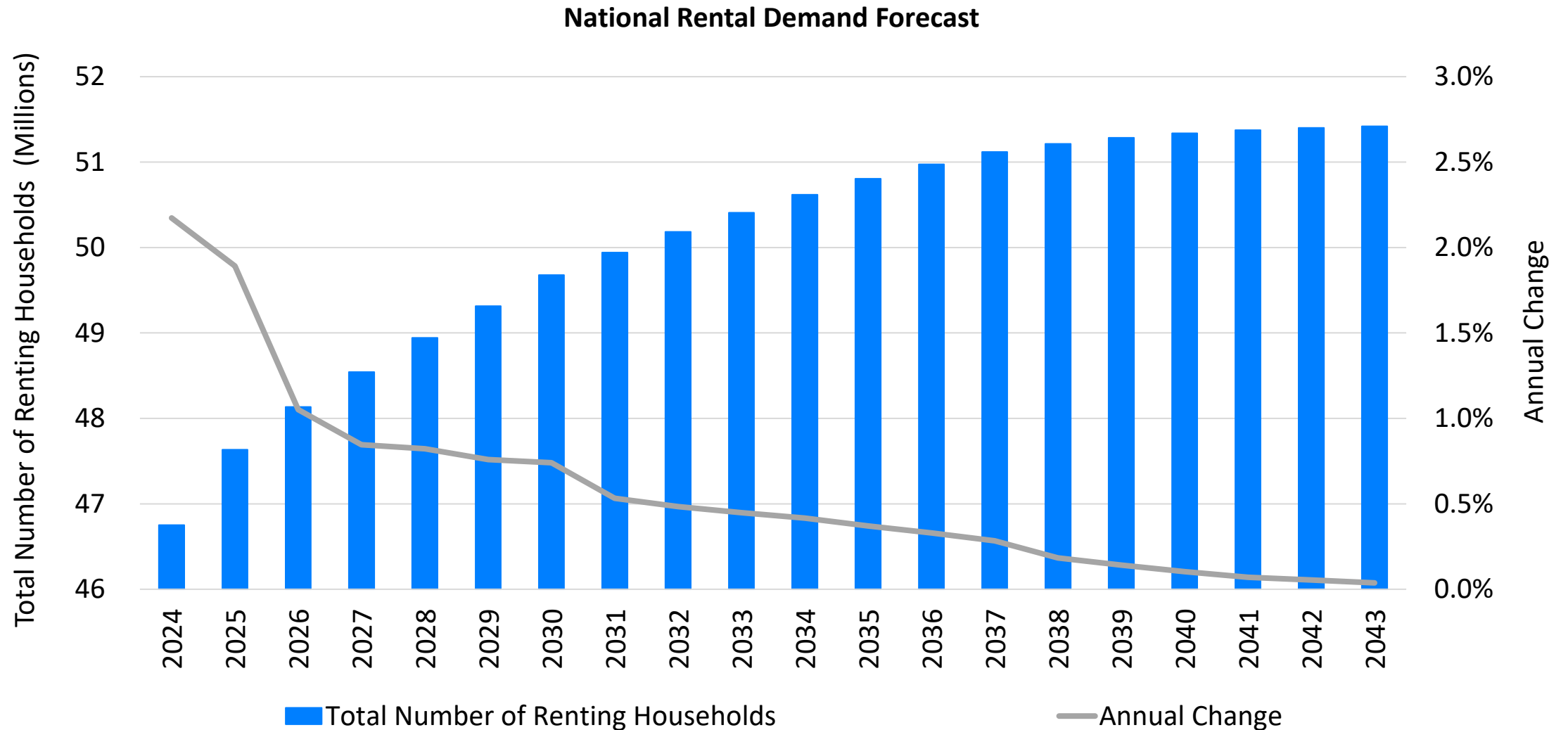
Percent Change in County Population: July 2022 to July 2023



Demographic Changes and How They Could Impact a 20-Year National Rental Demand Forecast

Factor	Direction	Impact
Population Growth	Slowing	Negative Impact: Low population growth in the next 20 years will reduce the number of new HH formations
Birth Rate	Down	Impact is Baked in: Impacts population growth and thereby HH growth in the long-term, but factors less in a 20-year outlook as today's primary and youngest renter cohort (Gen Z, whose population size is known) will be the most consequential players
Immigration	Slowing in the long-term (But subject to political changes)	Negative Impact: The recent immigration surge increases population growth, labor supply growth and renter growth in the short-term, but the long-term trend is forecasted for minimal growth, thereby limiting population growth and new household formations
Domestic Migration	Slowing	Impact is Local: While important to a market-level analysis, irrelevant to a national forecast
Household Formations	Slowing	Negative Impact: The pandemic boom was a flash in the pan and recent financial hardships have since curtailed growth
Household Types/Size	Down	Positive Impact: There has been a rise in single-person households, which will increase HH formations
Homeownership	Down	Positive Impact: Lower homeownership rates will create more renters
Home Prices	Up	Positive Impact: Reduced home affordability pushes more would-be homebuyers into the rental market

The Total Number of Renting Households is Expected to Increase for the Next 10 Years, Then Flatline Heading Into the 2040s



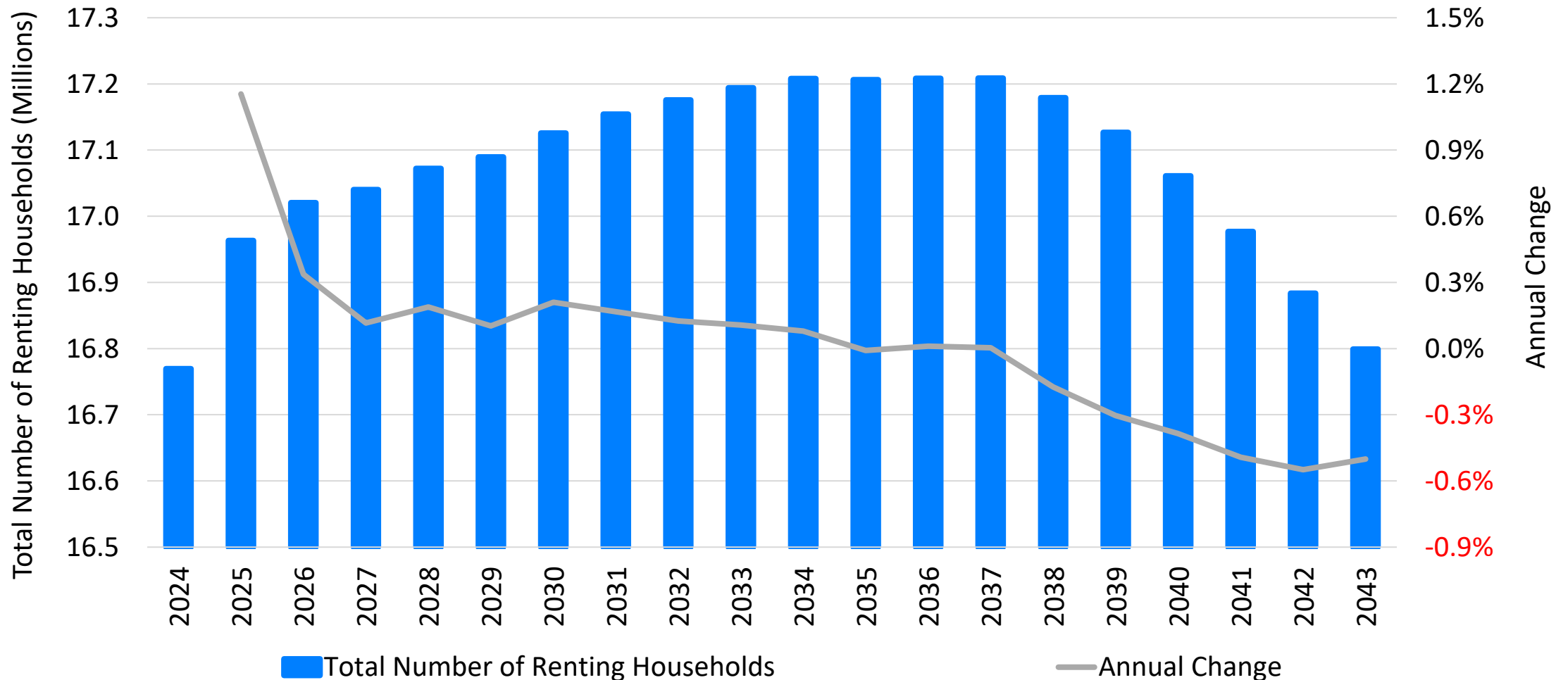
Renter Households = Population * Headship Rate * (1 - Homeownership Rate)

Source: Yardi Matrix; Moody's Analytics; Annual Social and Economic Supplement; Congressional Budget Office; IPUMS CPS; National Center for Health Statistics



The Primary Renter Cohort is Forecasted to Peak in Terms of Total Number of Renting Households in 2037 Before Falling

National Rental Demand Forecast: Ages 20-34

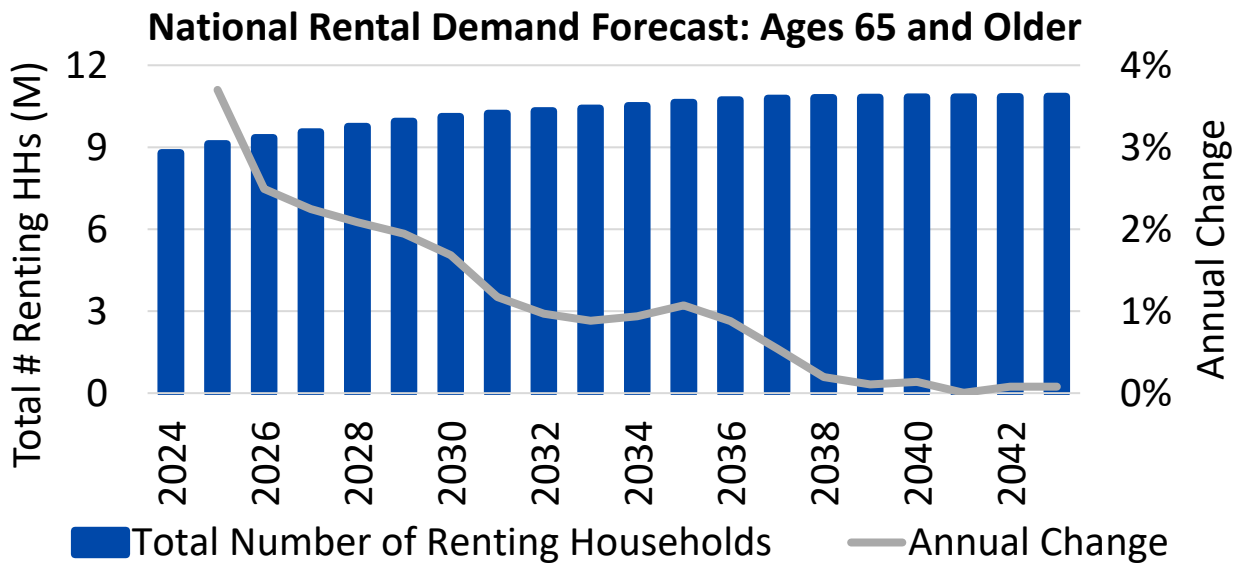
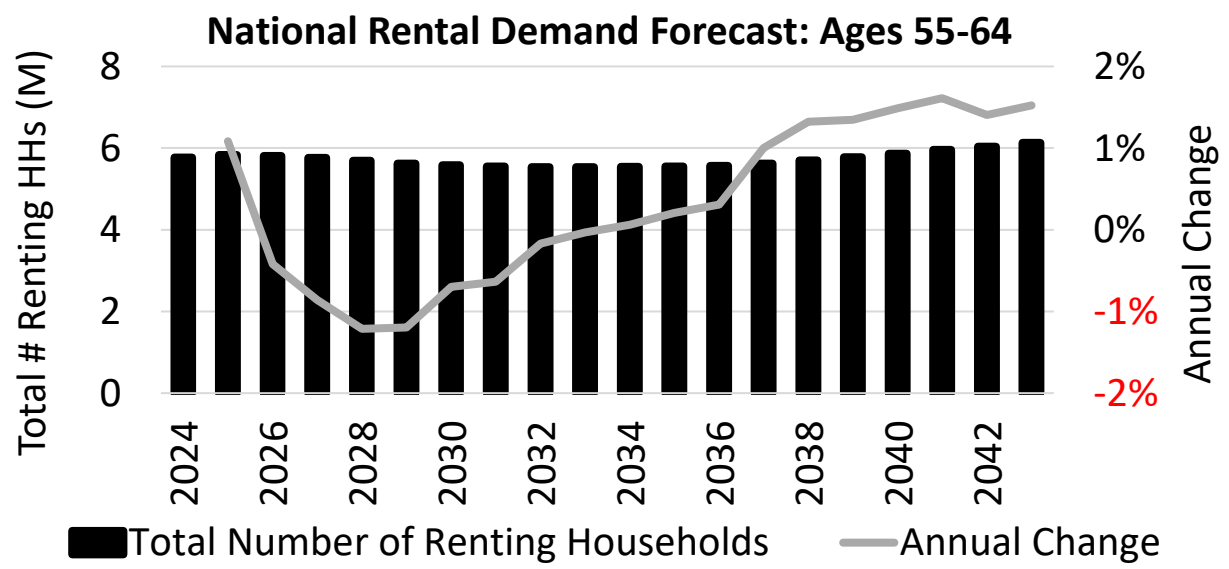
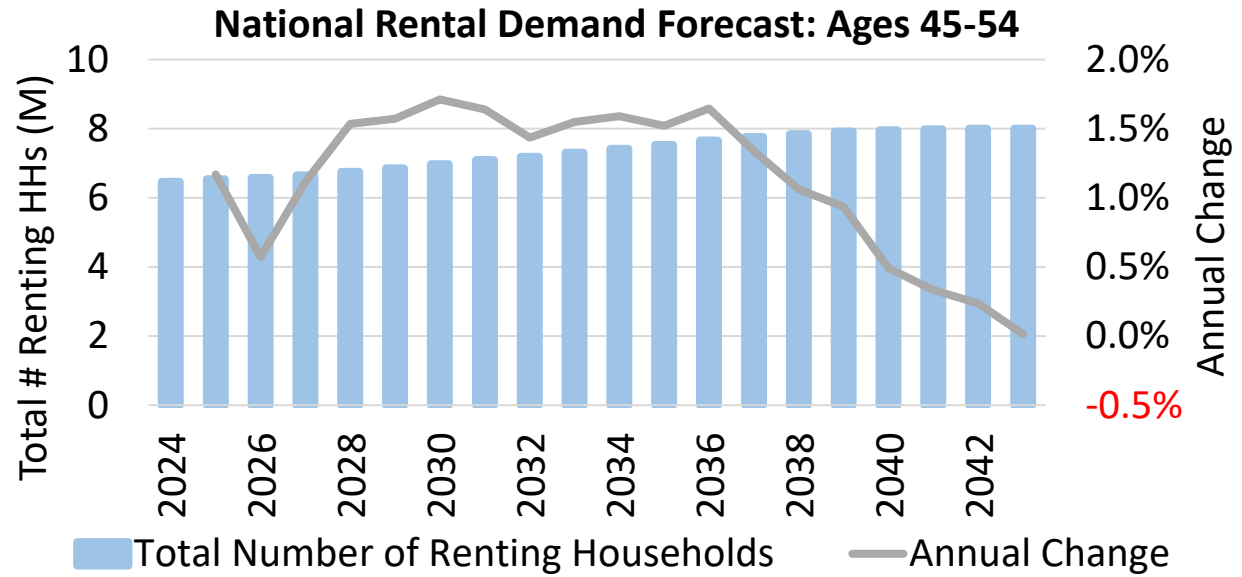
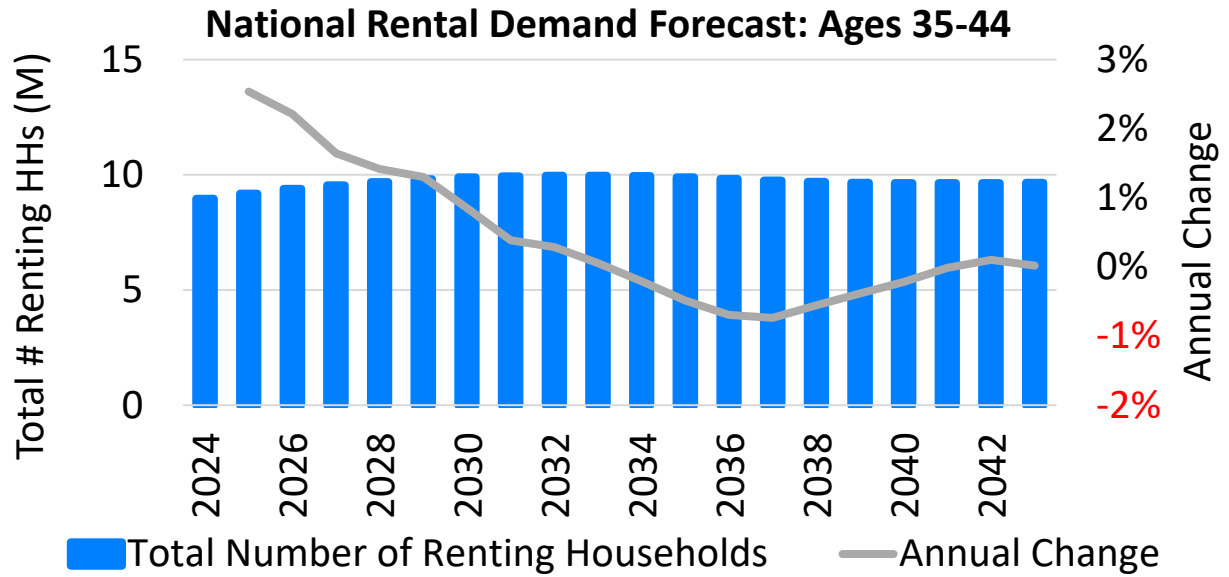


Renter Households = Population * Headship Rate * (1 - Homeownership Rate)

Source: Yardi Matrix; Moody's Analytics; Annual Social and Economic Supplement; Congressional Budget Office; IPUMS CPS; National Center for Health Statistics



Most Other Cohorts Will Flatline in Renting Households in the 2040s as Well



Renter Households = Population * Headship Rate * (1 - Homeownership Rate)

Source: Yardi Matrix; Moody's Analytics; Annual Social and Economic Supplement; Congressional Budget Office; IPUMS CPS; National Center for Health Statistics



Given These **Demographic** Themes, What are Some Strategies?

- **High-growth markets that are also high supply, which may be under pressure for the next few years, but generally they are markets with strong growth that will recover**
 - Dallas, Phoenix, Austin, Charlotte, Atlanta, Raleigh-Durham, Orlando, Houston & Tampa
- **Markets that have relatively good growth but are not getting a big supply response**
 - Tend to have the fastest rent growth
 - Savannah, Indianapolis, Kansas City, Columbus
- **As the overall national renter population levels out in 20 years— *absent any change in immigration policy or other major change*— selecting metros that can sustain population growth becomes more important than ever**
 - Markets that have maintained the fastest growth & will be able to sustain that growth, especially those in states projected to see the most population growth by 2050* — TX, NV, CO, FL, AZ & SC
 - *Las Vegas, Austin, Phoenix, Orlando, Dallas, Houston & Charlotte*

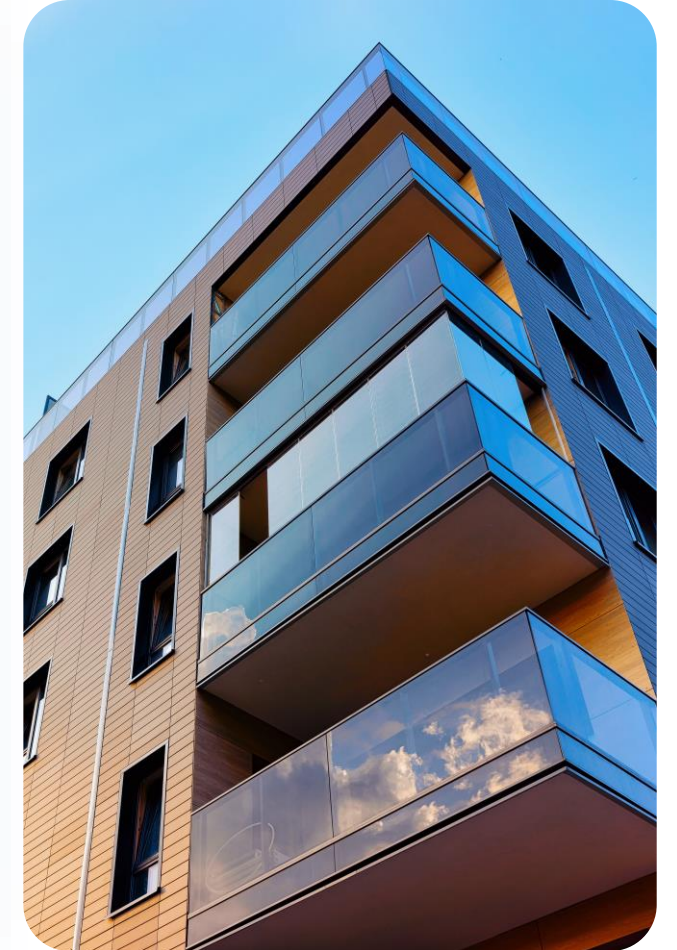
WORK-FROM-HOME

In The Past Few Years, There Has Been More Migration Out Of Cities Because Remote Work Changed Housing Preferences

Remote work reduced the need to commute to urban centers

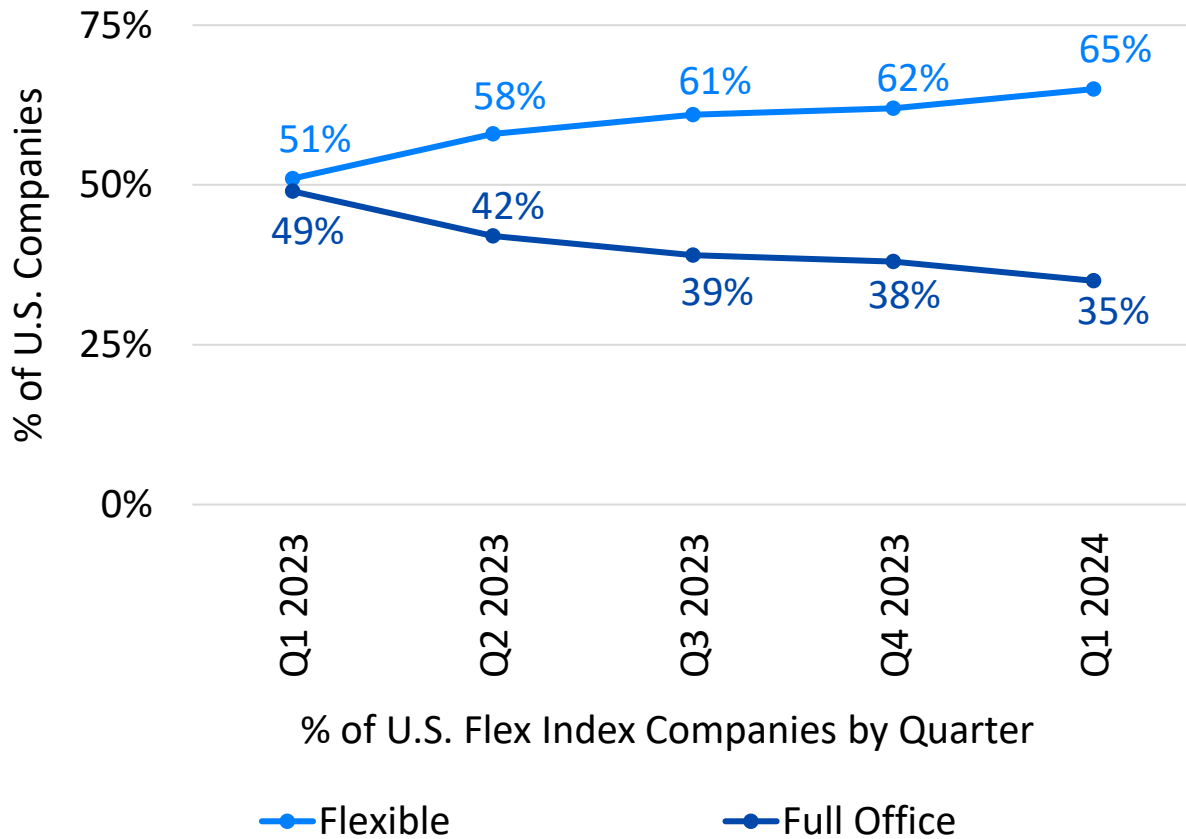
Remote workers (particularly older cohorts) began to seek out more affordable homes with greater square footage, dedicated offices, outdoor spaces and other amenities

Consequently, there was an exodus of remote workers leaving urban cores for the suburbs

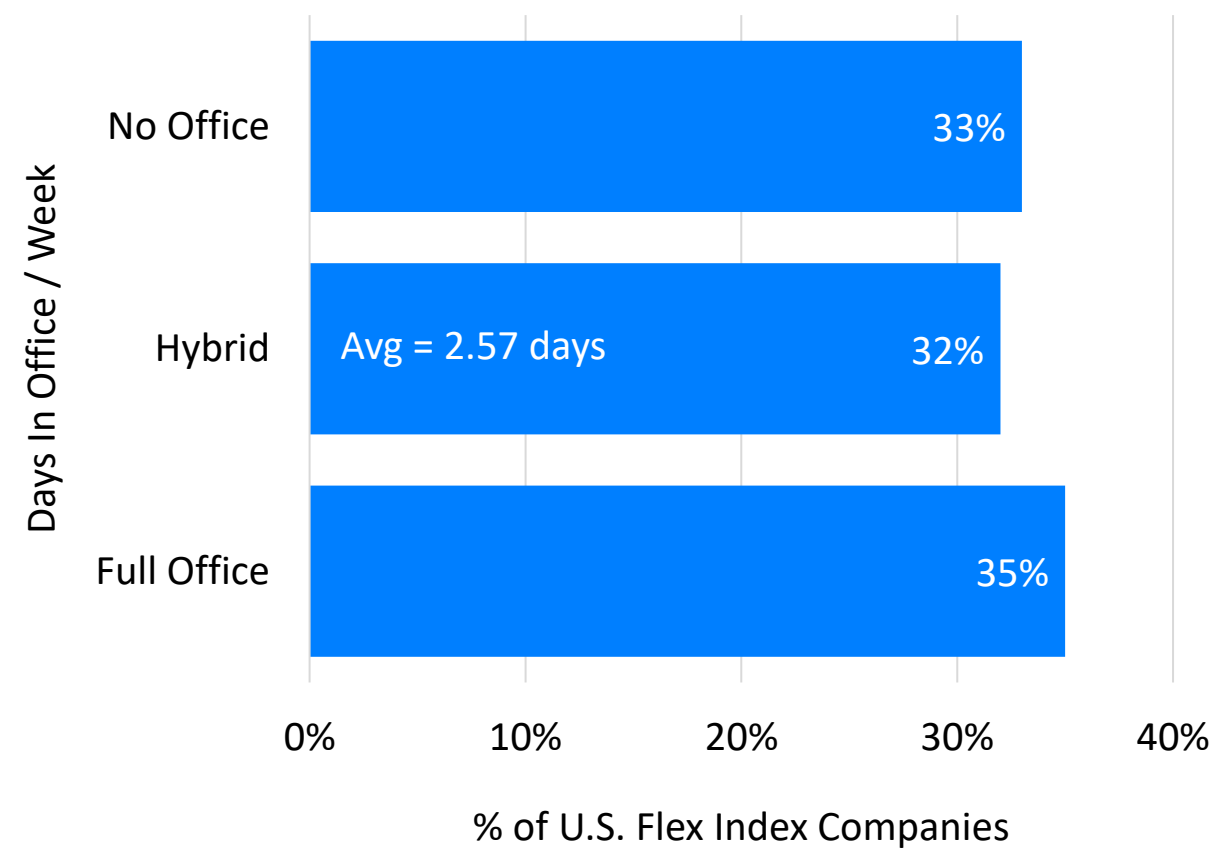


More Companies Are Continuing To Allow Greater Work Location Flexibility

U.S. Flex Index Companies Offering Work Location Flexibility Over Time



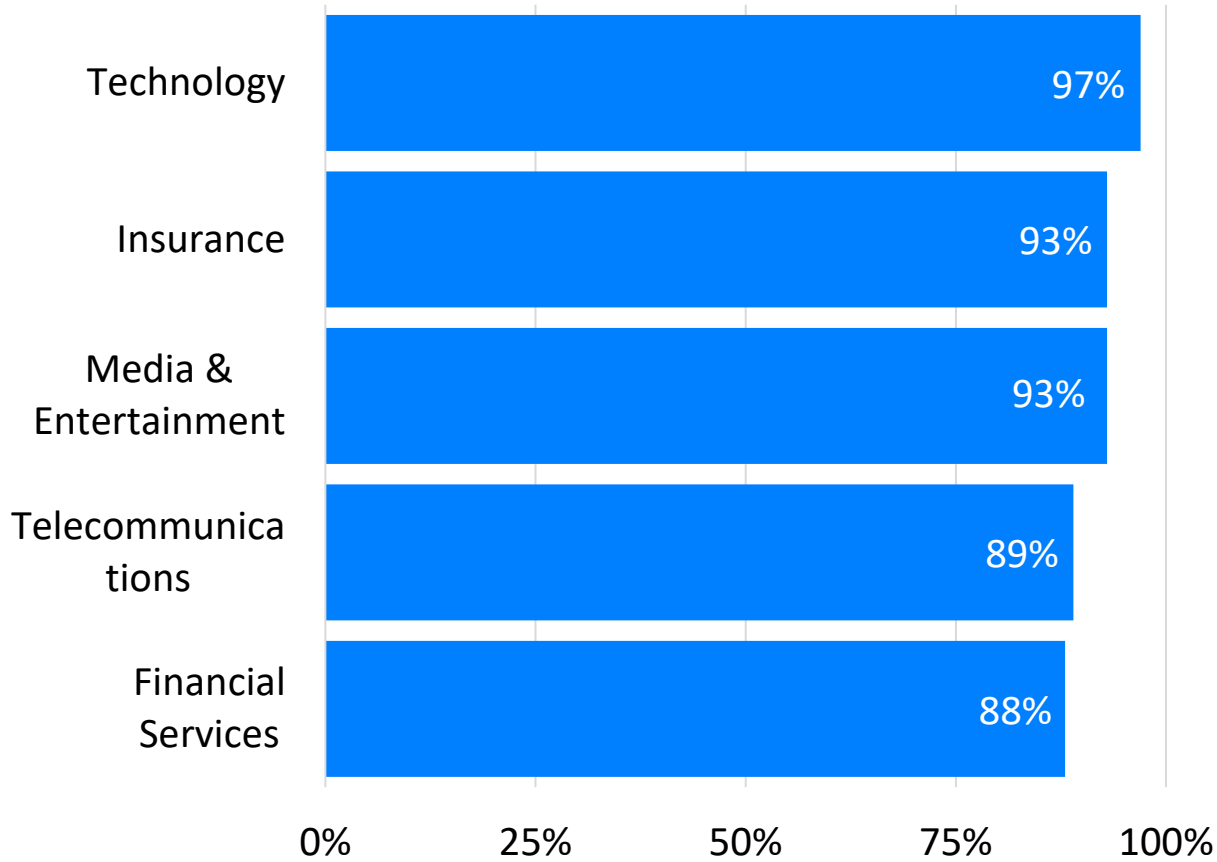
% of U.S. Companies by Number of Days Required In Office Per Week



Flexibility Varies by Industry, with Tech Predictably Being the Most Flexible

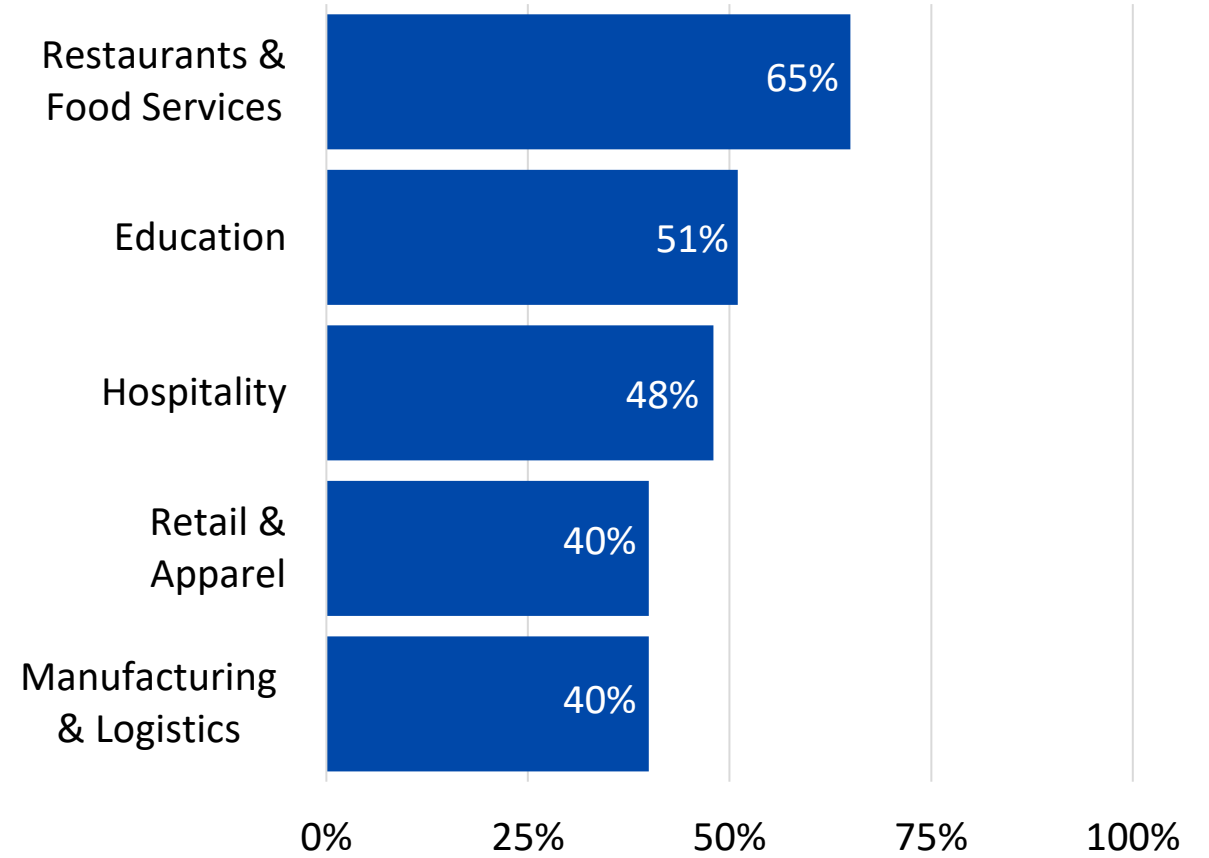
Top 5 Most Flexible Industries

■ % of Companies That Offer Work Location Flexibility



Top 5 Least Flexible Industries

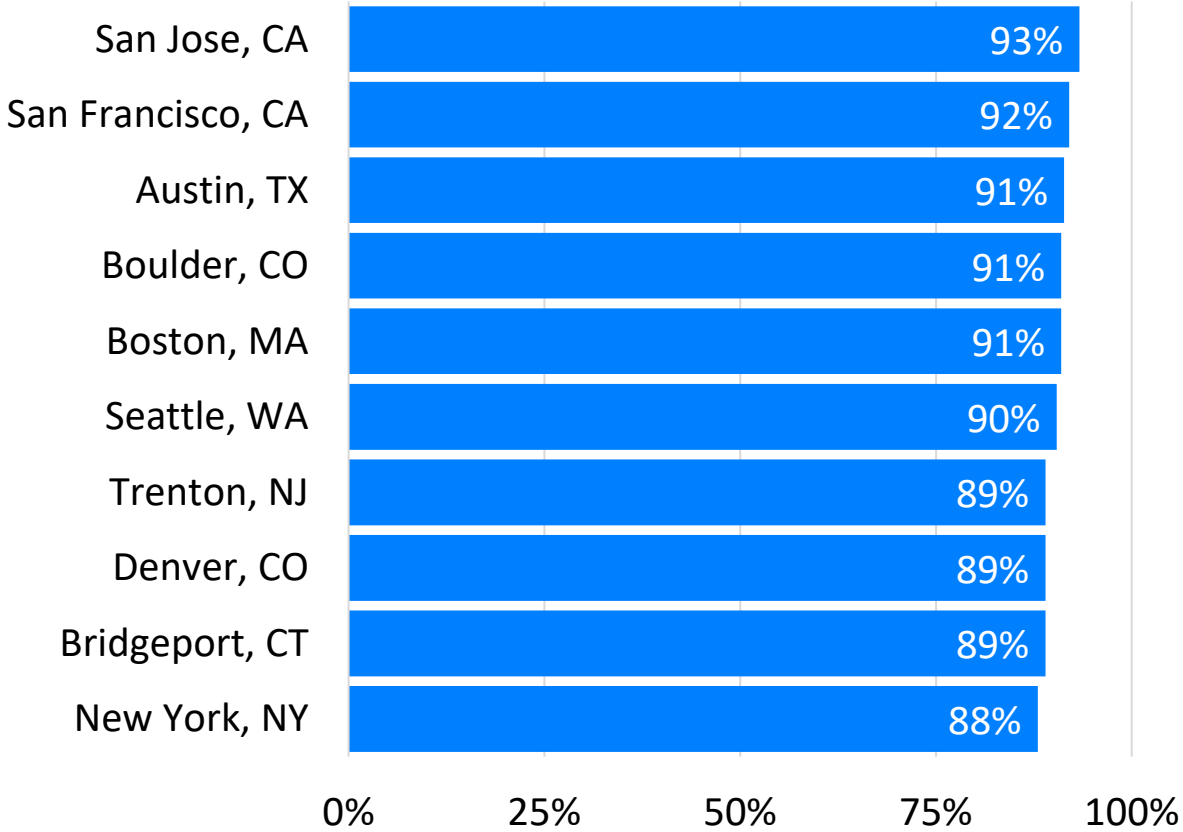
■ % of Companies That Are Full Time In Office



Flexibility Varies by Metro, with the Bay Area Allowing for the Most Flexibility and Smaller Sun Belt Metros Allowing the Least

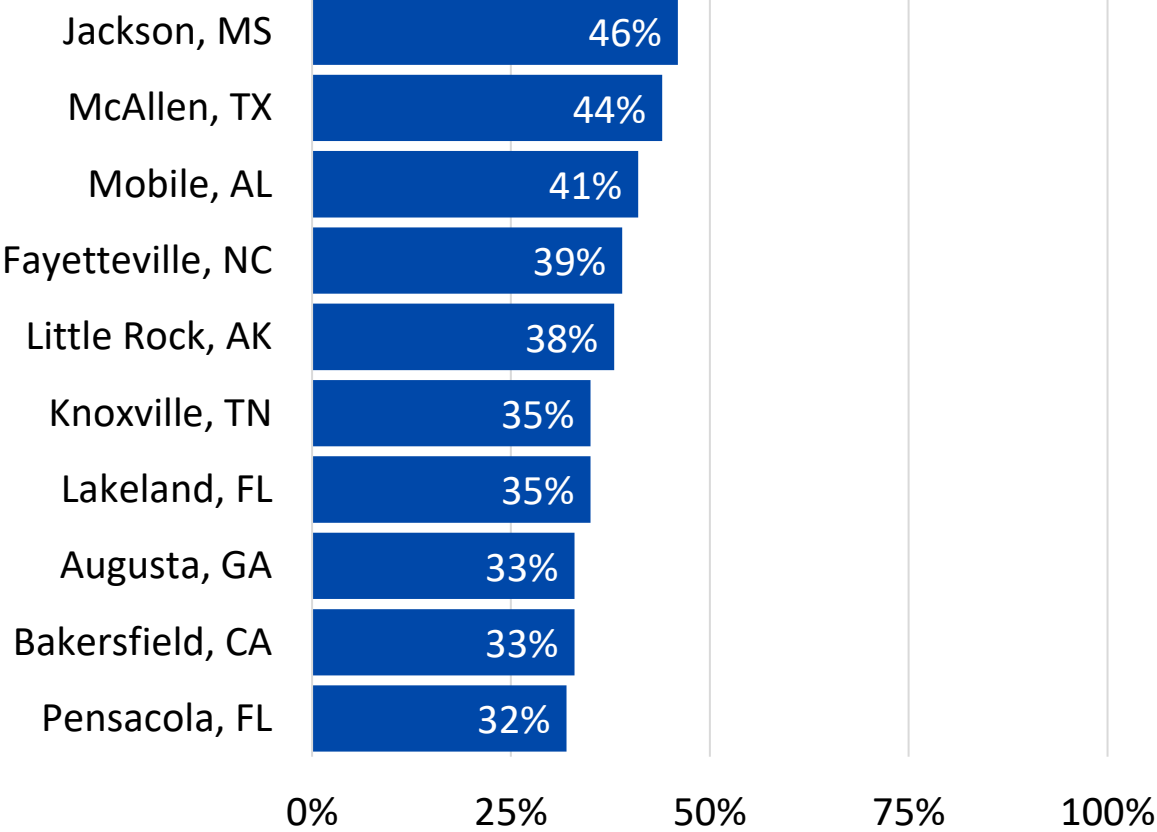
Top 10 Most Flexible Metros

■ % of Companies Offering Location Flex



Top 10 Least Flexible Metros

■ % of Companies That Are Full Time In Office



Source: Yardi Matrix; The Flex Index (flex.scoopforwork.com), Q2 2024 Flex Report

Consequently, Rents Have Risen Faster in the Suburbs Than Urban Cores

- The fastest rising rents coming out of the pandemic have been in the suburbs
 - Suburban rent grew 31% from March 2020 – September 2024; 6 percentage points higher than urban cores
- In 24 out of Matrix top 30 metros*, suburban rents outpaced their urban counterparts
 - The greatest disparity was found in Philadelphia
 - Philadelphia urban rent: up 19% since March 2020
 - Philadelphia suburban rent: up 35% since March 2020
 - Disparities of 7%+ were also found in Seattle, Los Angeles, Chicago, Boston, Atlanta, New Jersey and San Francisco



Urban Cores Are Still a Magnet for Young People

- Overall trends show Americans moving out of big cities and expensive states in favor of cheaper states with warmer climates in the Sunbelt
 - Older cohorts left metros like New York, Los Angeles and Chicago in droves
 - Most popular states people moved to: FL, TX, NC, AZ and SC
- However, Gen Z has bucked this trend
 - Gen Z was the only cohort with a migratory preference for New York City, Los Angeles and Chicago
 - All other generations saw major net decreases
 - While Florida was the most popular state for in-migration, Gen Z was the only cohort to exit
 - This cohort was more likely to move to large cities for the education, career and lifestyle opportunities



Tertiary Markets Benefit from the Migration Out of Major, High-Cost Cities

Market	Sept 2023 Rent	Sept 2024 Rent	YOY Rent Growth
Bridgeport - New Haven	\$1,949	\$2,050	5.2%
Louisville	\$1,193	\$1,252	4.9%
Milwaukee	\$1,439	\$1,496	4.0%
Dayton	\$1,103	\$1,144	3.7%
Madison	\$1,527	\$1,583	3.7%
Little Rock	\$982	\$1,018	3.7%
Richmond - Tidewater	\$1,504	\$1,555	3.4%
Tulsa	\$977	\$1,009	3.3%
Cincinnati	\$1,316	\$1,356	3.0%
Cleveland - Akron	\$1,166	\$1,201	3.0%
Central Valley	\$1,560	\$1,602	2.7%
Grand Rapids	\$1,279	\$1,312	2.6%
New Orleans	\$1,256	\$1,284	2.2%
El Paso	\$1,067	\$1,089	2.1%
Lansing - Ann Arbor	\$1,205	\$1,227	1.8%
Tacoma	\$1,738	\$1,769	1.8%

Market	Sept 2023 Rent	Sept 2024 Rent	YOY Rent Growth
Birmingham	\$1,217	\$1,232	1.2%
Reno	\$1,573	\$1,592	1.2%
Spokane	\$1,401	\$1,416	1.1%
Baton Rouge	\$1,150	\$1,159	0.8%
Eugene	\$1,554	\$1,557	0.2%
Central East Texas	\$1,108	\$1,109	0.1%
Memphis	\$1,177	\$1,178	0.1%
Savannah - Hilton Head	\$1,664	\$1,665	0.1%
Greenville	\$1,326	\$1,321	-0.4%
Pensacola	\$1,598	\$1,591	-0.4%
Tucson	\$1,216	\$1,210	-0.5%
Colorado Springs	\$1,527	\$1,496	-2.0%
Huntsville	\$1,199	\$1,172	-2.3%
Jacksonville	\$1,534	\$1,498	-2.3%
Southwest Florida Coast	\$2,006	\$1,927	-3.9%

Given These **Work-from-Home** Themes, What are Some Strategies?

There has been a dramatic shift in the way office-using employment is executed, with more people being fully remote and having flexible workplaces. Its effect varies by industry, and the mix of industries within a market influences how it impacts local real estate

In general, there has been a movement of people and spreading of the population, benefitting the following areas:

- **Movement of people:**

- Markets that had a tremendous influx of people into the metro, especially those in cheaper states with warmer climates
 - Markets in the Sunbelt states (FL, TX, NC, AZ & SC)
- Smaller tertiary markets benefit from the population flow out of major, higher-cost cities
 - Bridgeport – New Haven, Louisville, Milwaukee, Dayton, Madison, Little Rock & Richmond – Tidewater

- **Spreading of the population:**

- People within larger metros have spread out within that metro area since they either no longer have to commute, or their commute is significantly less
 - Suburban areas of Philadelphia, Seattle, Los Angeles, Chicago, Boston, Atlanta, New Jersey & San Francisco

RE-INDUSTRIALIZATION & ENERGY PRODUCTION

Midwest Performing Well via Re-industrialization and Modest New Supply

Market	2024 Unit Completions (F)	% of Starting Inventory	2023 YOY Rent Growth	Sept 2024 Average Rent	Sept 2024 YOY Rent Growth	Year-End 2024 Rent Growth (F)
Kansas City	4,196	2.4%	3.0%	\$1,309	4.2%	4.0%
Indianapolis	6,428	3.5%	2.4%	\$1,285	3.3%	3.4%
Cincinnati	3,731	3.1%	3.6%	\$1,356	3.0%	3.4%
Columbus	7,136	3.7%	2.9%	\$1,310	2.8%	3.3%
Milwaukee	2,311	2.4%	3.2%	\$1,496	4.0%	4.4%
Louisville	3,353	3.8%	2.5%	\$1,252	4.9%	5.2%
Omaha	4,006	4.3%	3.8%	\$1,248	3.7%	4.0%
Lexington	571	1.4%	4.1%	\$1,201	4.3%	6.4%

Factors Driving Growth in the Midwest:

- Affordability
 - The continuance of work-from-home policies has allowed many to move from expensive coastal cities to more affordable Midwest metros
 - High mortgage rates have kept many potential buyers in the rental market, thus putting greater pressure on demand
- Modest development
 - Completions are keeping better pace with demand than the Sun Belt which has seen an influx of supply
- Job growth
 - The growing electric vehicle industry is expected to create over 25,000 jobs in Ohio by 2030
 - Meta and Google are both slated for data center projects in Indiana in the coming years

CHIPS Act Creates Thousands of Jobs as Chip Manufacturing Returns to the U.S.

- In early 2022, Biden signed the nearly **\$53B CHIPS and Science Act** into law to bring research, development and the manufacturing of semiconductors back to the U.S.
- In the two years since, more than half the \$53B funds have already been allocated and dispersed
- Companies who are beneficiaries of the law include **Intel, Micron, IBM**, among others, who have announced new facilities in Arizona, New York, Oregon and other states
- The act has funded 26 projects and has created more than 36,000 jobs to date
- However, the U.S. will need approximately 67,000 more workers by 2030 to keep up with the demand in the chipmaking sector
- Higher education, governments, NGOs and other economic development entities must come together to enable further growth in chip fabrication, packaging and other functions

The CHIPS Act is Creating Jobs in Small, Sometimes Underdeveloped Submarkets

Company	Amount	Estimated Jobs	Location	2024-2029 Rent Growth (F)	2024-2029 Supply (F)	Development Pipeline
Intel	\$8.5B	30K	Chandler, AZ	15.1%	2,694	4,668
			Rio Rancho, NM	29.1%	980	1,880
			Hillsboro, OR	27.0%	-	-
			Licking County, OH	25.1%	100	100
TSMC	\$6.6B	26K	Phoenix, AZ	15.1%	4,508	7,247
Samsung	\$6.4B	20K+	Taylor, TX	20.8%	948	3,304
Micron	\$6.1B	21.5K	Clay, NY	29.0%	96	624
Global Foundries	\$1.5B	10.5K	Malta, NY	26.2%	875	2,550
			Essex Junction, VT	-	-	-
Microchip Technology	\$162M	700	Colorado Springs, CO	22.7%	476	236
			Gresham, OR	22.7%	535	1,202
Polar Semiconductor	\$120M	160	Bloomington, MN	22.0%	898	646
BAE Systems	\$35M	-	Nashua, NH	28.6%	867	1,667

Development pipeline includes units currently in lease up, under construction, planned and prospective | Estimated Jobs includes both construction and manufacturing jobs

| Essex Junction, VT is not covered by Yardi Matrix | Source: Yardi Matrix; route-fifty.com; theverge.com; aztechcouncil.org; nist.gov; commerce.gov; nytimes.com; gf.com;

microchip.com; intel.com; pr.tsmc.com; semiconductor.Samsung.com; micron.com



EV Boom Remakes Rural Towns in the South and Midwest

Stanton, TN: The town of approximately 400 people is preparing for the opening of Ford's 3,600 acre auto-manufacturing site, [Blue Oval City](#), which is **expected to employ 6,000 workers** (15x's the current population)

- The \$5.6MB mega campus, which was announced in September 2021 and is slated for completion in 2025, will produce the next generation of electric F-Series trucks and batteries
- The town is currently grappling with how to accommodate the influx of new workers and residents, including the construction of thousands of new homes, the expansion of the local school system and the potential establishment of a police force
- According to Matrix data, the submarket currently has 537 rental units (73% are fully affordable), **with 0 units in the pipeline** (Lease Up, Planned, Prospective or Under Construction) and **0 units in the supply forecast** (2024-2029)

Lordstown, OH: The town of 3,300 is home to the first [GM Ultium Cells](#) plant which mass produces battery cells for GM's electric vehicle lineup

- The 2.8M SF facility broke ground in May 2020, opened in August 2022 and **employs 1,300 workers**
- According to Matrix data, the submarket currently has 407 units (13% are fully affordable), with **0 units in the pipeline and just 98 units forecasted** 2024-2029

New Carlisle, IN: The town of approximately 1,900 will be home to the \$3.5B joint-venture between [GM and Samsung SDI](#) to produce EV batteries

- The facility is **expected to employ 1,700 workers** and is slated for completion in December 2027
- According to Matrix the data, the submarket currently has 152 units (100% are fully affordable), with **0 units in the pipeline and 0 units in the supply forecast** (2024-2029)

Given These **Re-Industrialization** Themes, What are Some Strategies?

- **Midwest markets fueled by re-industrialization with strong labor markets and economic growth**
 - Kansas City, Indianapolis, Cincinnati, Columbus, Milwaukee, Louisville, Omaha & Lexington
- **Smaller, more rural markets benefitting from the opportunities and economic growth of the CHIPS and Science Act bringing research, development and the manufacturing of semiconductors to their area**
 - Chandler, AZ; Rio Rancho, NM; Hillsboro, OR; Licking County, OH; Phoenix, AZ; Taylor, TX; Clay, NY; Malta, NY; Colorado Springs, CO; Gresham, OR; Bloomington, MN; Nashua, NH; Stanton, TN; Lordstown, OH; New Carlisle, IN



Tax and Housing Election Implications

- No one will know anything until we know the make up of the House and Senate (in addition to the presidency)
- The entire federal tax code has to be rewritten in 2025
 - Housing policy will be a part of that rewrite, and we won't know how that will pan out until the end of 2025
- Regardless, states will continue to act, which is why it's important to factor the investment risk framework in your decision-making



Weighting	40%				35%				15%			10%			100%
	FUNDAMENTALS				INFRASTRUCTURE				POLITICAL RISK			ENVIRONMENTAL RISK			
	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	33.3%	33.3%	33.3%	33.3%	33.3%	33.3%	
MARKET	Forecasted Population Growth	Forecasted Rent Growth	Quality of Tech Labor Market	Affordability for Renters by Necessity	Water	Energy	Transportation	Schools	Philosophy Toward Affordability	Urban Policing/ Security	Tax Burden/ Pension Liability	Natural Disasters	Pollution (Air & Water)	State & Local Government	OVERALL RATING
Boise	3	2	2	1	3	3	3	3	3	3	3	3	2	2	2.53
Raleigh - Durham	3	2	3	2	3	2	2	2	3	3	3	2	3	3	2.50
Salt Lake City	3	1	3	2	2	2	3	3	3	3	3	3	1	2	2.43
Miami	3	2	3	3	2	2	2	3	2	2	3	1	3	1	2.40
Charlotte	3	3	2	1	3	3	3	2	3	2	3	2	1	1	2.40
Colorado Springs	3	3	2	1	2	2	2	2	3	3	2	3	3	3	2.30
Boston	1	3	3	1	3	3	2	2	1	3	2	3	3	3	2.28
Nashville	3	2	2	1	3	3	2	2	3	2	3	1	2	3	2.28
Denver	3	3	3	1	2	2	2	2	2	2	2	3	2	3	2.27
Columbus	3	2	2	3	3	3	1	1	3	3	1	2	2	2	2.25
Austin	3	2	3	3	2	1	2	2	2	2	3	1	2	2	2.23
Madison	1	3	2	1	3	2	2	2	3	3	3	3	2	3	2.20
Indianapolis	2	2	2	3	2	2	1	3	3	2	3	2	1	2	2.17
Atlanta	3	1	3	2	3	3	2	1	2	2	2	2	2	1	2.15
Huntsville	2	3	3	3	2	3	1	1	3	2	1	1	2	1	2.15
Dallas	3	1	3	2	2	1	3	3	3	2	2	1	1	1	2.14
Savannah	2	3	1	2	2	3	2	2	2	3	2	1	2	3	2.14
Omaha	2	3	2	3	2	1	2	1	3	2	2	2	3	1	2.08
Oklahoma City	2	3	1	3	2	1	2	2	3	1	3	1	2	2	2.03
Grand Rapids	2	3	1	1	2	2	1	2	3	3	3	3	2	2	2.00
Twin Cities	2	1	2	2	3	3	3	1	0.5	1	2	3	2	2	1.98
Washington DC	2	1	3	1	3	2	3	2	1	1	2	2	2	2	1.98
Kansas City	1	2	1	3	3	2	2	2	3	1	2	1	2	2	1.95
Houston	3	1	2	2	2	2	3	1	3	1	3	1	1	1	1.95
Orlando	3	1	2	1	1	2	3	1	3	3	3	1	2	2	1.93
Seattle	3	1	3	1	3	1	2	1	1	1	3	3	2	2	1.90
Phoenix	3	1	2	2	1	2	2	3	2	2	1	1	2	1	1.88
Las Vegas	3	1	1	1	2	2	3	2	2	2	3	1	2	1	1.87
Portland	2	2	2	1	3	1	2	2	0.5	1	2	3	2	3	1.84
Tampa	2	2	2	1	3	1	1	1	3	3	3	1	2	2	1.84
San Francisco	2	2	3	2	2	1	1	2	0.5	1	2	3	2	2	1.83
Tulsa	1	3	1	2	3	1	2	2	3	1	2	1	2	1	1.83
San Diego	1	3	3	1	2	1	1	1	1	3	2	2	2	2	1.74
Albuquerque	1	3	1	3	1	3	1	1	3	1	1	1	2	1	1.71
Pittsburgh	1	2	2	2	2	1	2	1	2	2	1	3	2	2	1.71
New York	1	3	2	1	3	1	2	1	0.5	1	2	2	2	2	1.69
Chicago	1	2	2	1	3	3	1	1	1	1	1	1	1	2	1.58
Los Angeles	1	2	2	1	1	1	3	1	0.5	2	2	1	2	2	1.52
Philadelphia	1	1	2	1	2	1	2	1	1	2	1	1	2	2	1.39

Investment Risk Base Case Scenario: Ranked by Score

LEGEND	
●	Red Icon = High Investment Risk
●	Yellow Icon = Mild Investment Risk
●	Green Icon = Low Investment Risk



Yardi Matrix House View – October 2024

MACROECONOMIC UPDATE

- U.S. economic growth remains relatively healthy with GDP growing at a 3% annualized rate in Q2 2024, Q3 looks north of 2%.
- The Fed lowered interest rates by a half-percentage point at the September meeting, the first rate reduction since 2020
 - More short-term interest rate cuts anticipated by EOY 2024 to maintain solid economic growth
 - However, the Fed has implied they don't see a reason to lower rates as aggressively as they did at their most recent meeting
- Inflation moved closer to the Fed's 2% target in September, further easing the path for future rate cuts
 - Unit labor costs, a measure of underlying inflation, have tempered as compensation growth moderates and labor productivity remains strong at 2.7% in Q2 2024
- The labor market has had an overall slowdown this year, but remains resilient
 - Job growth accelerated in September and the unemployment rate fell 10 basis points to 4.1%
 - Resignations are at their lowest since August 2020, a sign that employees are growing less confident in the job market
- 2023 population increase provided a temporary boost to population growth and labor supply, therefore lessening wage pressures
 - Unlikely to change trajectory of slowing population growth in the long-term
- Lack of consensus on immigration policy as 5-8M illegal immigrants enter the labor market
- U.S. economy is expected to slow and then rebound; the yield curve (10YR - 3MTH) is inverted with a soft-ish landing likely mid-2025; but large Federal deficits (>\$1.6 Trillion) are diluting monetary policy and the US 10 Yr has backed up to 4.2%

Yardi Matrix House View – October 2024

MULTIFAMILY UPDATE

- Overall, the multifamily market is performing well, as demand continues to soak up supply
- Market performance confirms the importance of the supply/demand balance:
 - Markets with an influx of new supply have had dampened rent growth as new units get absorbed, but likely a short-term bump in the road
 - Majority of markets are seeing decent rent growth
- Multifamily construction starts have been slowing over the past year, and deliveries are expected to decline after 2024's peak
 - Reduced new supply in 2026 and 2027 will provide a boost to performance
- The supply shortage of U.S. housing is likely to last at least 5-10 years preventing a major reduction in home values, apart from some weakness in Texas and Florida where single-family home inventories are rapidly rising
- Distress in multifamily is only "sort of" showing up
 - However, pressure on owners is increasing as debt funds become more aggressive in taking back assets and banks look to resolve loan extensions to expand new lending

The structure of today's webinar is built around investment themes and strategies, and how Yardi Matrix's data service facilitates executing those strategies



THANK YOU

Feel free to contact us with any questions

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