



Federal Home Loan Bank
NEW YORK

Presentation from the FHLBNY:

How Close to a Tipping Point?

Brian Jones, Vice President & Financial Economist, FHLBNY

August 4, 2022



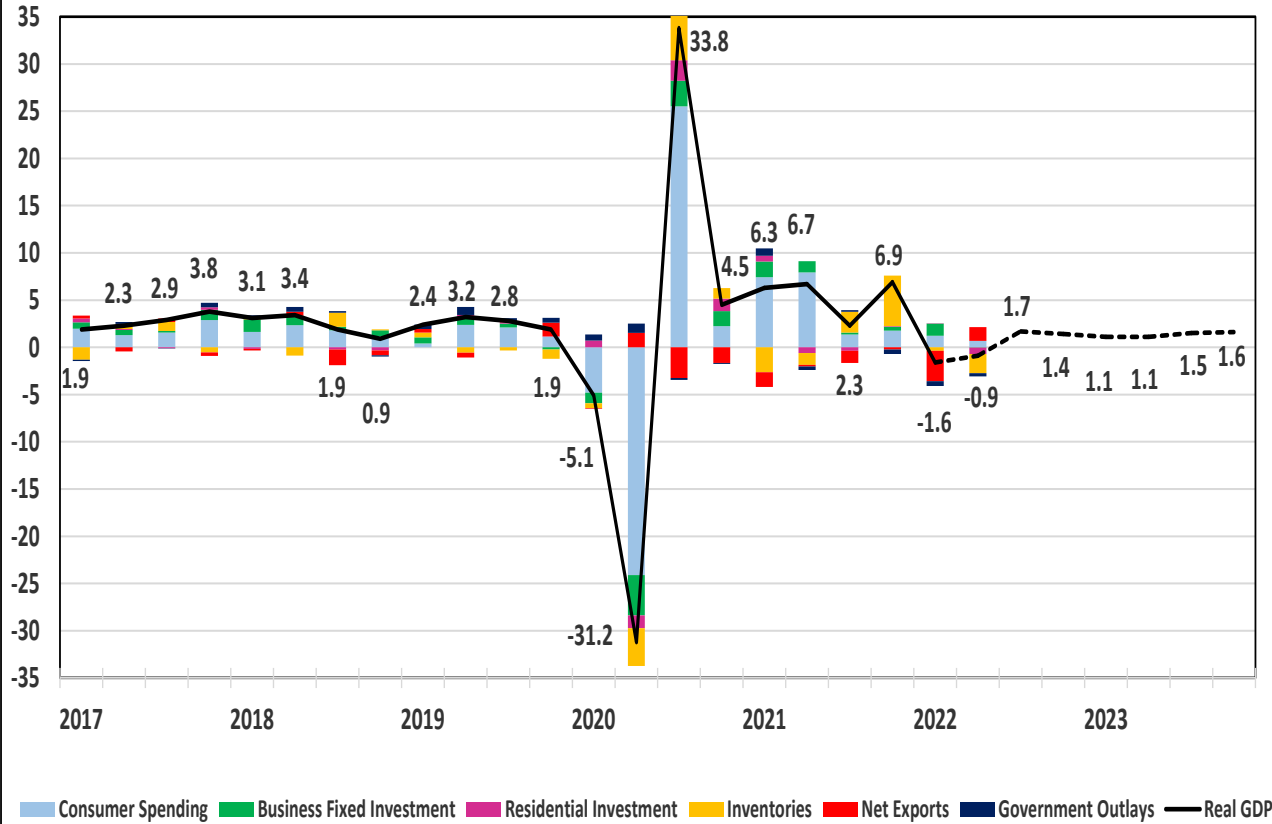
Factors Behind United States Economic Recessions Since WWI

	Industrial	Oil Prices	Monetary	Financial	Fiscal	Healthcare Crisis	Multi Factor	All
Beginning:								
Aug-18					7			7
Jan-20			18		18		18	18
May-23	14							14
Oct-26	13							13
Aug-29				43				43
May-37			13		13		13	13
Feb-45					8			8
Nov-48	11							11
Jul-53					10			10
Aug-57			8					8
Apr-60			10					10
Dec-69			11		11			11
Nov-73		16	16				16	16
Jan-80		6	6				6	6
Jul-81			16					16
Jul-90		8	8	8			8	8
Mar-01				8				8
Dec-07				18				18
Mar-21						2		2
Number	3	3	9	4	6	1	6	19
Avg Length (Months)	12.7	10.0	11.8	19.3	11.2	2.0	12.0	12.6

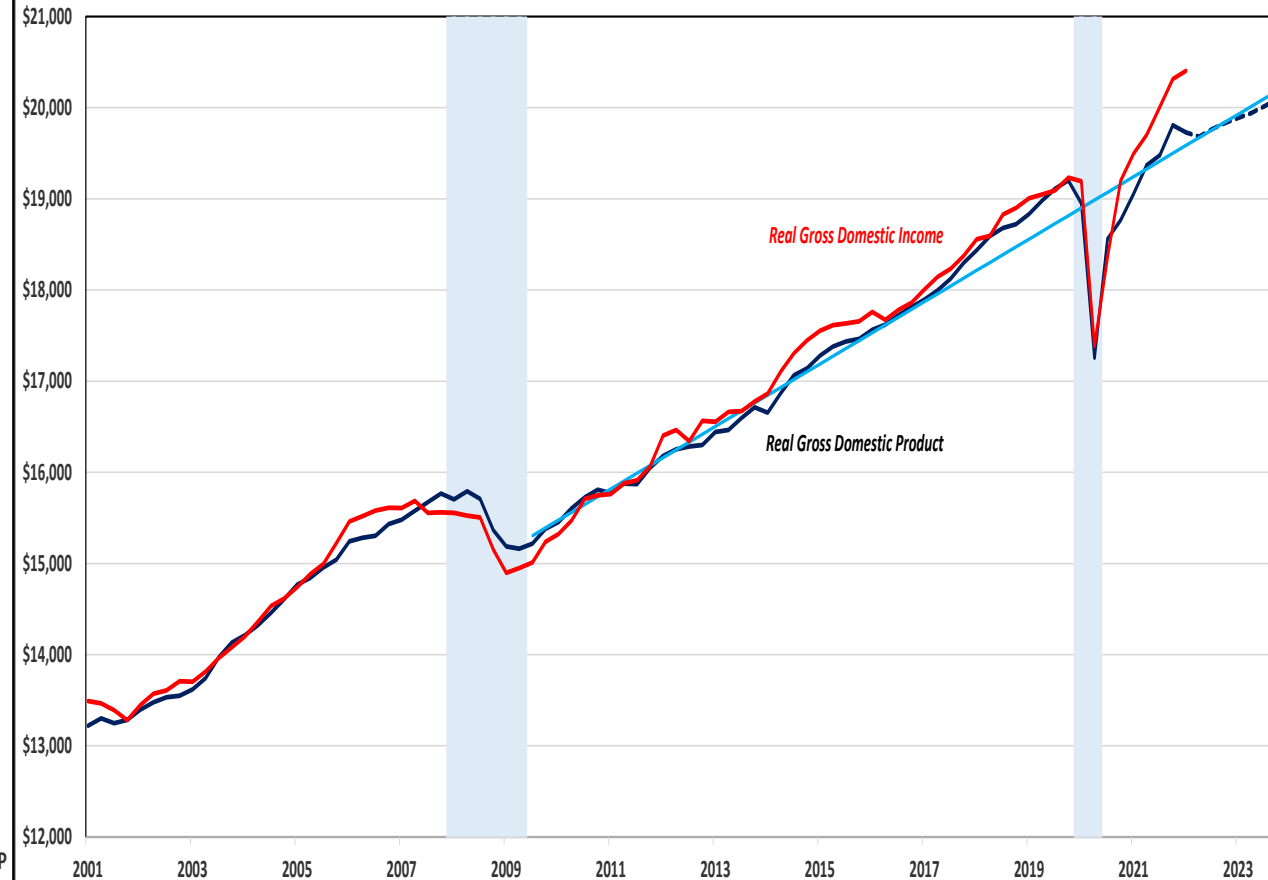
Sources: Goldman Sachs Global Investment Research, National Bureau of Economic Research and FHLBNY

Real GDP Dipped Modestly in Q2, But Record Gap Between Real GDI and GDP Hint at Coming Upward Revisions

Net Contributions to Real GDP Growth
(quarterly percentage change at seasonally adjusted annual rate)



Real Gross Domestic Product & Income
(Billions of Chained 2012 Dollars, Seasonally Adjusted Annual Rate)

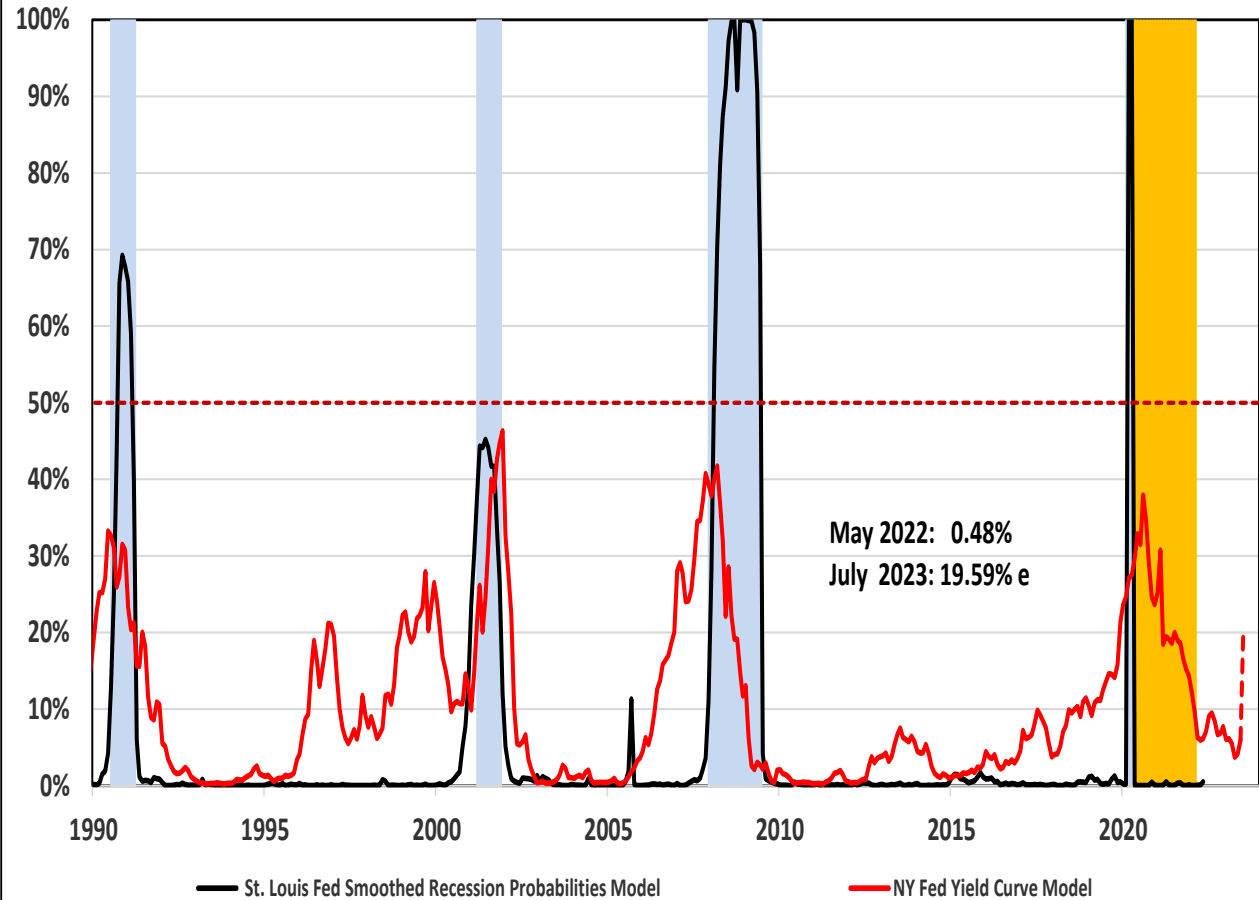


Notes: Shaded areas denote recessions. Dotted lines represent consensus projections.

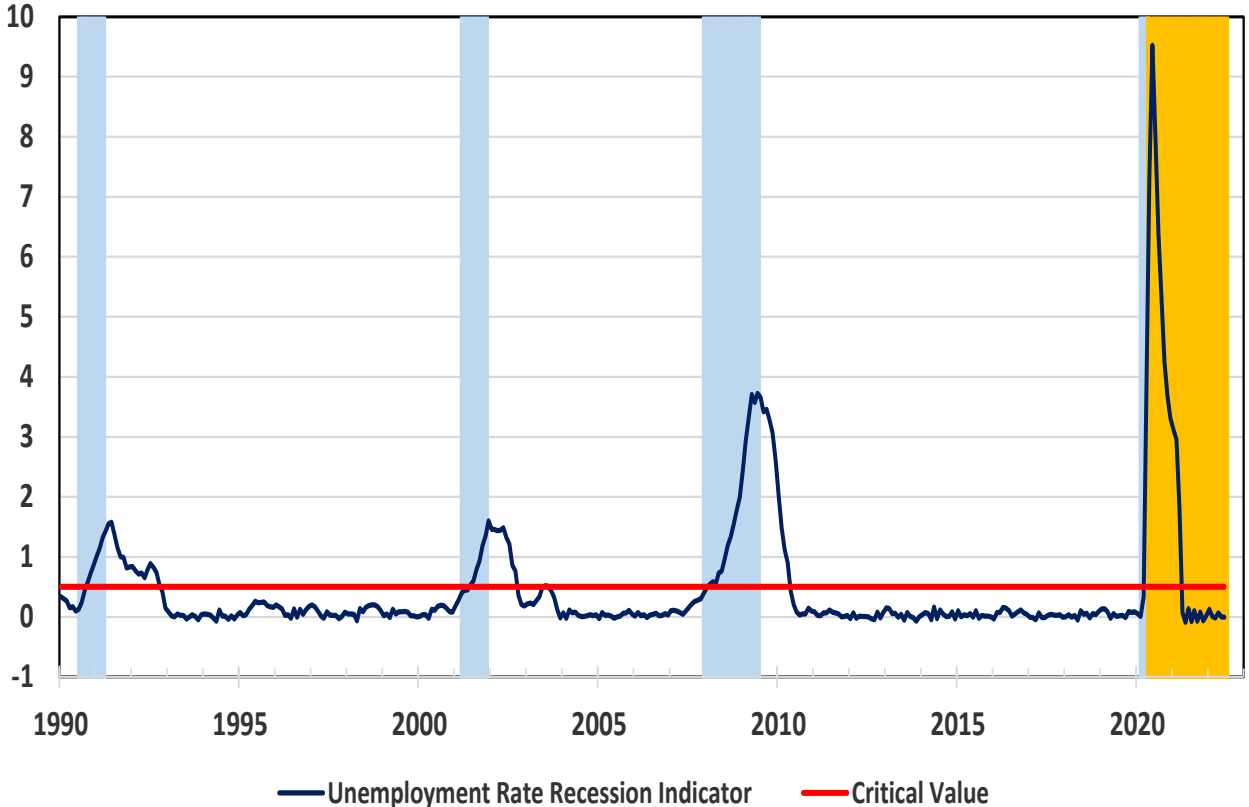
Sources: Bloomberg, Bureau of Economic Analysis, National Bureau of Economic Research and FHLBNY estimates

Economy Not Yet in Recession, But Probability of a Future Business-Cycle Downturn Rising

U.S. Recession Probabilities



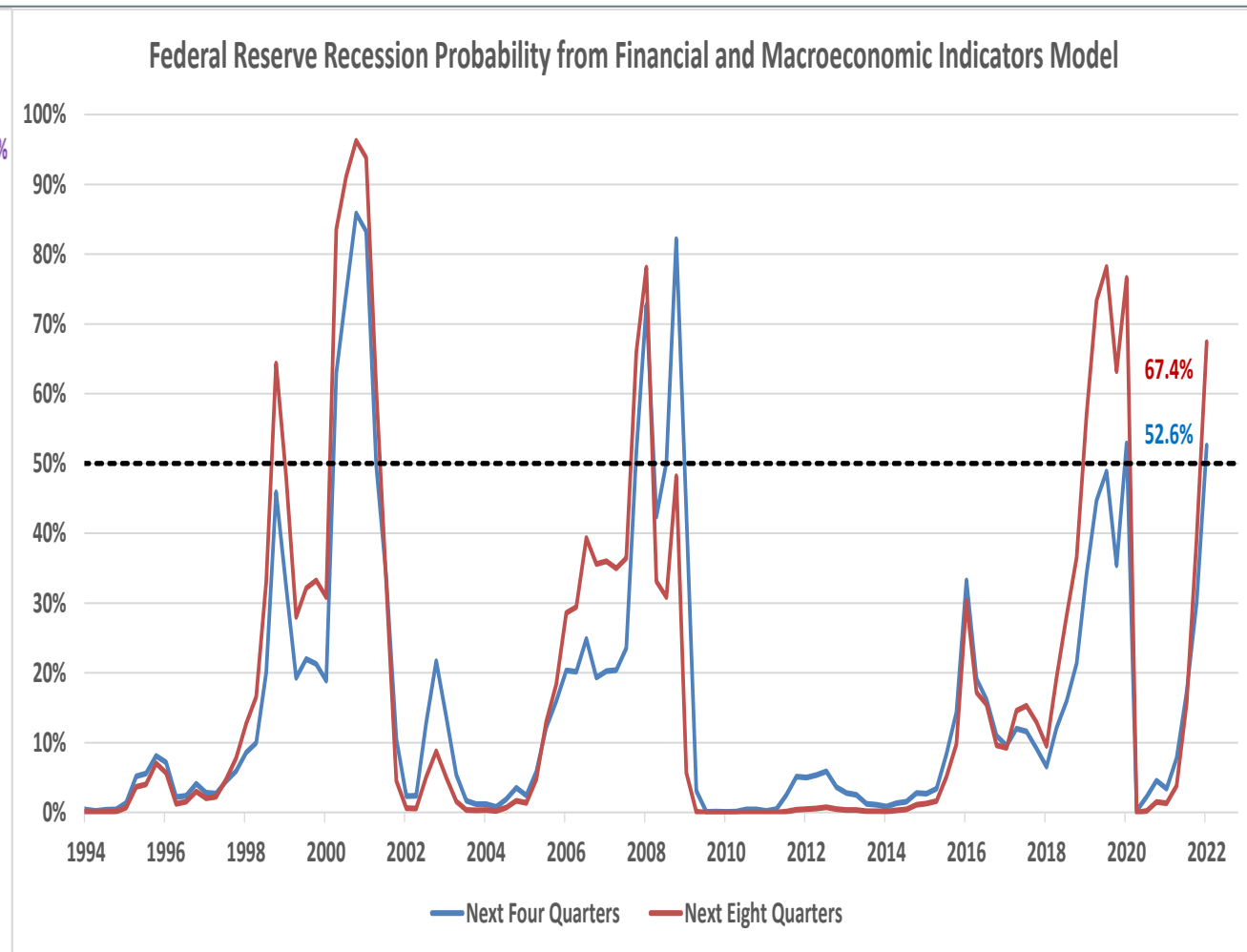
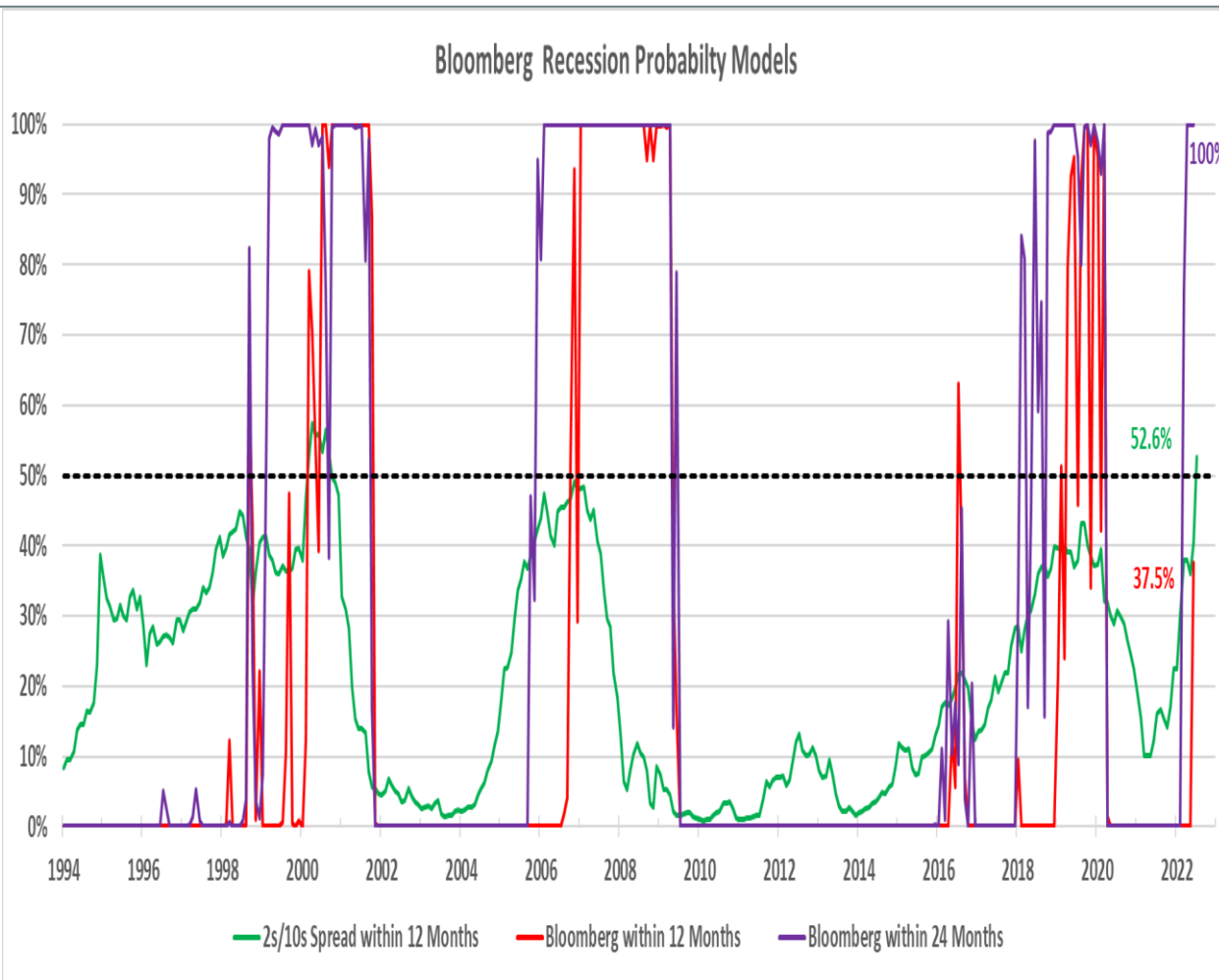
Claudia Sahm (St. Louis FRB) Recession Indicator
(Avg Unemployment Rate Over Three Months Less Prior 12-Month Low)



Notes: Blue shaded areas denote recessions. Orange area highlights current economic expansion.
Sources: Bloomberg, Federal Reserve Bank of St. Louis, National Bureau of Economic Research and FHLBNY estimates



However, Estimated Future Recession Probabilities Are Rising

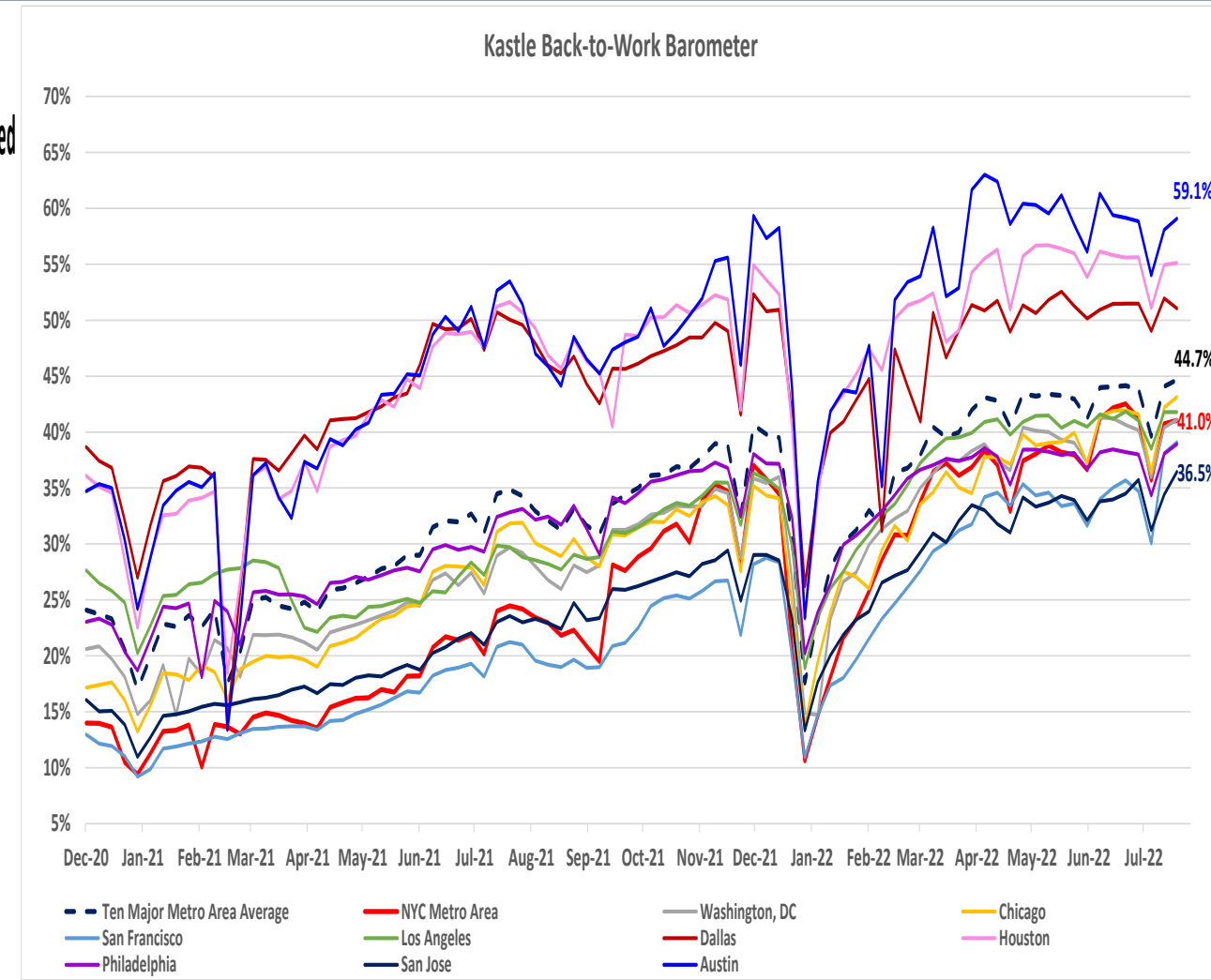


Sources: Bloomberg, Federal Reserve Board and FHLBNY estimates



Progress Continues in Distributing Vaccines; Office Returns Moving Sideways

July 26, 2022	Doses Administered	% of Population Given			Daily Rate of Doses Administered	% of Supply Used
		1+ Dose	Fully Vaccinated	Booster Dose		
United States	599,333,639	77.8	66.4	31.8	408,520	77.0
FHLBNY District:						
New York	40,492,239	87.9	75.1	35.1	22,215	82.7
New York City	17,448,355	86.7	77.9	NA	1,342	NA
New Jersey	17,812,917	87.6	73.2	36.0	10,236	75.5
Puerto Rico	7,396,891	93.0	81.4	48.8	3,693	94.7
Virgin Islands	148,784	81.4	65.8	20.9	31	94.6

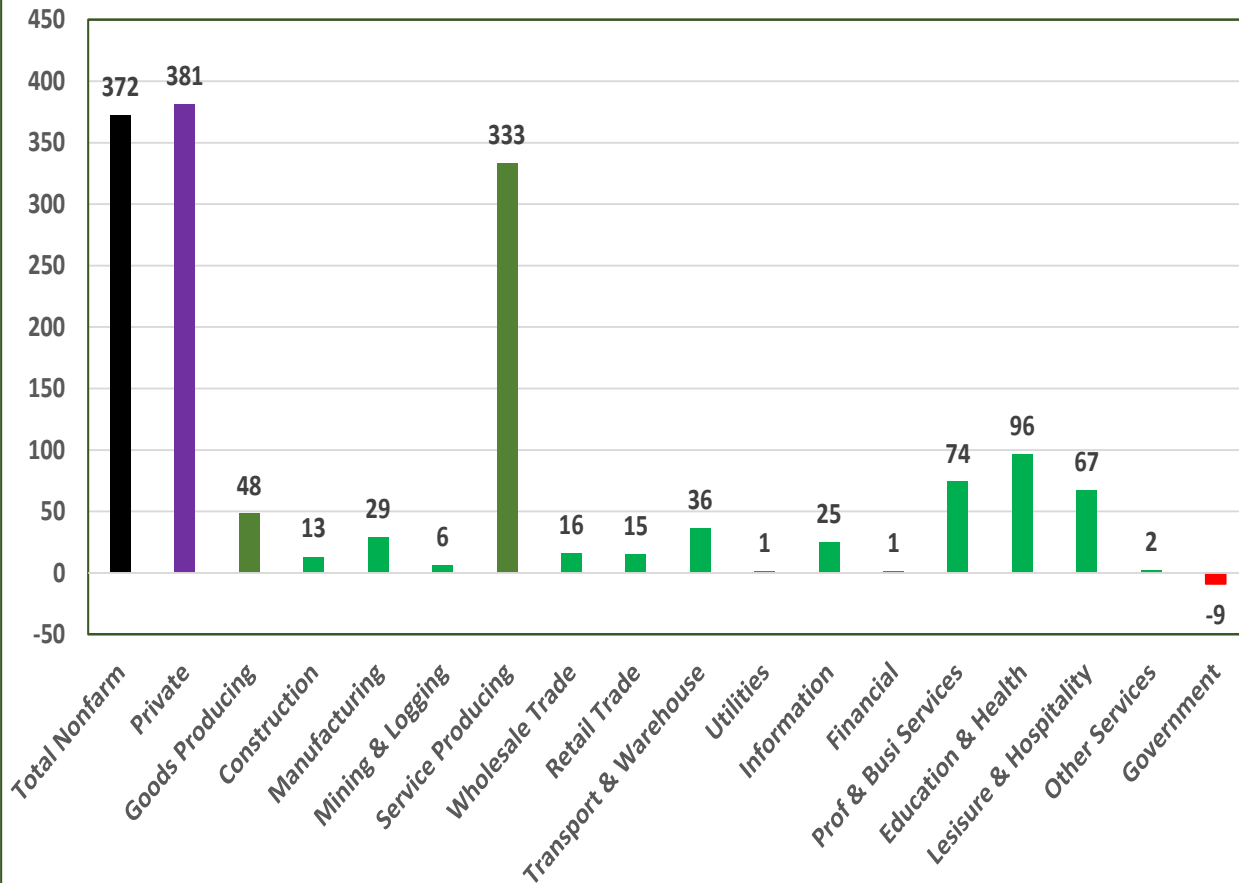


Source: Bloomberg, Kastle Systems

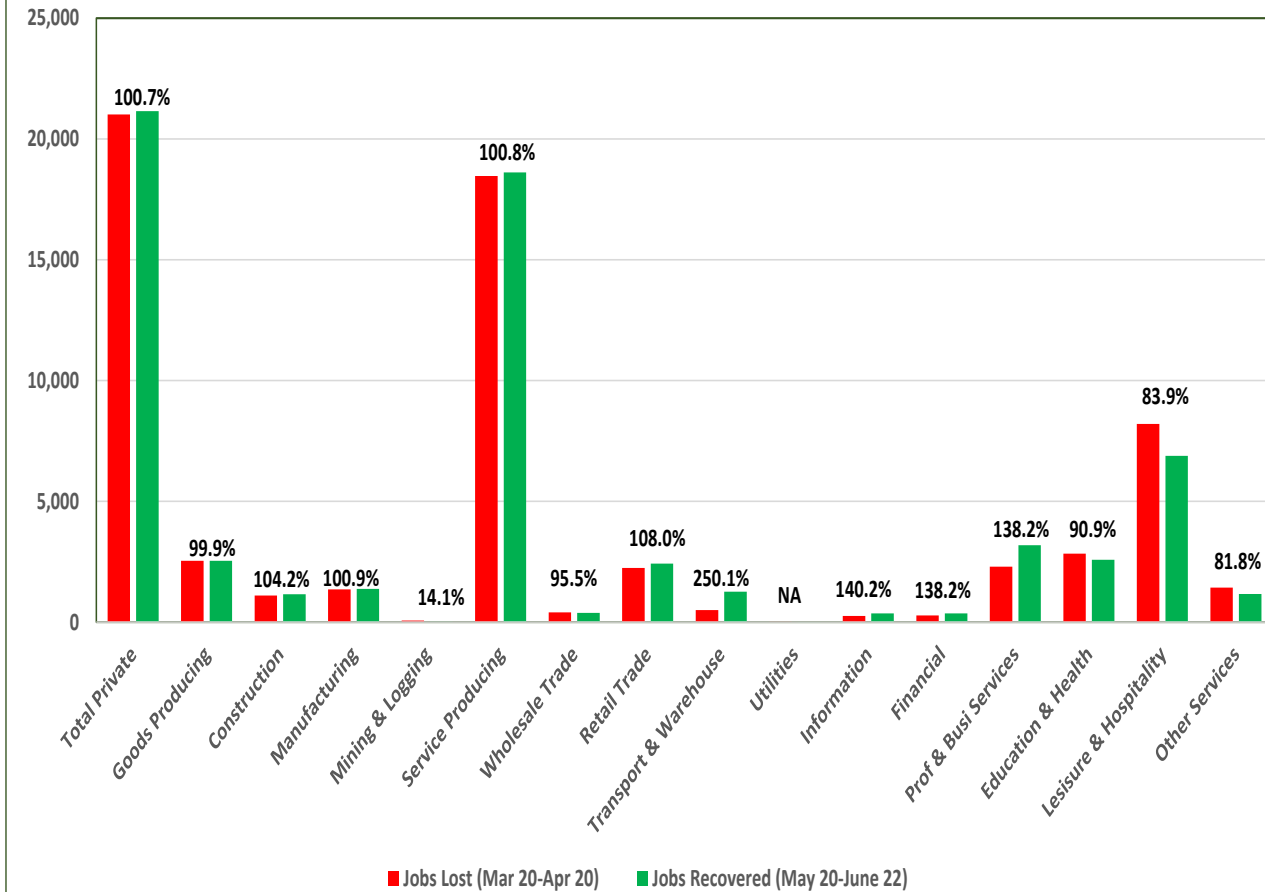


Hiring Remained Solid in June; Private-Sector Jobs Recovery Now Complete

June Changes in Nonfarm Payrolls
(thousands, seasonally adjusted)



Changes in Nonfarm Payrolls Over the Course of the Covid-19 Pandemic
(thousands, seasonally adjusted)

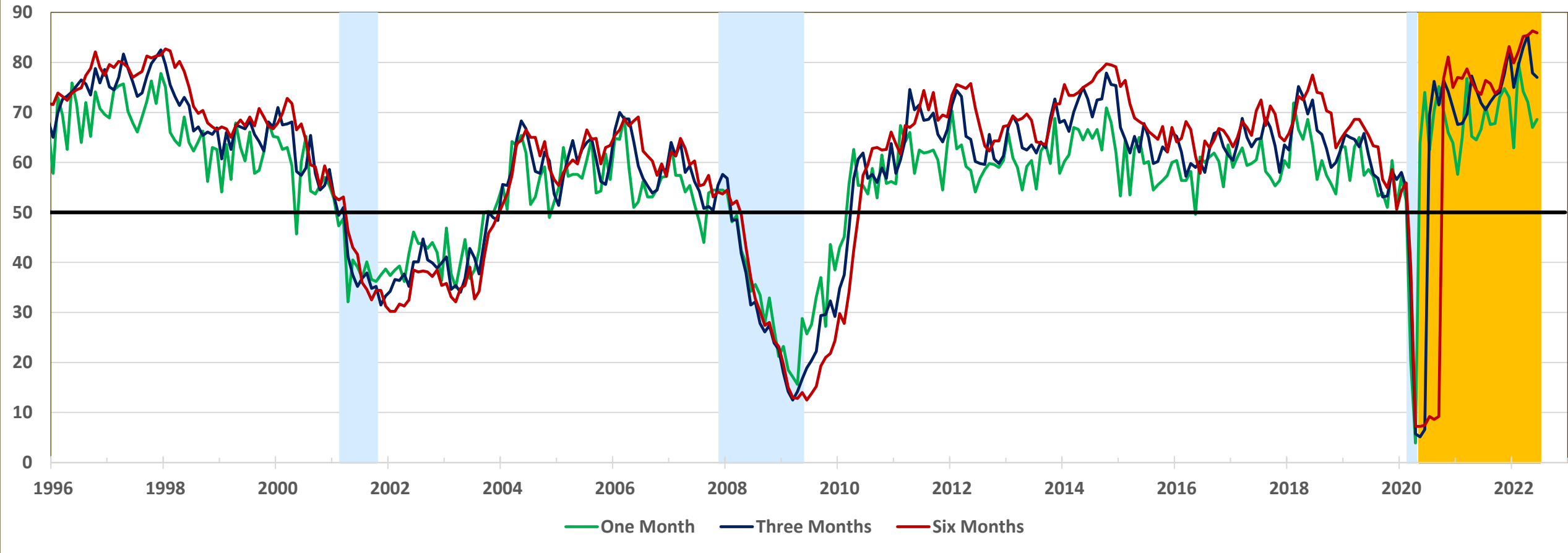


Source: Bureau of Labor Statistics



Hiring Breadth Gauges Remained Deep in Expansionary Territory Last Month

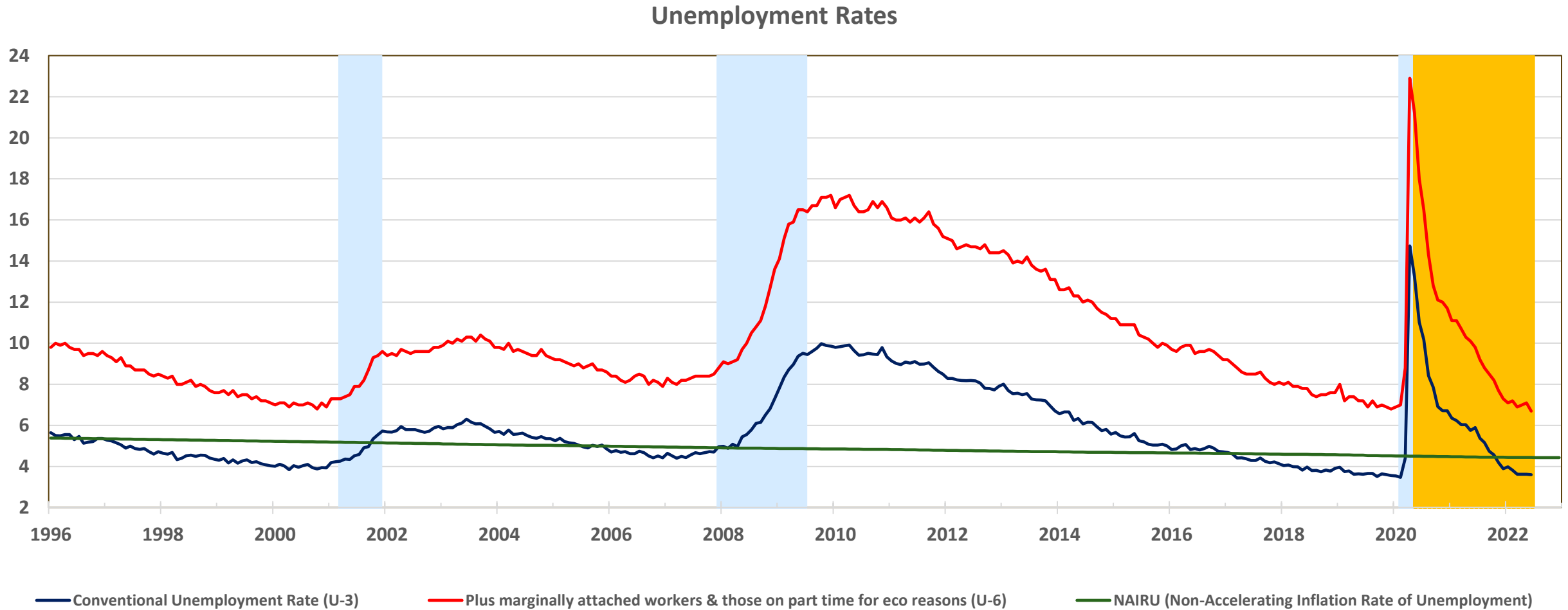
Diffusion Indexes of Nonfarm Payrolls
(% increase plus one half those unchanged)



Notes: Blue shaded areas denote recessions. Orange shaded area highlights current economic expansion.
Sources: Bureau of Labor Statistics and the National Bureau of Economic Research



Extended Unemployment Rate Now at Record Low

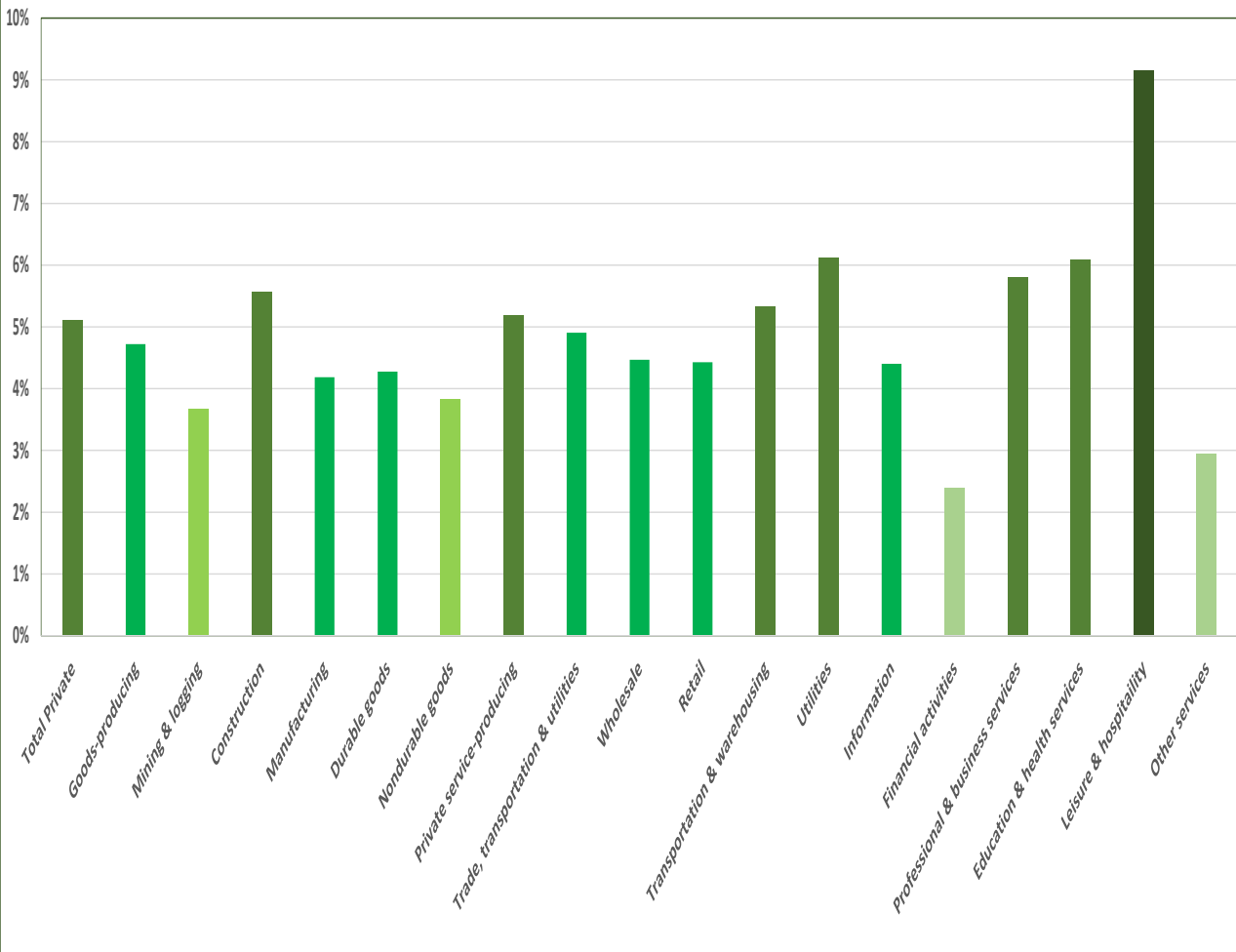


Notes: Blue shaded areas denote recessions. Orange shaded area highlights current economic expansion.
Sources: Bureau of Labor Statistics, National Bureau of Economic Research

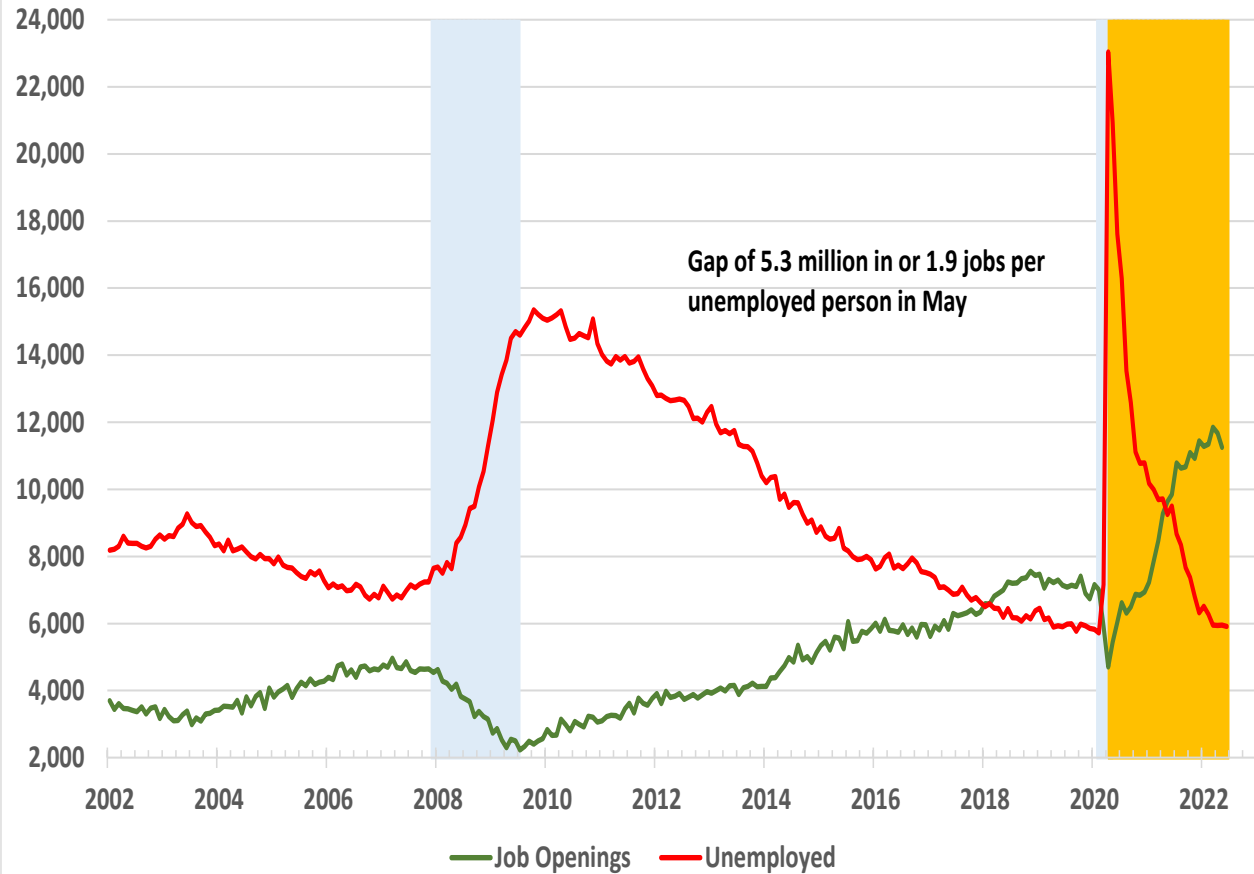


Wage Gains Have Been Solid Across Industries; Demand for Workers Outstripping Supply

Changes in Average Hourly Earnings by Industry Over the Latest 12 Months



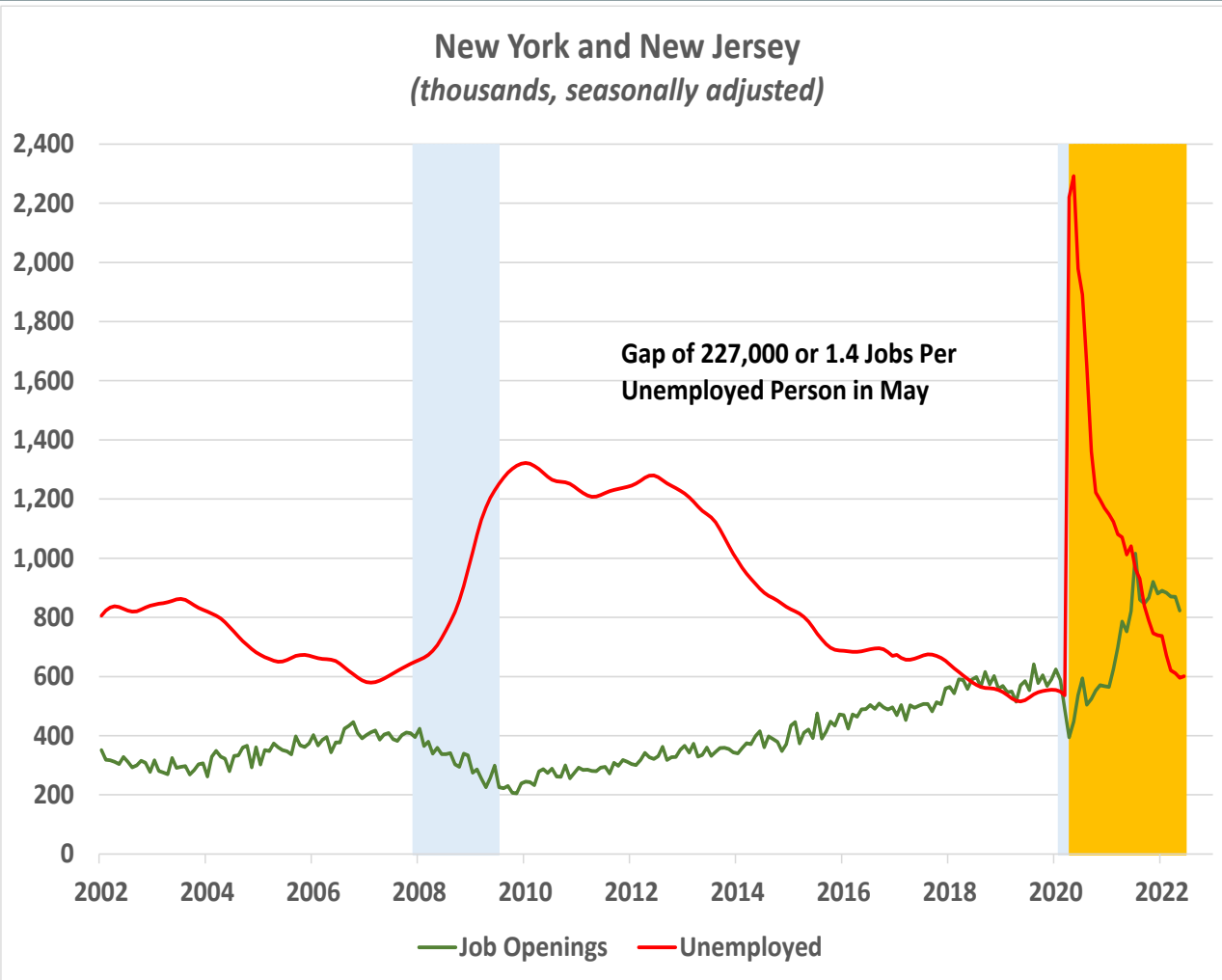
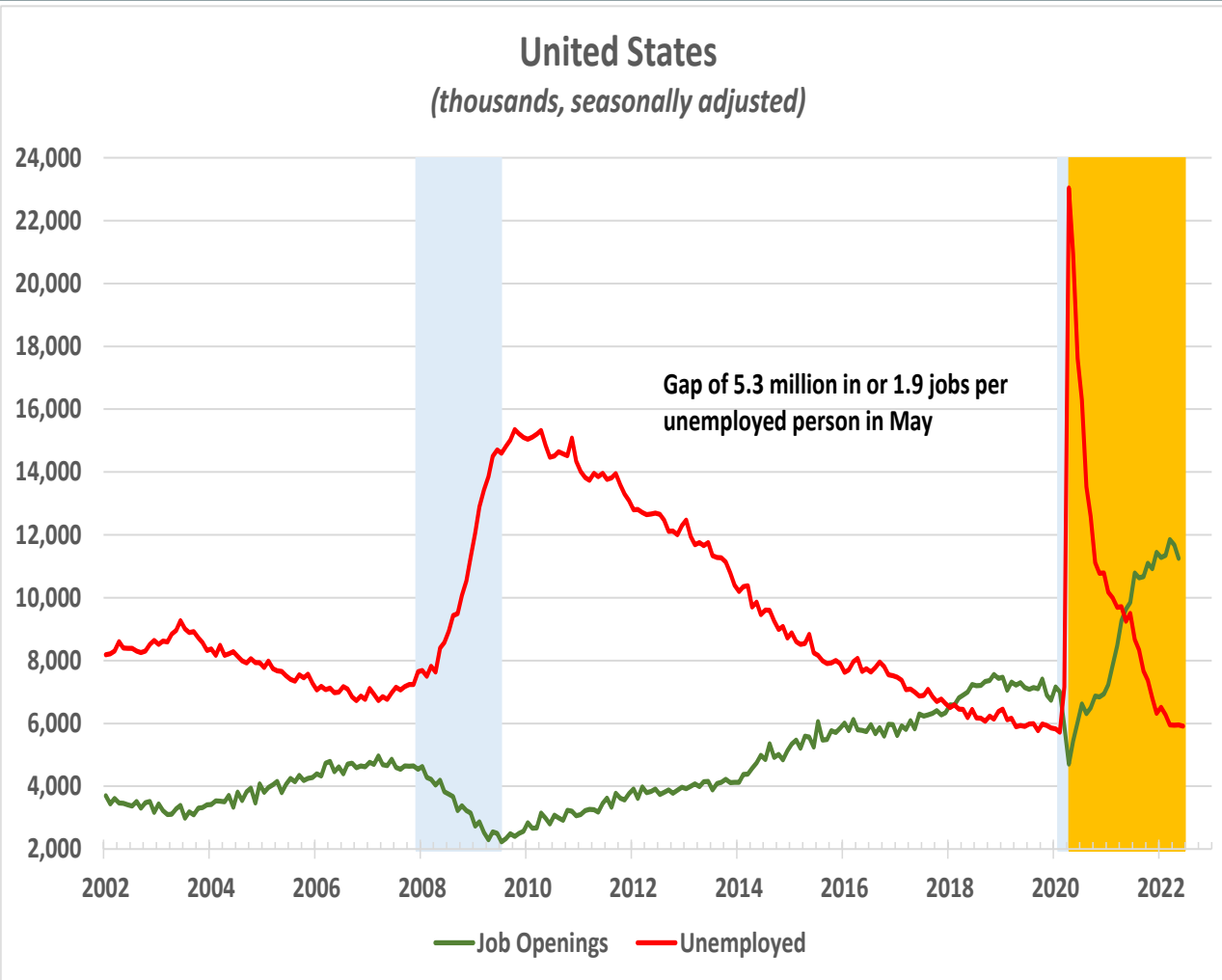
United States
(thousands, seasonally adjusted)



Notes: Blue shaded areas denote recessions. Orange shaded area highlights current economic expansion.
Sources: Bureau of Labor Statistics, National Bureau of Economic Research and FHLBNI estimates



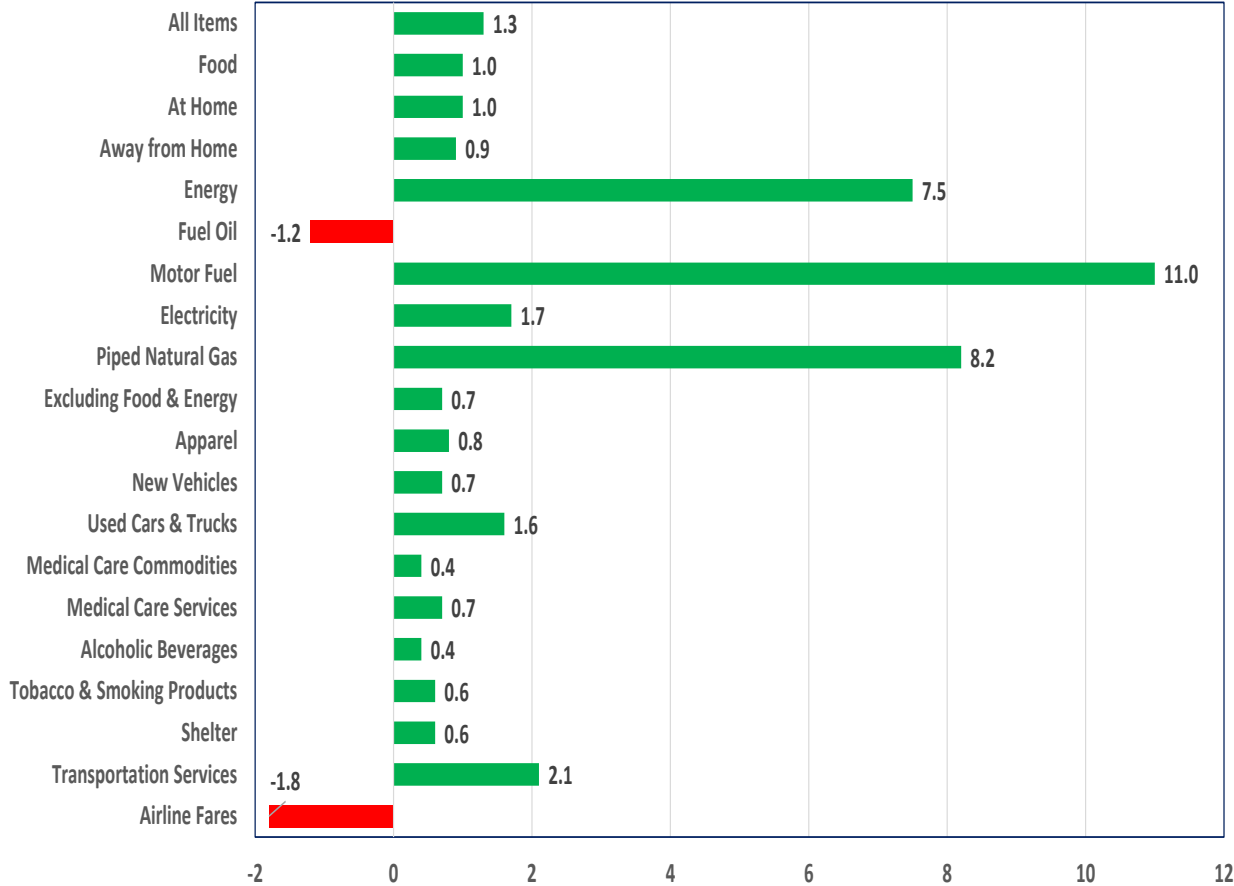
Labor Demand Outstripping Supply Nationally and Within the FHLBNY District



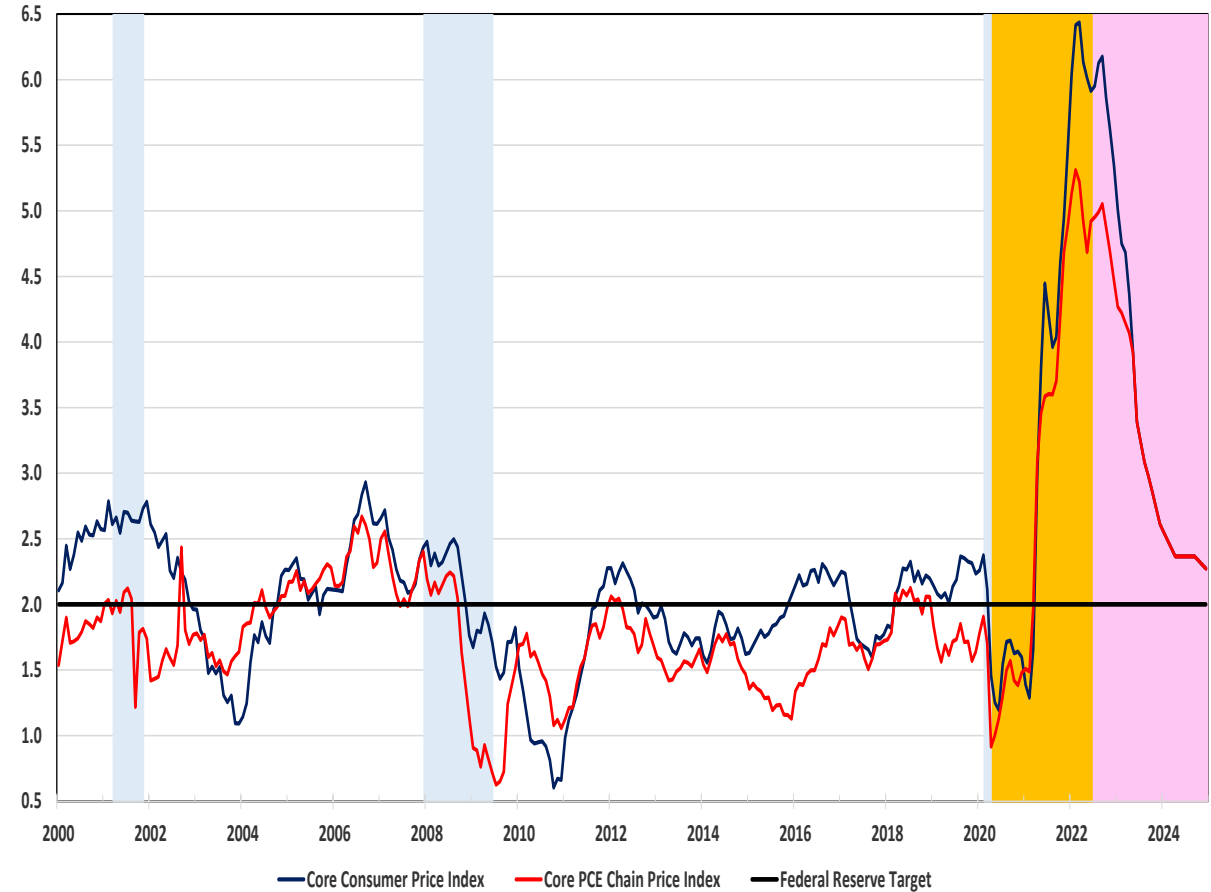
Source: Bureau of Labor Statistics

Consumer Price Increases Were Widespread in June; Core Inflation Gauges to Remain Above Fed Target Through 2024

June Percentage Changes in Consumer Prices

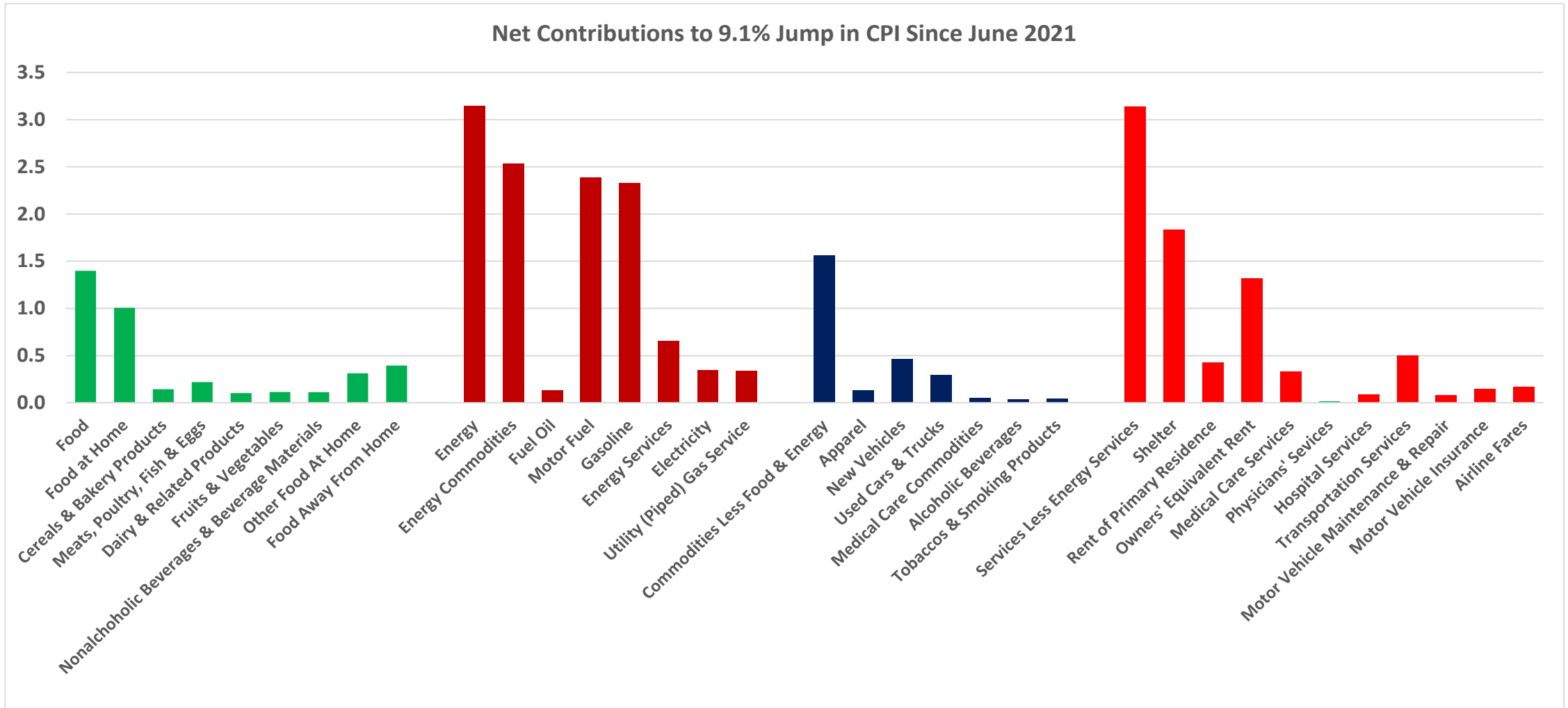


Core Consumer Inflation Measures Excluding Food & Energy
(percentage change from year ago)



Notes: Blue shaded areas denote recessions. Orange shaded area highlights current economic expansion. Pink shaded area represents projections.
Sources: Bureau of Labor Statistics, Bureau of Economic Analysis, Federal Reserve Board, National Bureau of Economic Research and FHLBNY estimates

Acceleration in Consumer Price Inflation Has Been Broadly Based

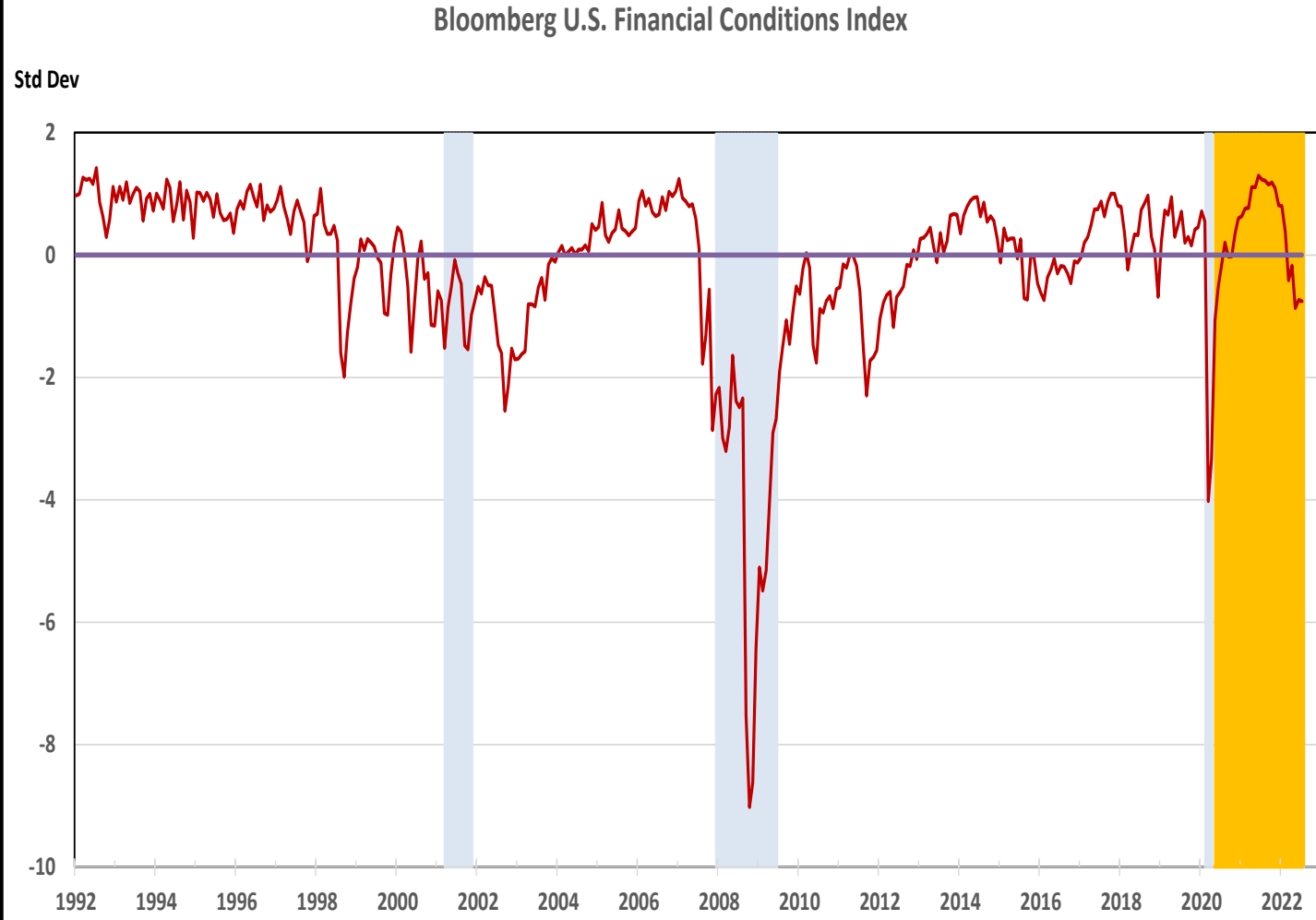


Sources: Bureau of Labor Statistics and FHLBNY estimates



Financial Conditions Have Eased Since Mid-June, But Remain in Restrictive Territory

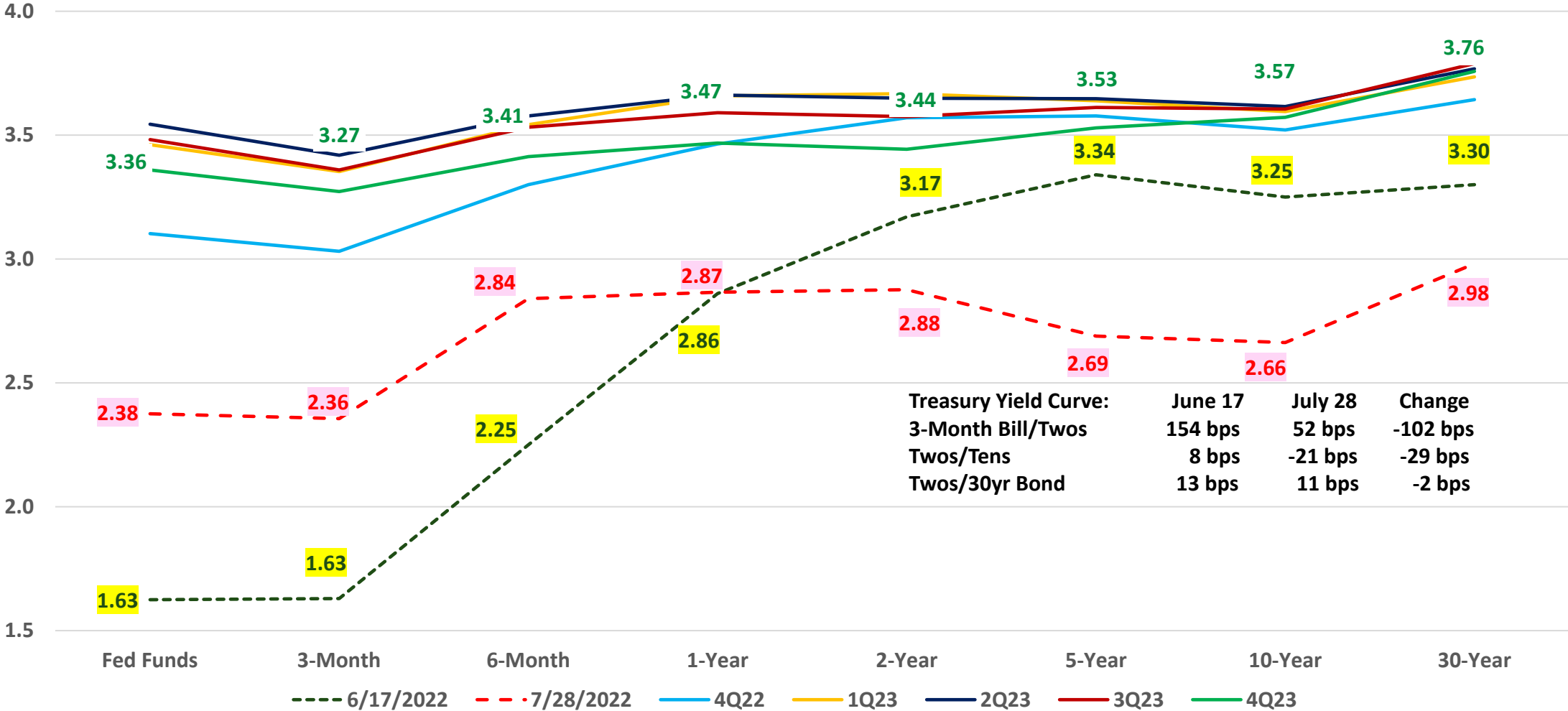
	24-Mar-20	17-Jun-22	28-Jul-22	Change
US Financial Conditions	-6.34	-1.13	-0.64	0.49
Money Market Spreads:				
TED Spread	127.05	53.13	42.95	-10.18
Libor/OIS Spread	112.05	7.39	20.74	13.35
Com Paper/T-Bill Spread	205.64	53.84	41.12	-12.72
Bond Market Spreads:				
Baa/10-Yr Treasury Spread	456.37	190.44	217.11	26.67
High-Yield/10-Yr Treas Spread	11.00	5.02	4.91	-0.11
Muni/10-Yr Spread	235.89	-18.44	-10.07	8.37
Swaption Volatility Index	118.27	128.30	114.60	-13.70
Equity Market:				
S&P 500	2447.33	3674.84	4004.61	329.77
VIX S&P Volatility Index	61.67	31.13	23.33	-7.80



Notes: Blue shaded areas denote recessions. Orange shaded area highlights current economic expansion.
Sources: Bloomberg, National Bureau of Economic Research



Treasury Yield Curve Has Flattened Dramatically in Response to Fed Tightening and Growing Recession Fears

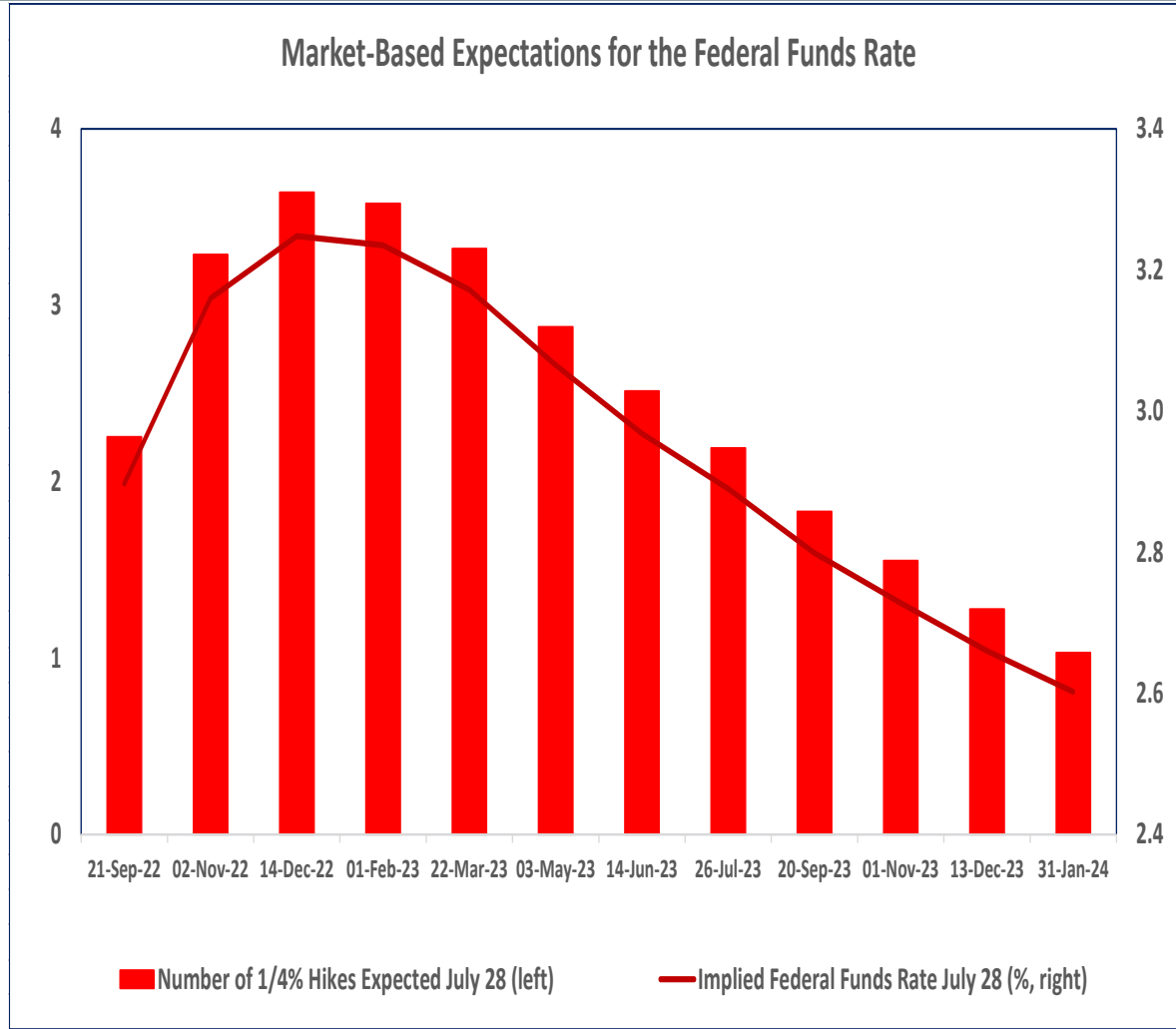
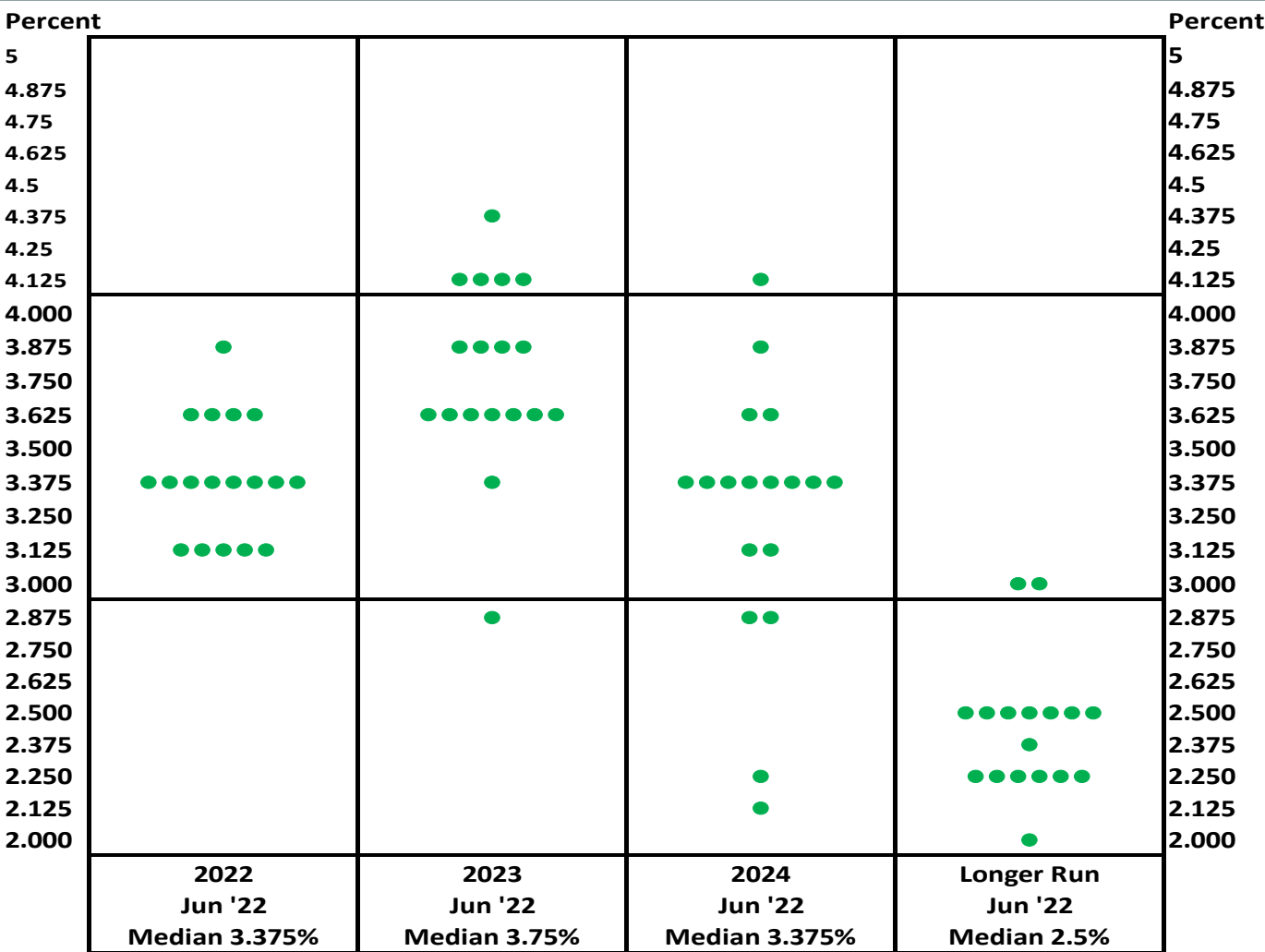


Treasury Yield Curve:	June 17	July 28	Change
3-Month Bill/Twos	154 bps	52 bps	-102 bps
Twos/Tens	8 bps	-21 bps	-29 bps
Twos/30yr Bond	13 bps	11 bps	-2 bps



Sources: Bloomberg, Blue Chip Consensus

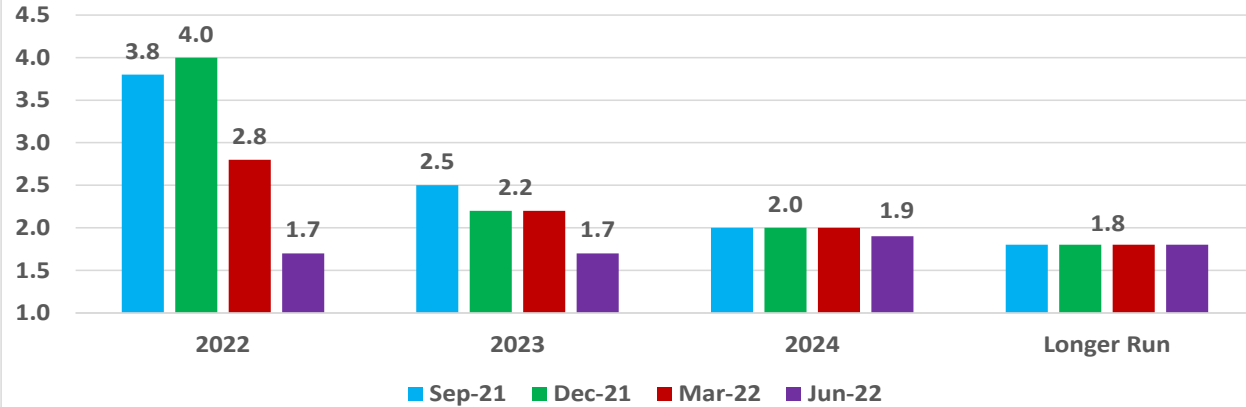
In Contrast to Fed Officials, Market Participants Expect the Federal Funds Rate to Peak in December



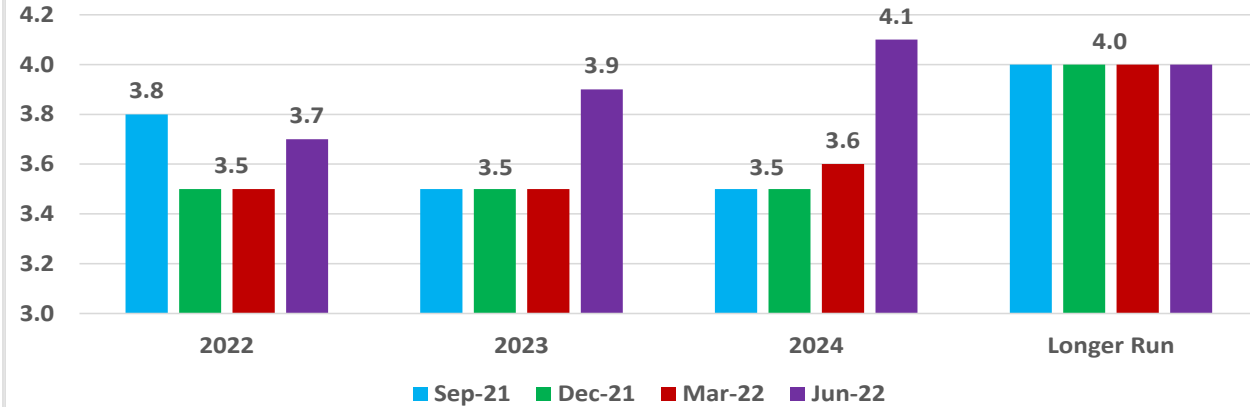
Sources: Federal Reserve Board, Bloomberg

Federal Reserve Officials Pared Growth, Boosted Inflation Forecasts at the March FOMC Meeting

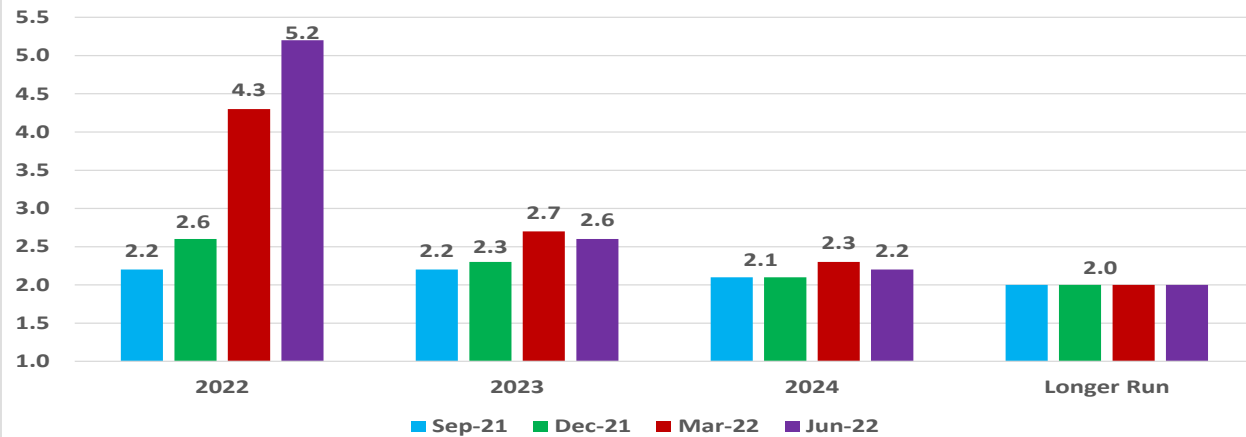
Real GDP Growth
(percentage change Q4/Q4)



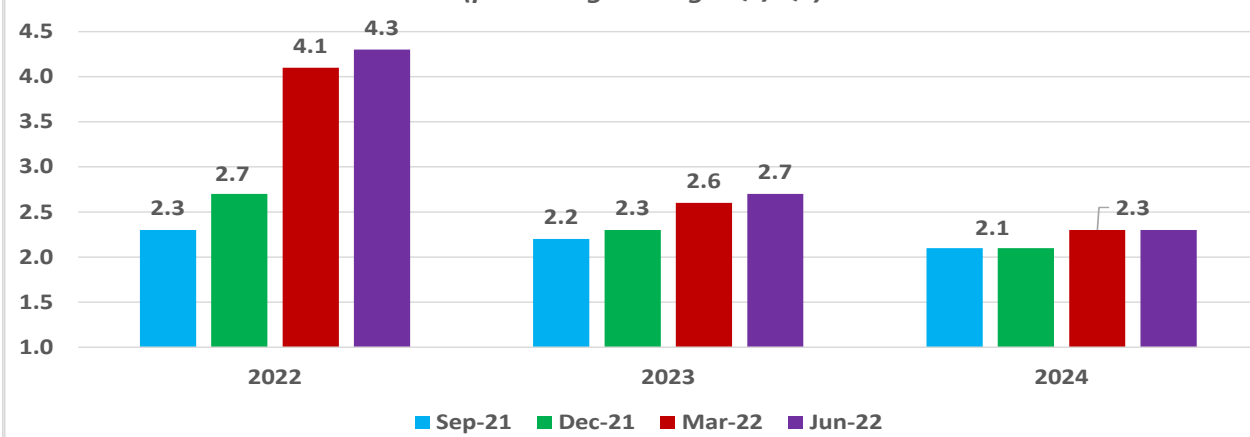
Unemployment Rate
(average level in Q4 of initiated year)



PCE Inflation
(percentage change Q4/Q4)

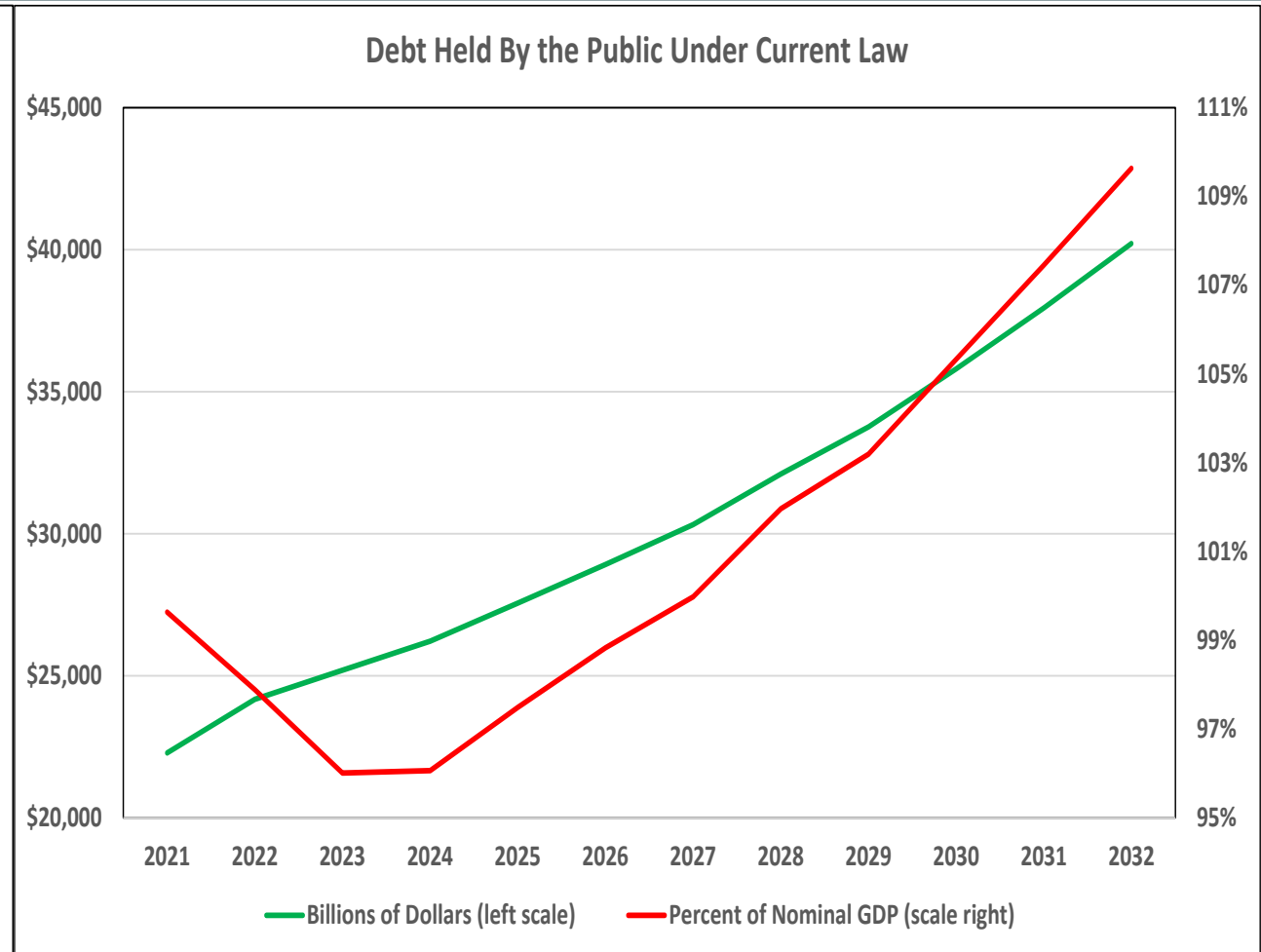
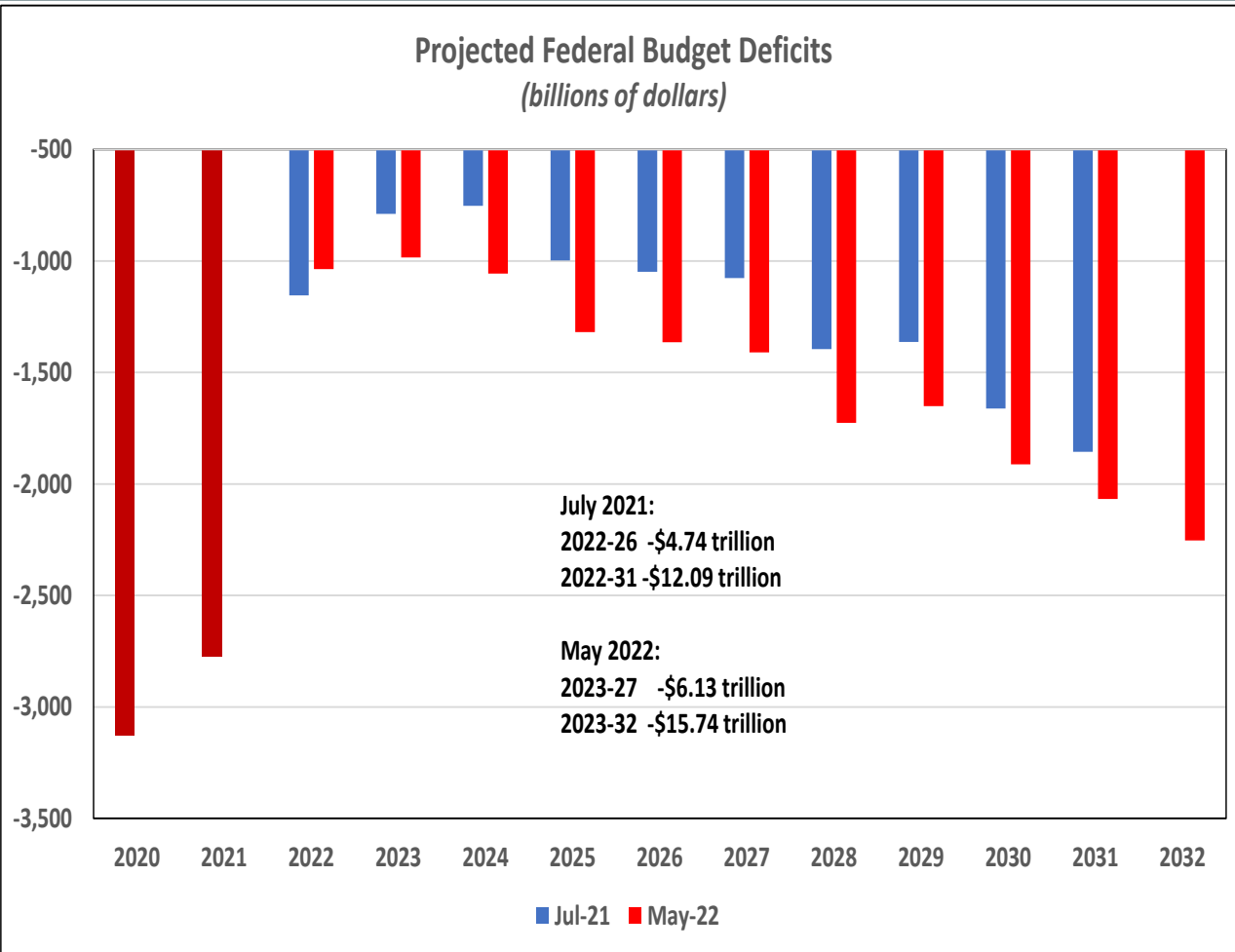


Core PCE Inflation
(percentage change Q4/Q4)



Source: Board of Governors of the Federal Reserve System

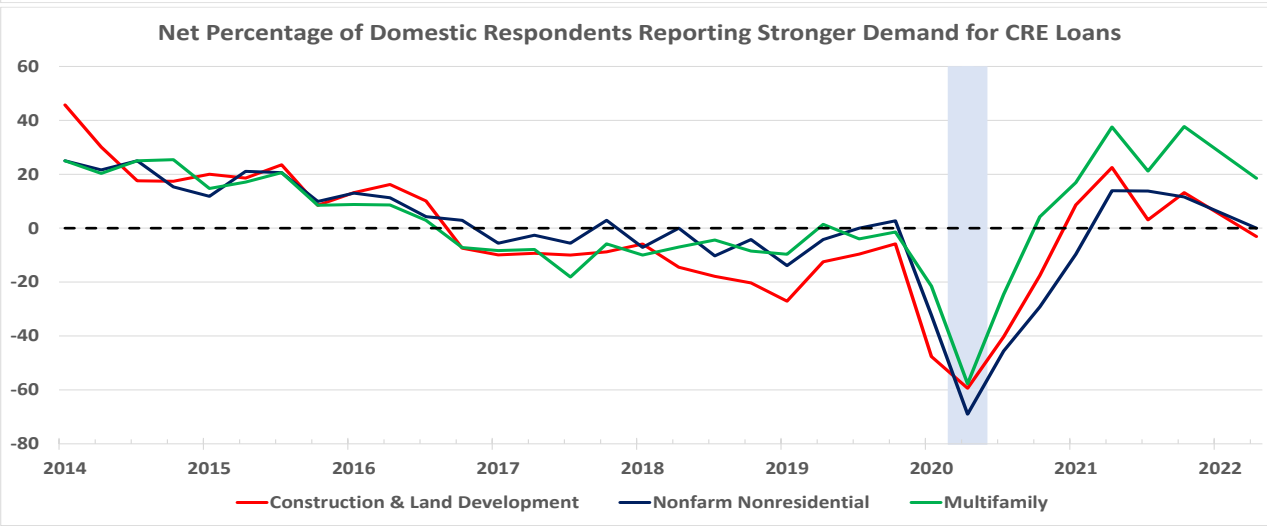
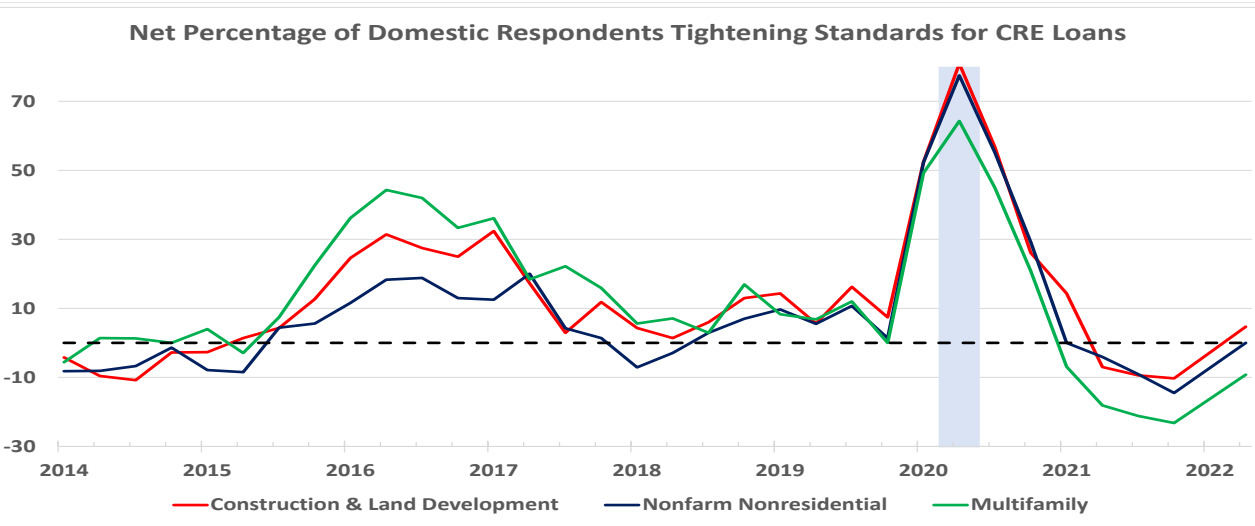
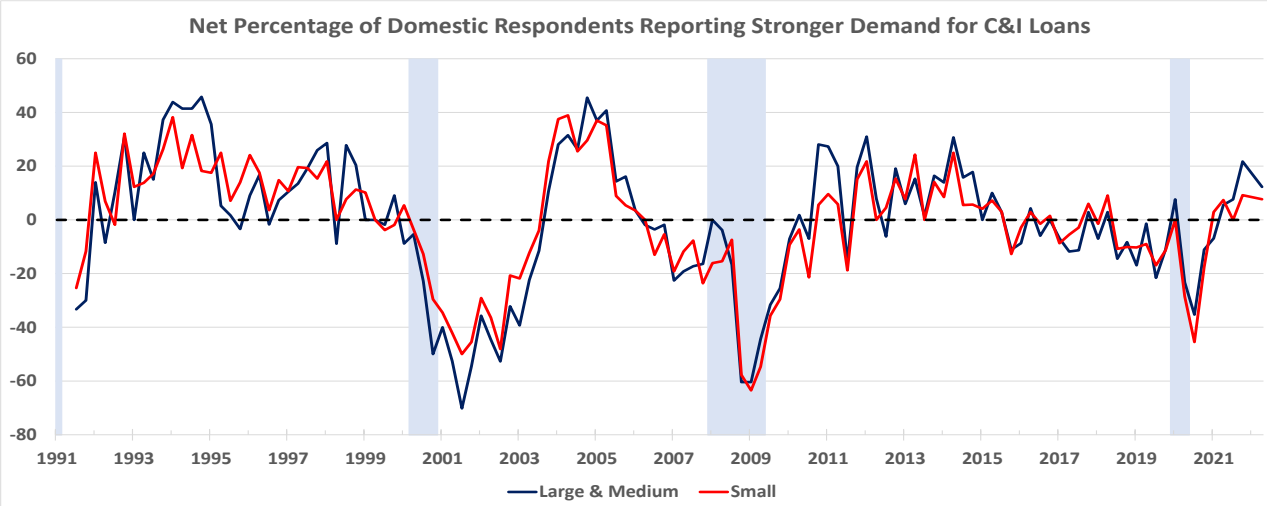
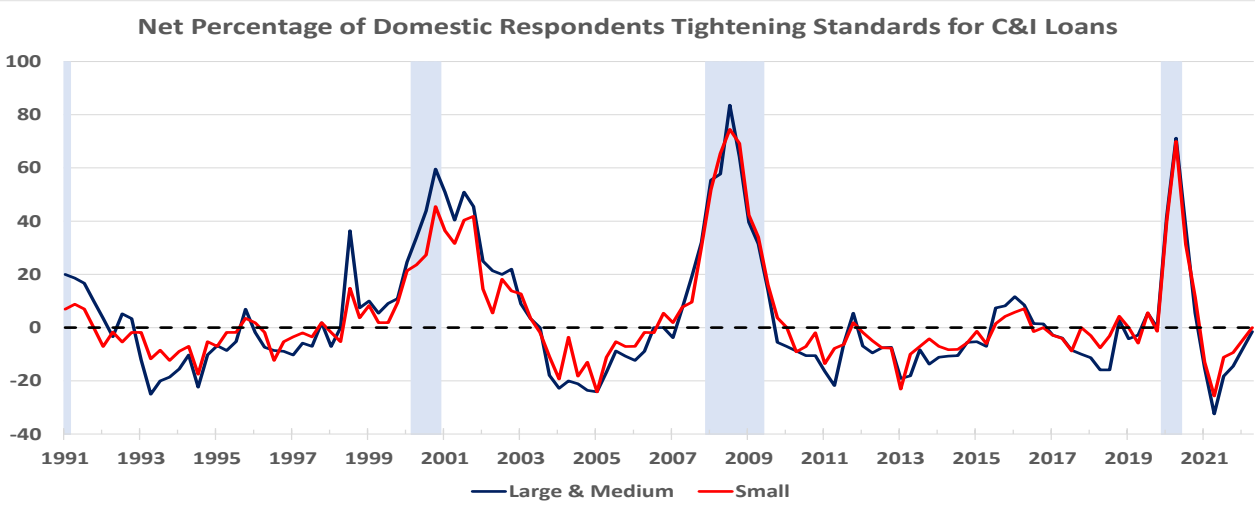
Massive Federal Deficits Will Require Sizable Increases in Treasury Debt Issuance



Source: Congressional Budget Office



Bank Lending Standards for C&I and CRE Loans Little Changed Amid Generally Stronger Demand

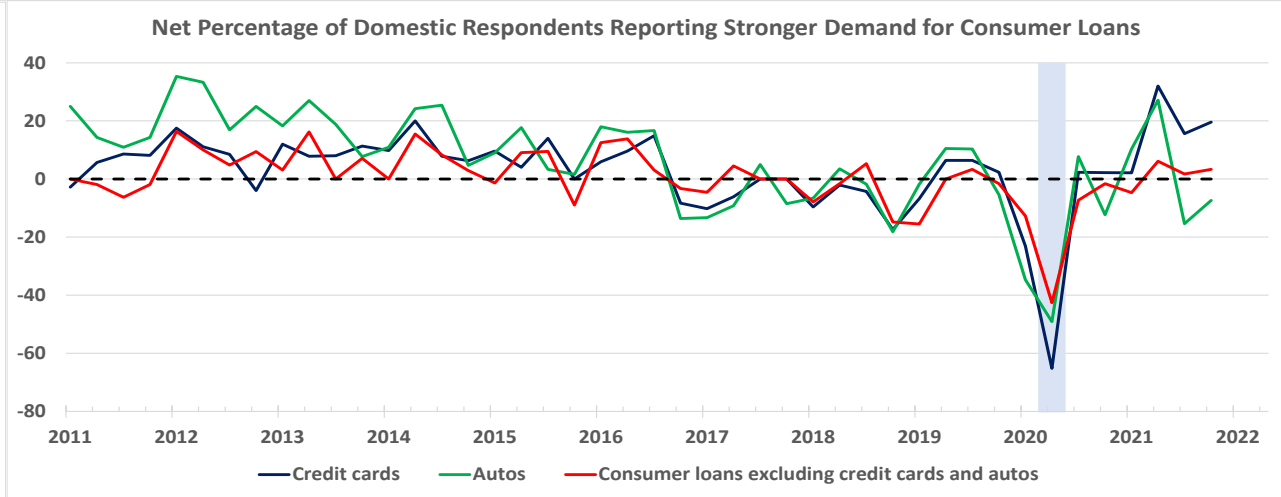
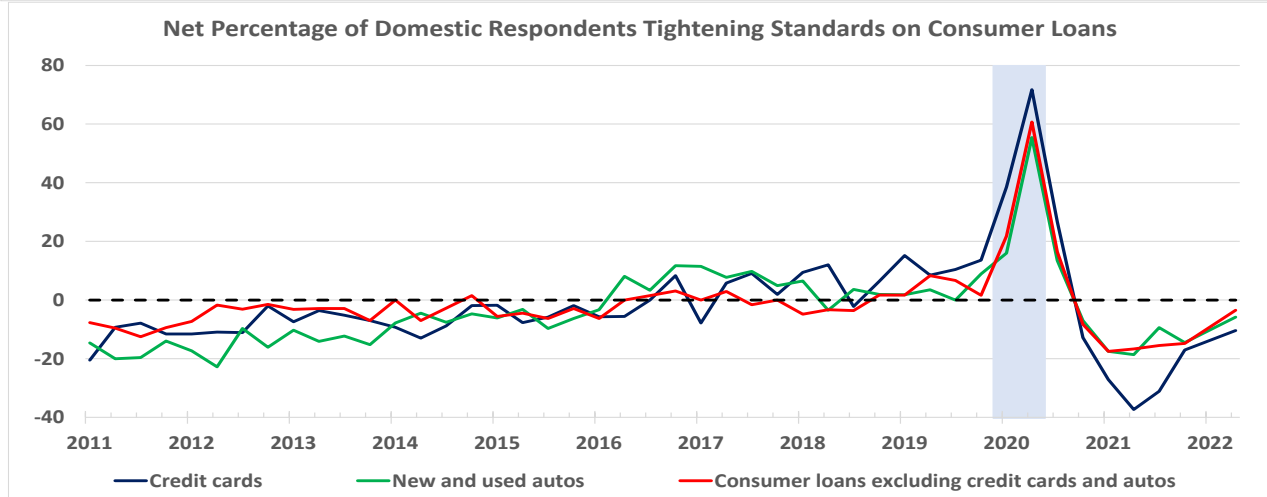
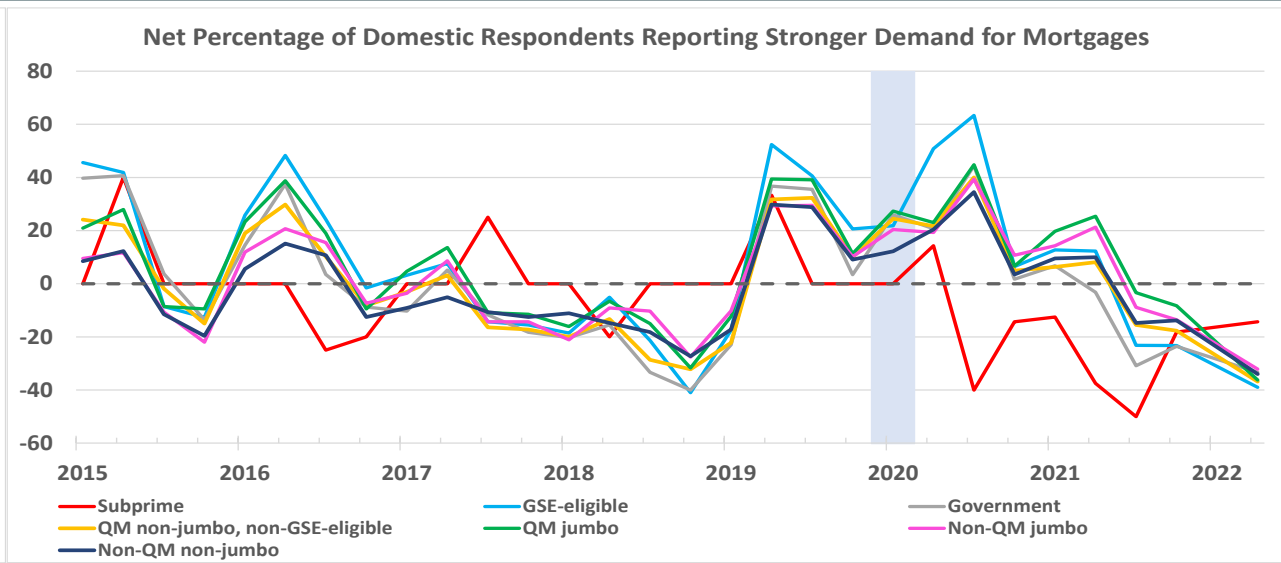
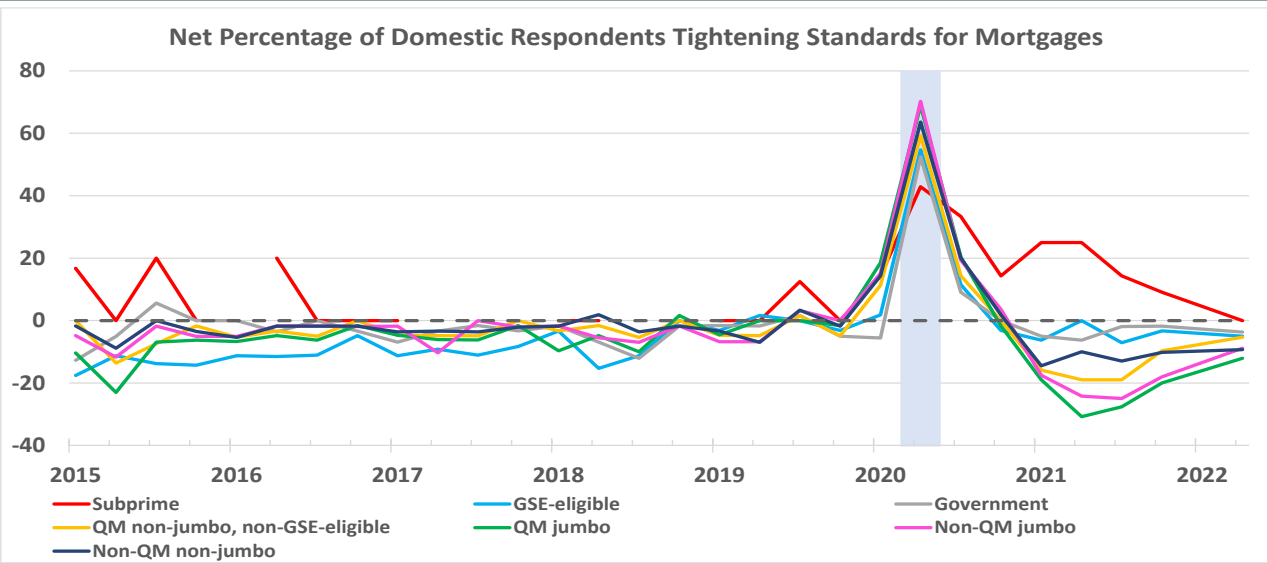


Note: Shaded areas denote recessions.

Sources: Federal Reserve Board and National Bureau of Economic Research



Banks Easing Lending Standards for Mortgage & Consumer Loans Amid Mixed Demand



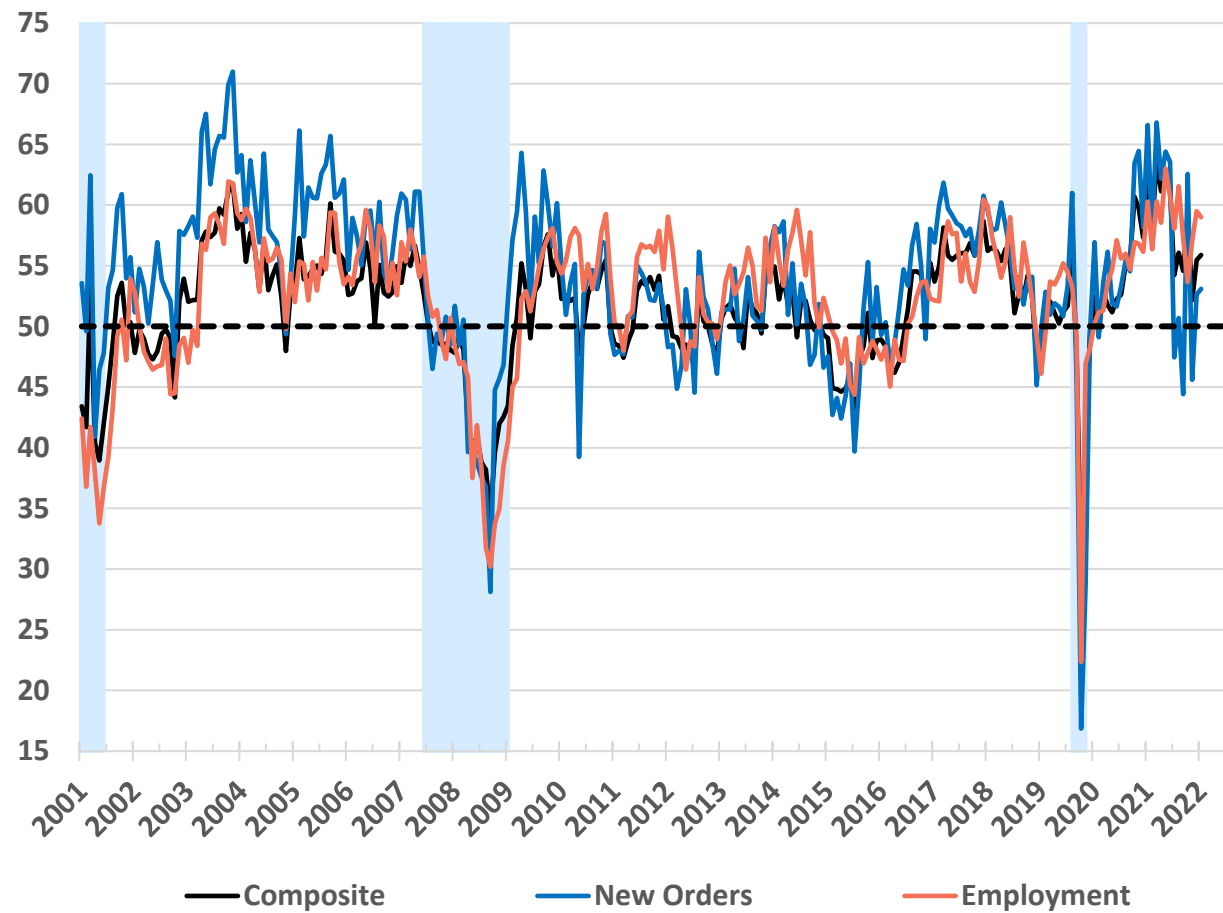
Note: Shaded areas denote recession.

Source: Federal Reserve Board and National Bureau of Economic Research

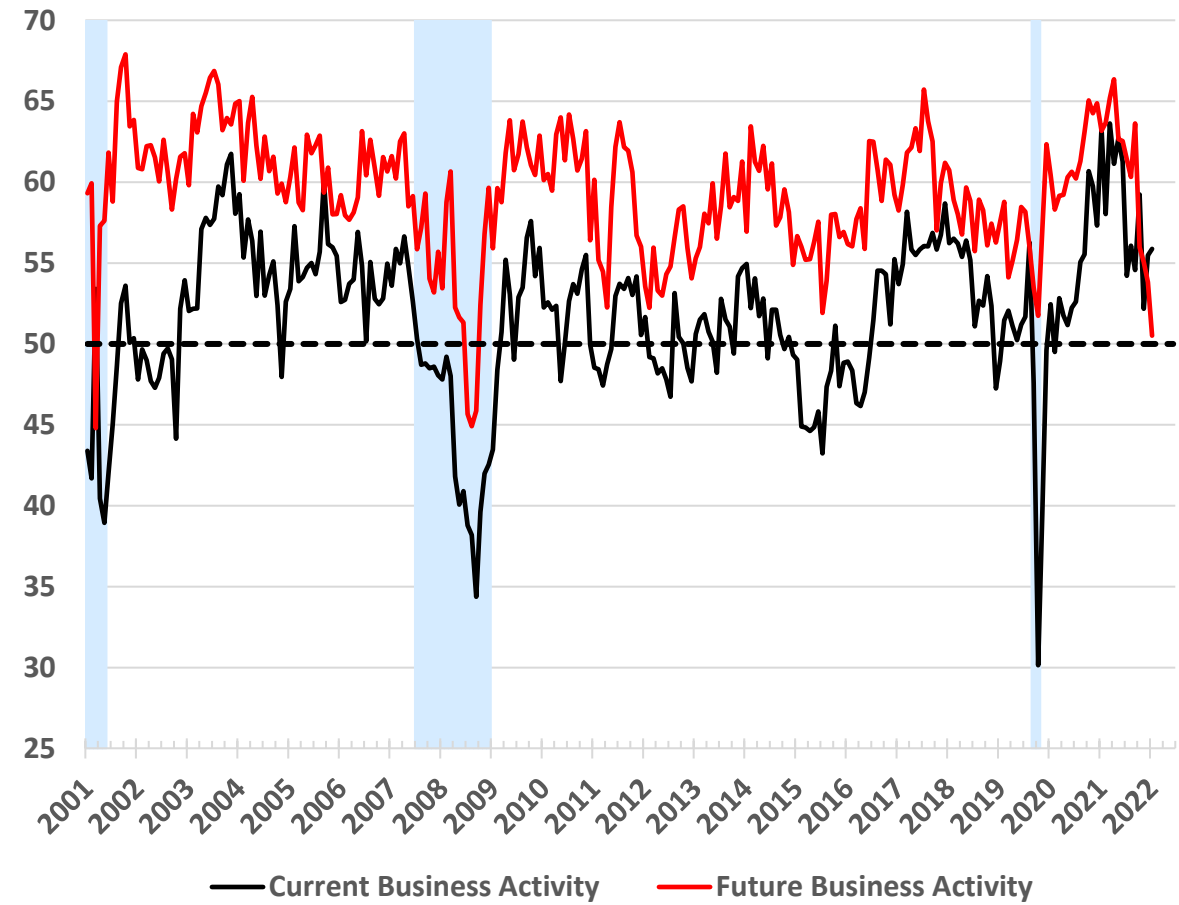


N.Y. State Factory Activity Improved in July, But Firms Are Less Optimistic About the Future

Empire State Manufacturing Survey
(diffusion indexes, 50 = no change from prior month)



Empire State Manufacturing Composite Indexes
(diffusion indexes, 50 = no change from prior month)

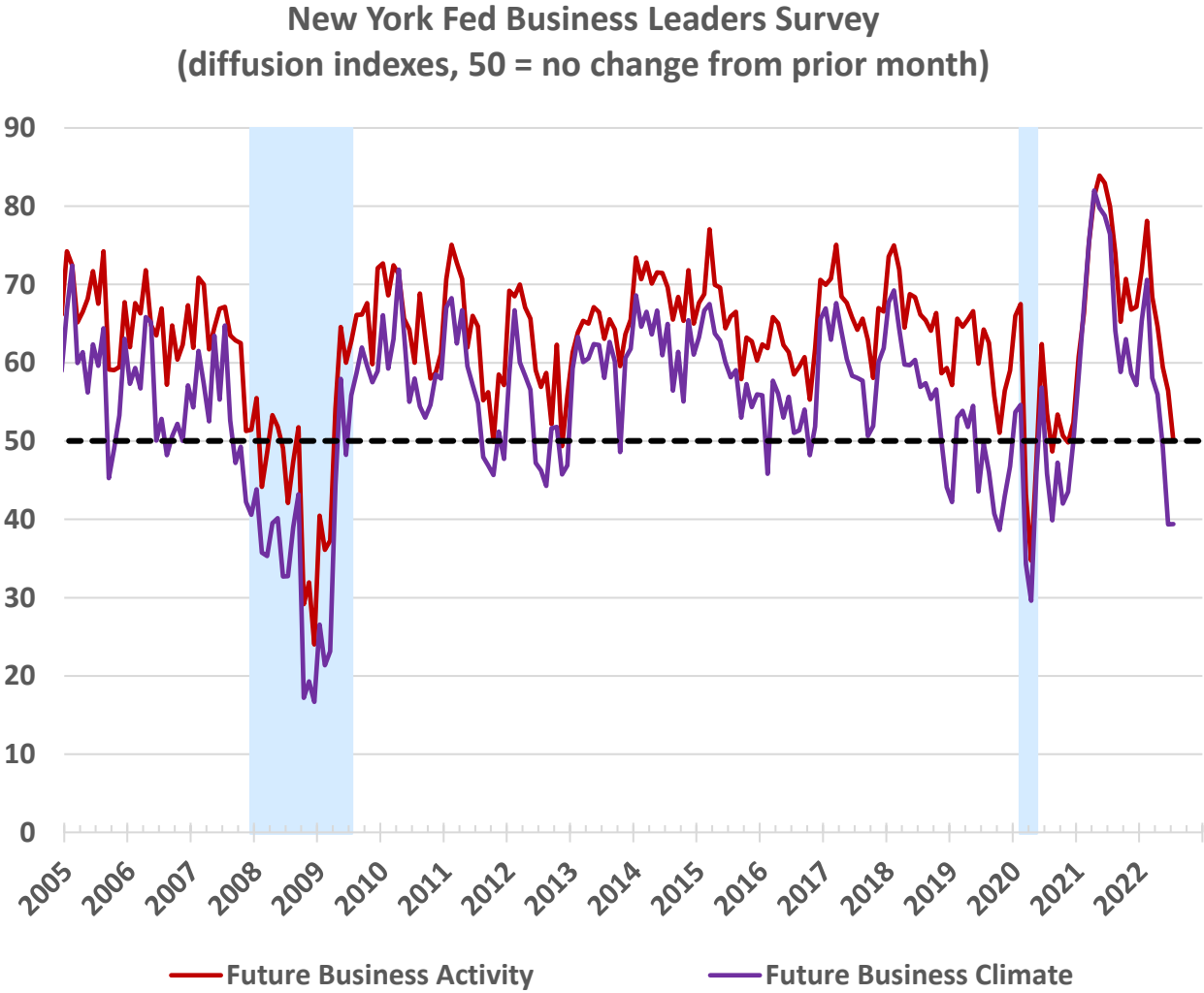
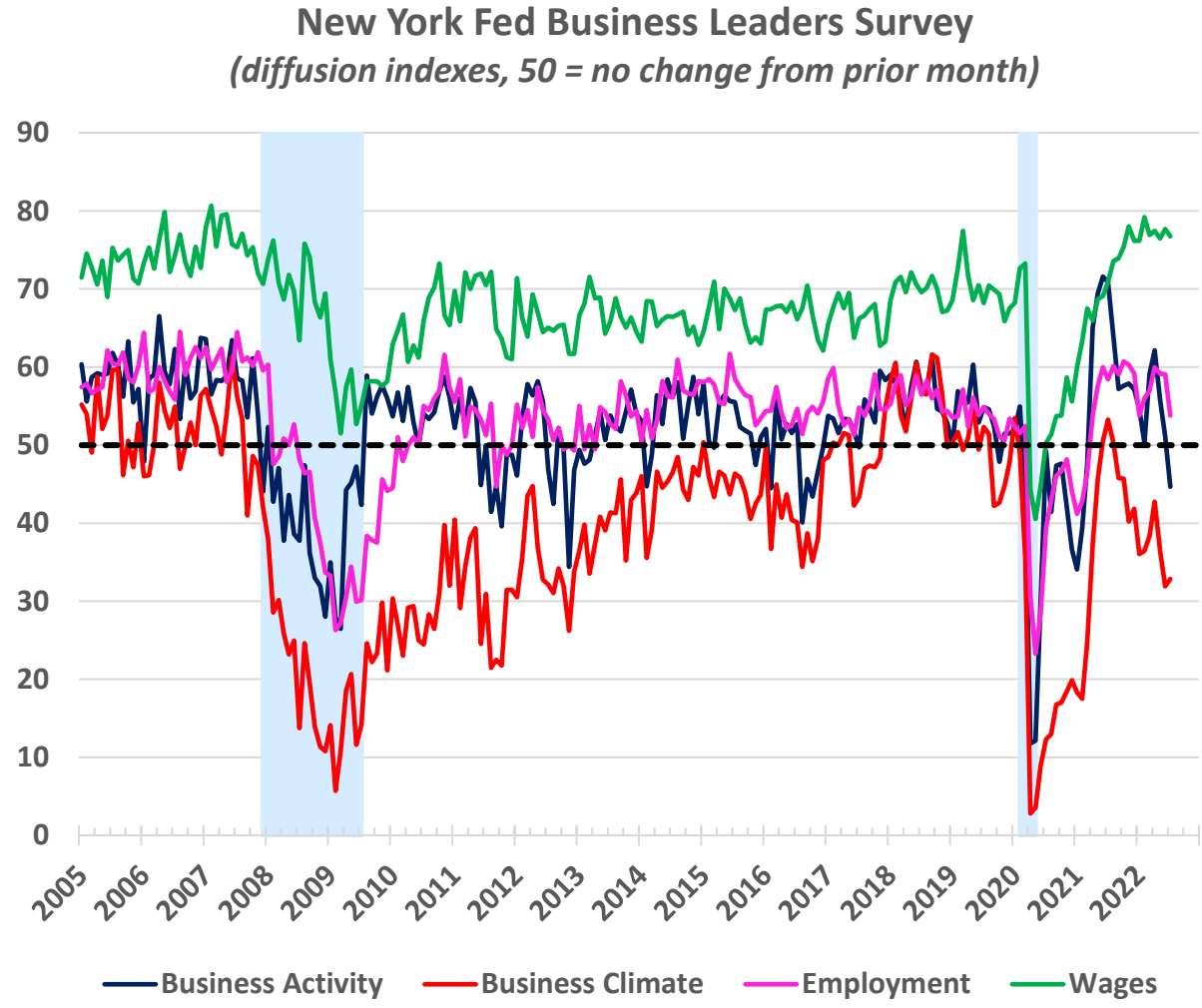


Note: Shaded areas denote recessions.

Sources: Federal Reserve Bank of New York and FHLBNY estimates



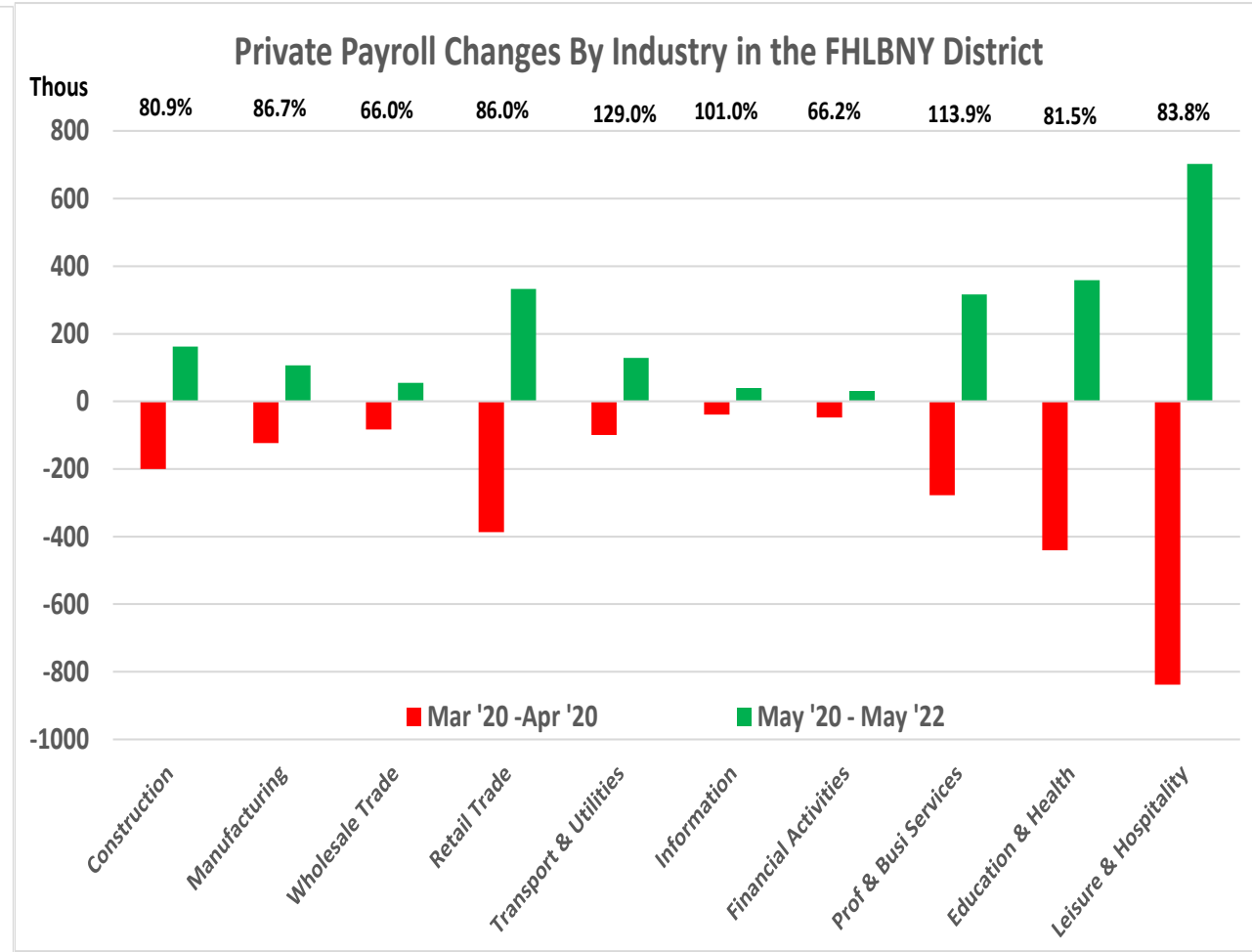
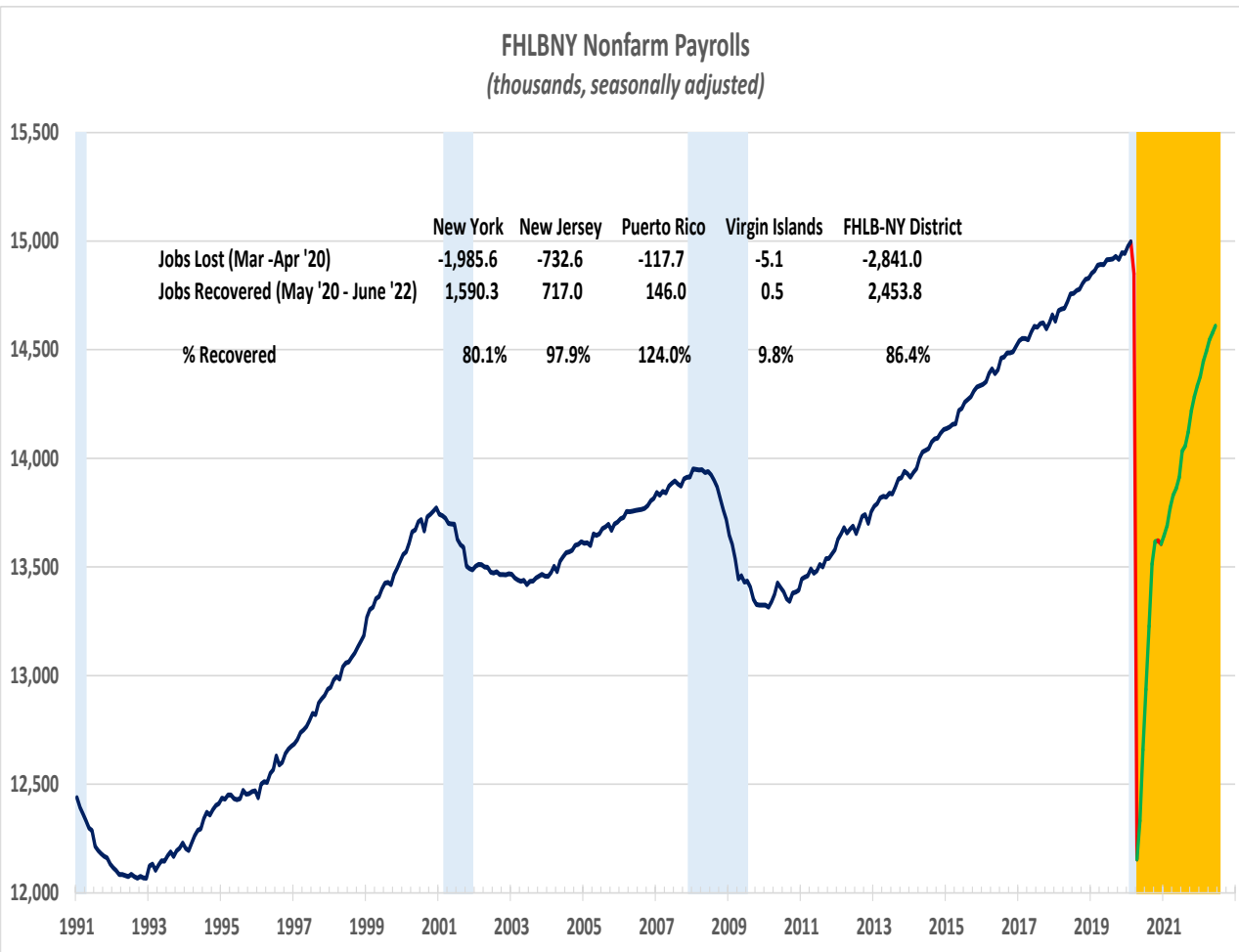
Local Service-Producing Activity Contracted in Early July, Firms Less Optimistic About the Future



Note: Shaded areas denote recession.
Sources: Federal Reserve Bank of New York and FHLBNY estimates



FHLBNY District Has Added Jobs Since April 2020, But Payrolls Remain Well Below Pre-Pandemic Levels



Notes: Blue shaded areas denote recessions. Orange area highlights current economic expansion.

Sources: Bureau of Labor Statistics and National Bureau of Economic Research



Jobs Recoveries Have Varied Widely Across the FHLB NY District

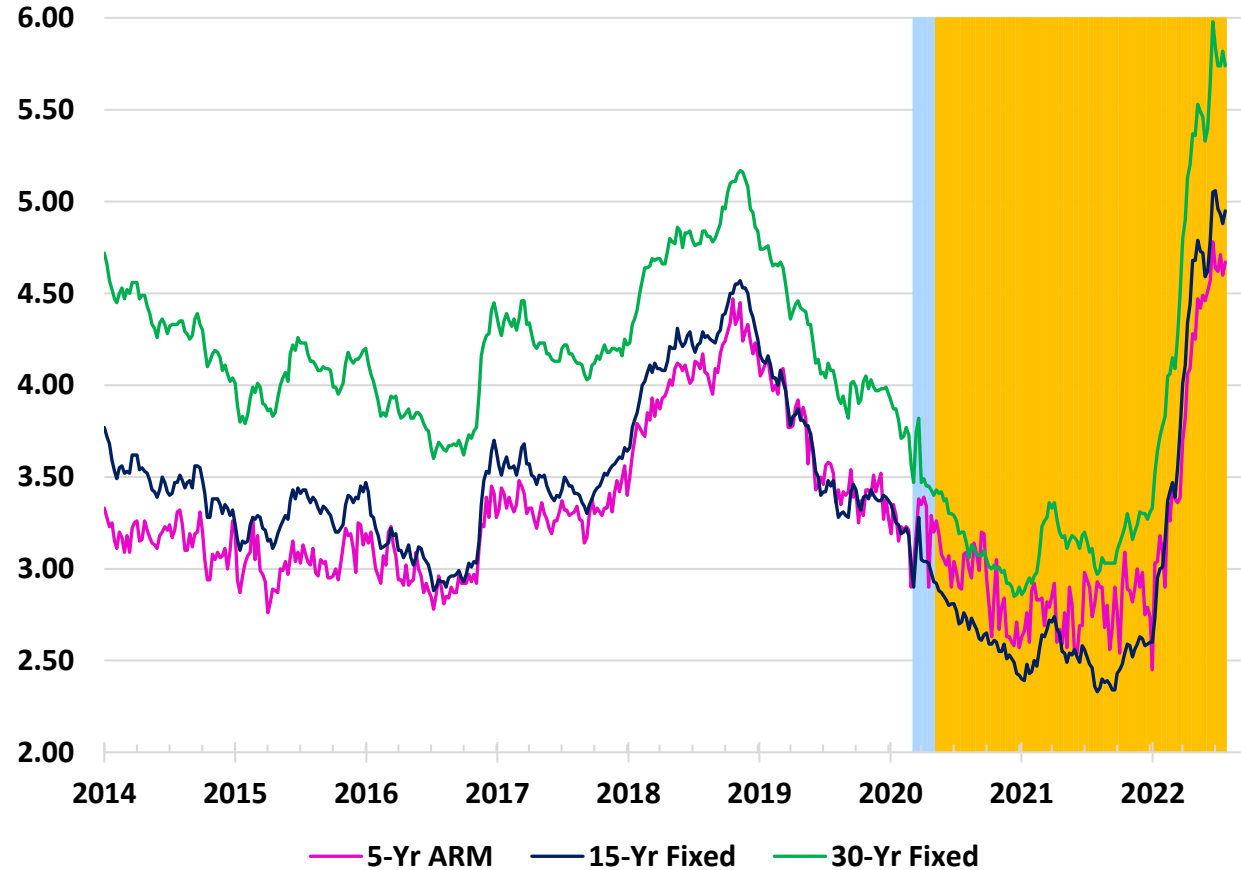
	Jobs Lost (thous)	Jobs Recovered (thous)	Percent		Jobs Lost (thous)	Jobs Recovered (thous)	Percent
United States	-21,991	21,467	97.6%	New Jersey	-732.6	717.0	97.9%
FHLB NY District	-2,841	2,454	86.4%	Atlantic City-Hammonton, NJ	-44.9	46.6	103.8%
				Camden, NJ Metropolitan Division	-86.1	102.6	119.2%
				Newark, NJ-PA Metropolitan Division	-206.7	191.5	92.6%
New York State	-1985.6	1590.3	80.1%	Ocean City, NJ	-10	10.3	103.0%
Albany-Schenectady-Troy, NY	-74.9	59.1	78.9%	Trenton, NJ	-32	25.3	79.1%
Binghamton, NY	-19.2	14.5	75.5%	Vineland-Bridgeton, NJ	-8	7.4	92.5%
Buffalo-Cheektowaga-Niagara Falls, NY	-124.0	96.0	77.4%	Bergen-Hudson-Passaic, NJ	-173.4	150.4	86.7%
Dutchess County-Putnam County, NY Metropolitan Division	-29.7	20.9	70.4%	Middlesex-Monmouth-Ocean, NJ	-169.1	167.7	99.2%
Elmira, NY	-6.8	4.0	58.8%				
Glens Falls, NY	-10.0	7.5	75.0%				
Ithaca, NY	-10.3	6.8	66.0%	Puerto Rico	-117.7	146.0	124.0%
Kingston, NY	-13.6	10.2	75.0%	Aguadilla-Isabela	-8.0	9.5	118.8%
Nassau County-Suffolk County, NY Metropolitan Division	-322.7	274.0	84.9%	Arecibo	-5.7	6.3	110.5%
New York-Jersey City-White Plains, NY-NJ Metropolitan Division	-1471.9	1200.3	81.5%	Guayama	-1.3	1.8	138.5%
New York-Newark-Jersey City, NY-NJ-PA	-2044.3	1689.5	82.6%	Mayaguez	-4.6	5.5	119.6%
Rochester, NY	-95.1	71.6	75.3%	Ponce	-9.7	13.7	141.2%
Syracuse, NY	-55.5	44.0	79.3%	San German	-2.5	3.8	152.0%
Utica-Rome, NY	-22.5	15.6	69.3%	San Juan-Carolina-Caguas	-84.4	101.5	120.3%
Watertown-Fort Drum, NY	-7.2	6.7	93.1%				
New York City, NY	-971.8	766.0	78.8%	Virgin Islands	-5.1	0.5	9.8%
Orange-Rockland-Westchester, NY	-165.3	124.2	75.1%				



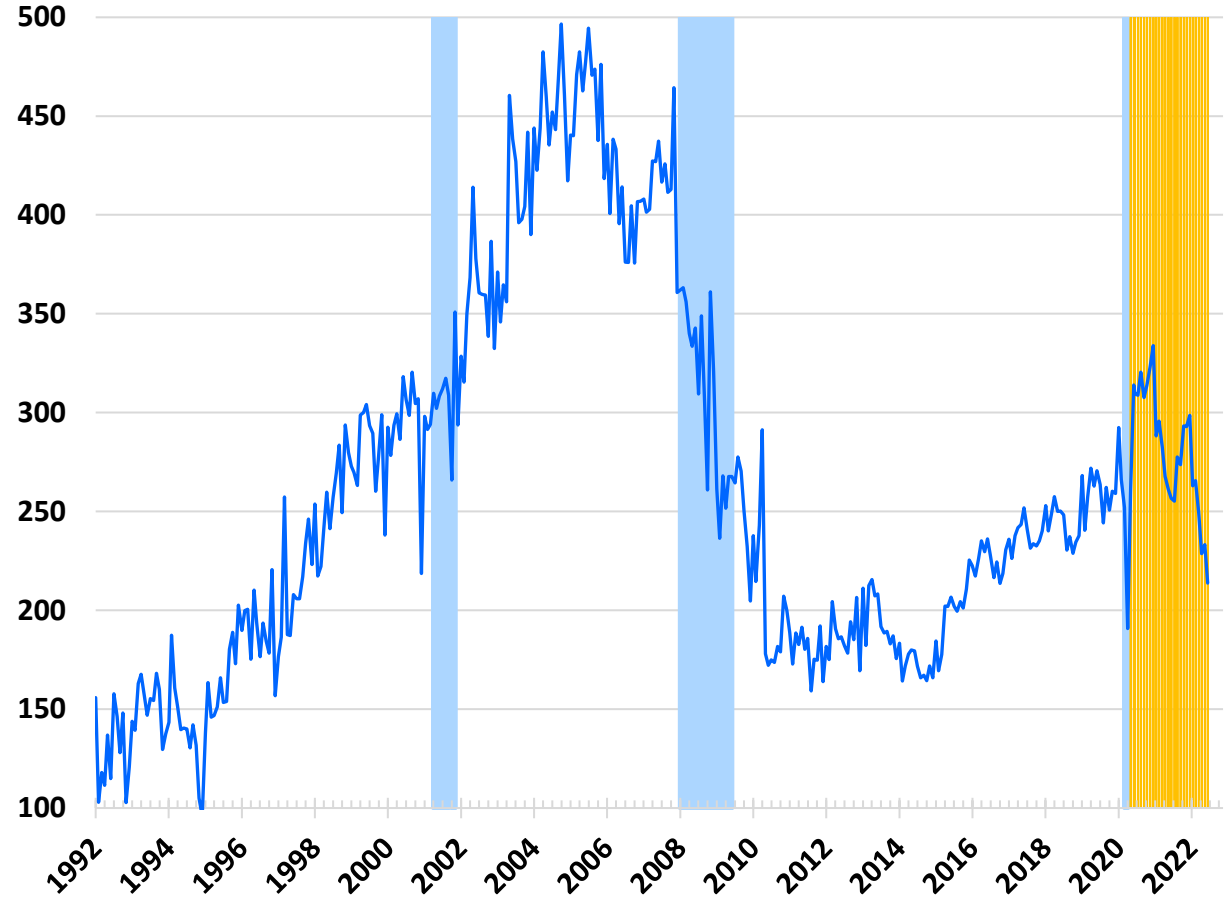
Source: Bureau of Labor Statistics

Dramatic Increases in Mortgage Interest Rates, Limited Inventory Weighing on Home-Purchase Applications

Mortgage Interest Rates



Home-Purchase Mortgage Applications

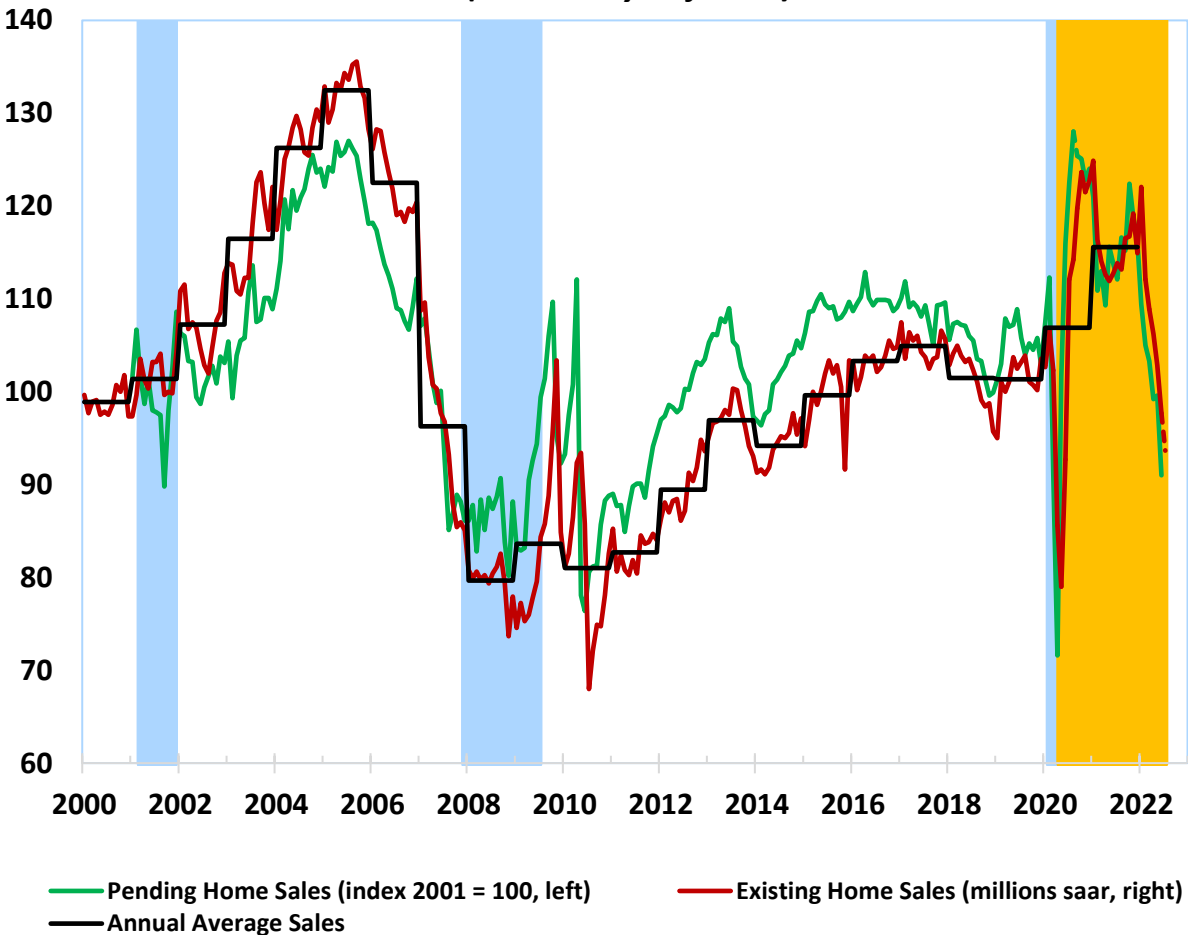


Notes: Blue shaded areas denote recessions. Orange shaded areas highlight current economic expansion.
Sources: Mortgage Bankers Association, National Bureau of Economic Research

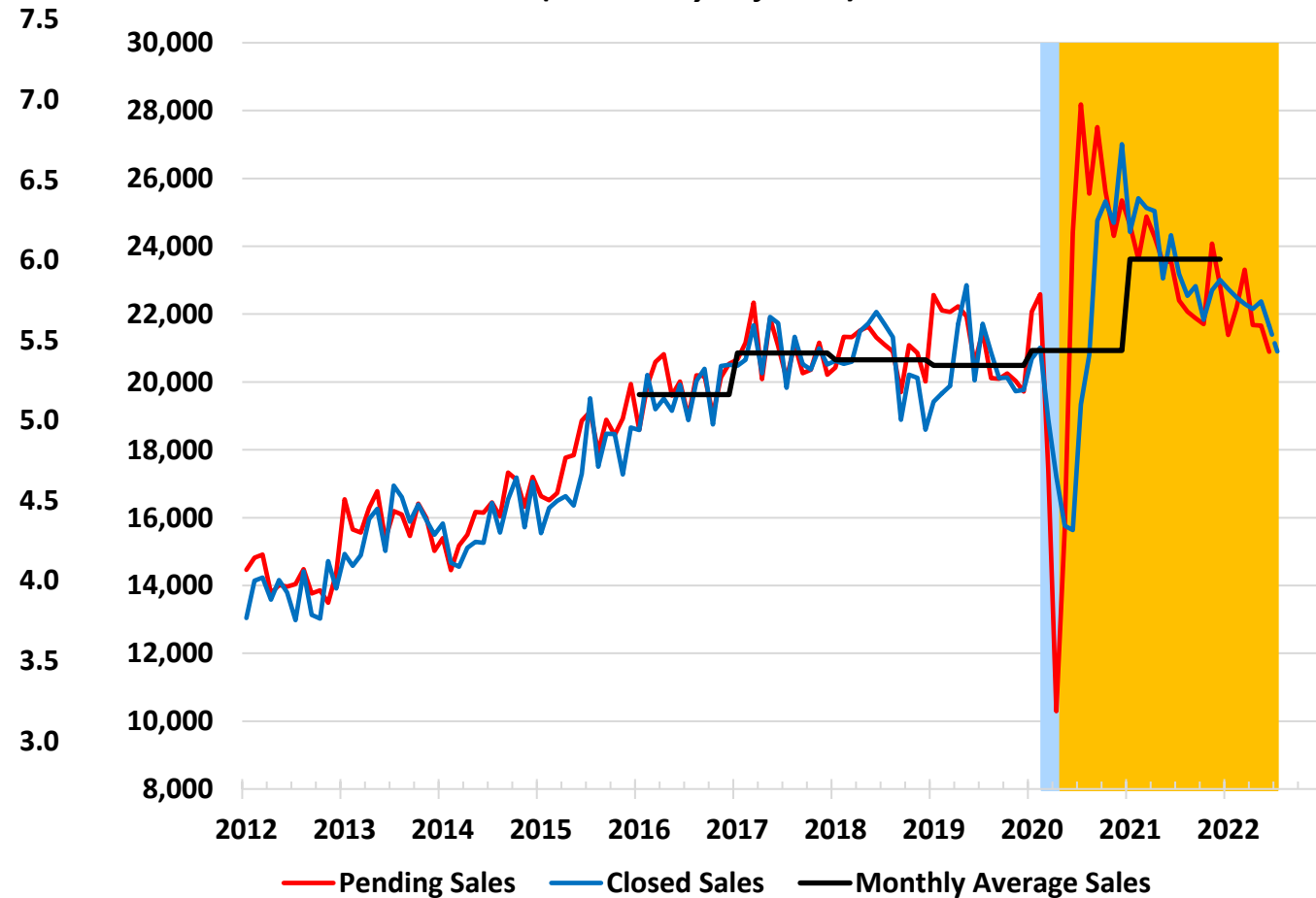


Falloffs in Home-Contract Signings Point to Fewer Closings Both Nationally and in the FHLBNY District

U.S. Pending and Existing Home Sales
(seasonally adjusted)



Pending and Closed Home Sales in New York & New Jersey
(seasonally adjusted)

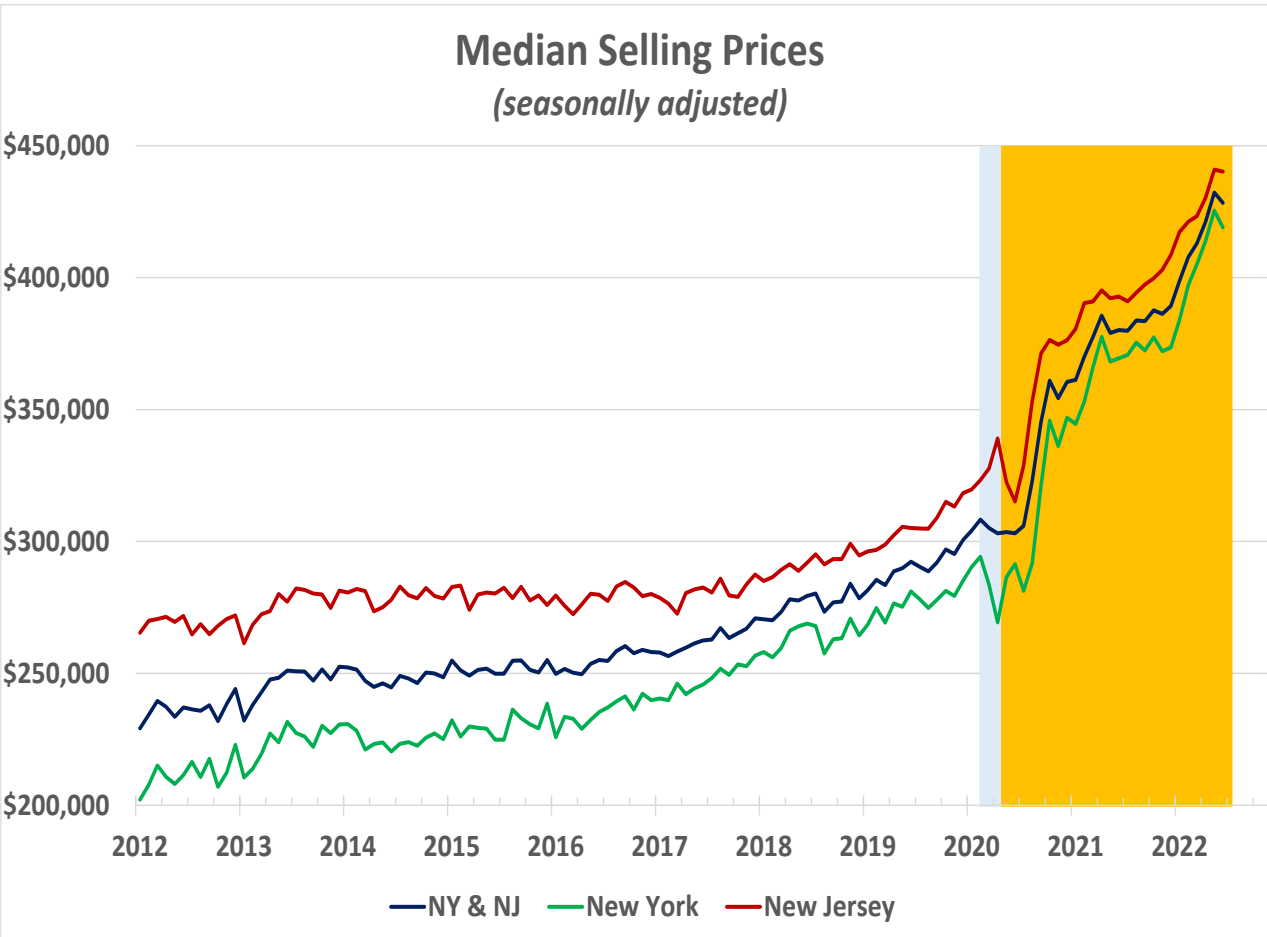
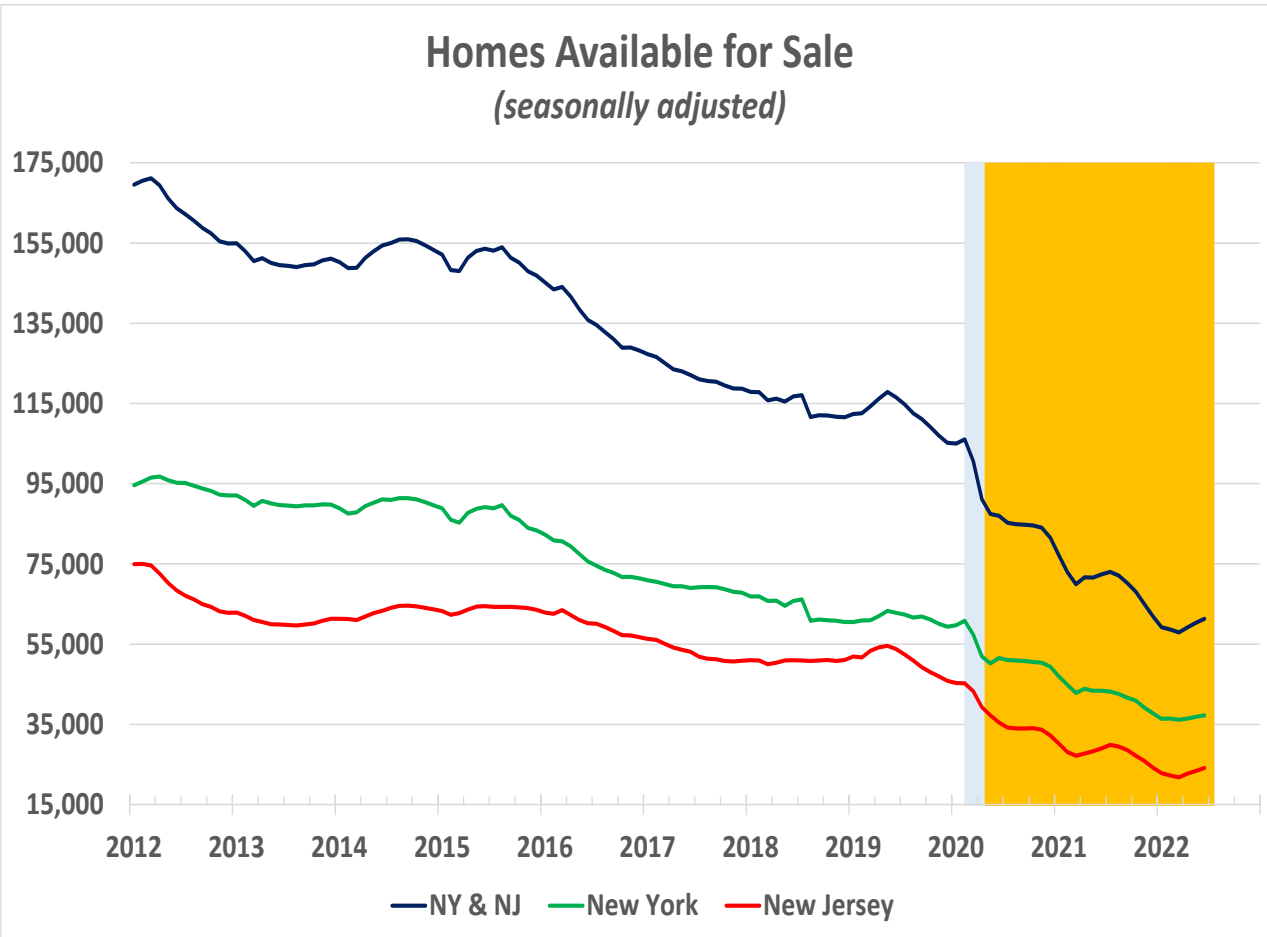


Notes: Blue shaded areas denote recessions. Orange shaded areas highlight current economic expansion.

Sources: National Association of Realtors, National Bureau of Economic Research, NYSAR, NJ Realtors, and FHLBNY estimates



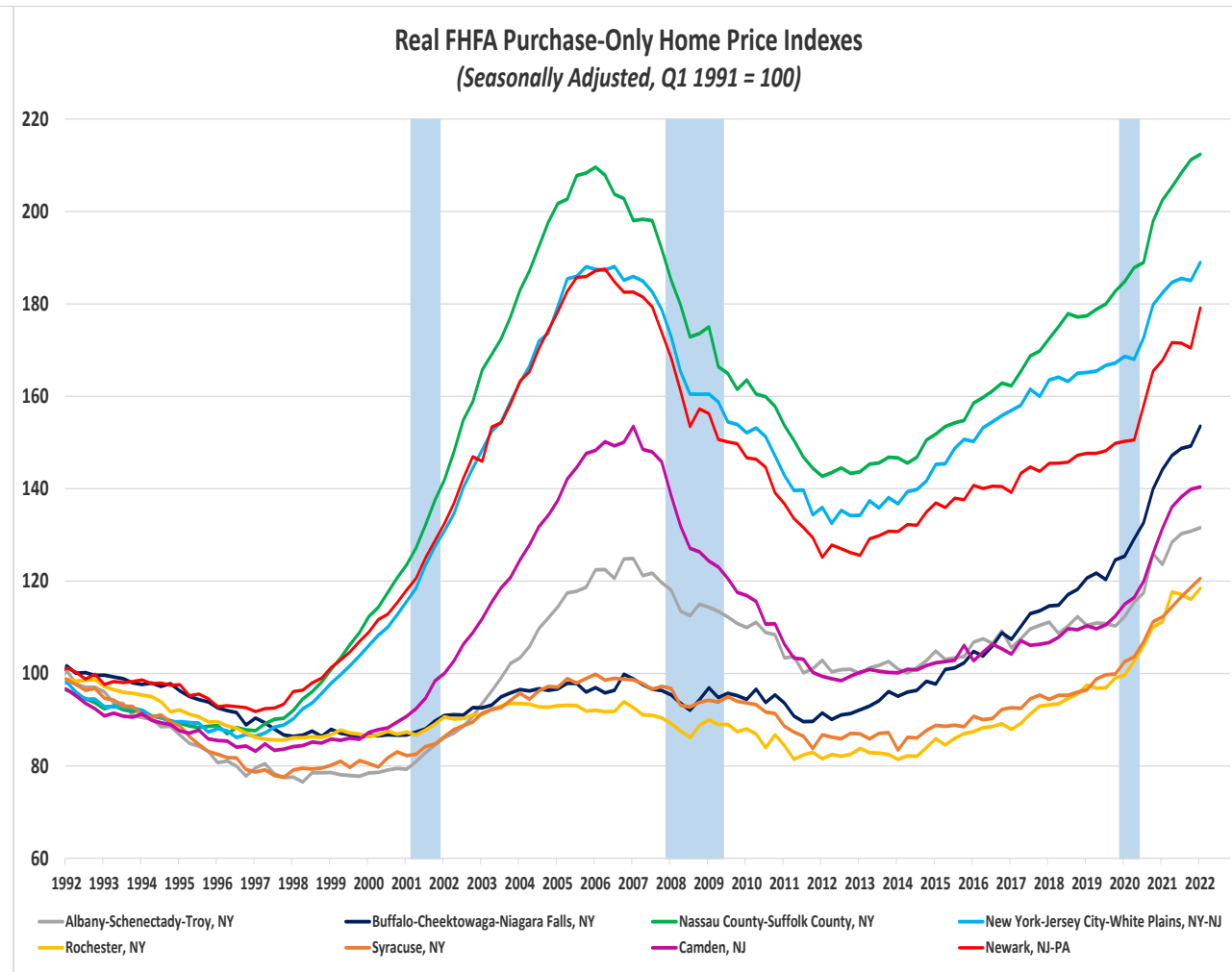
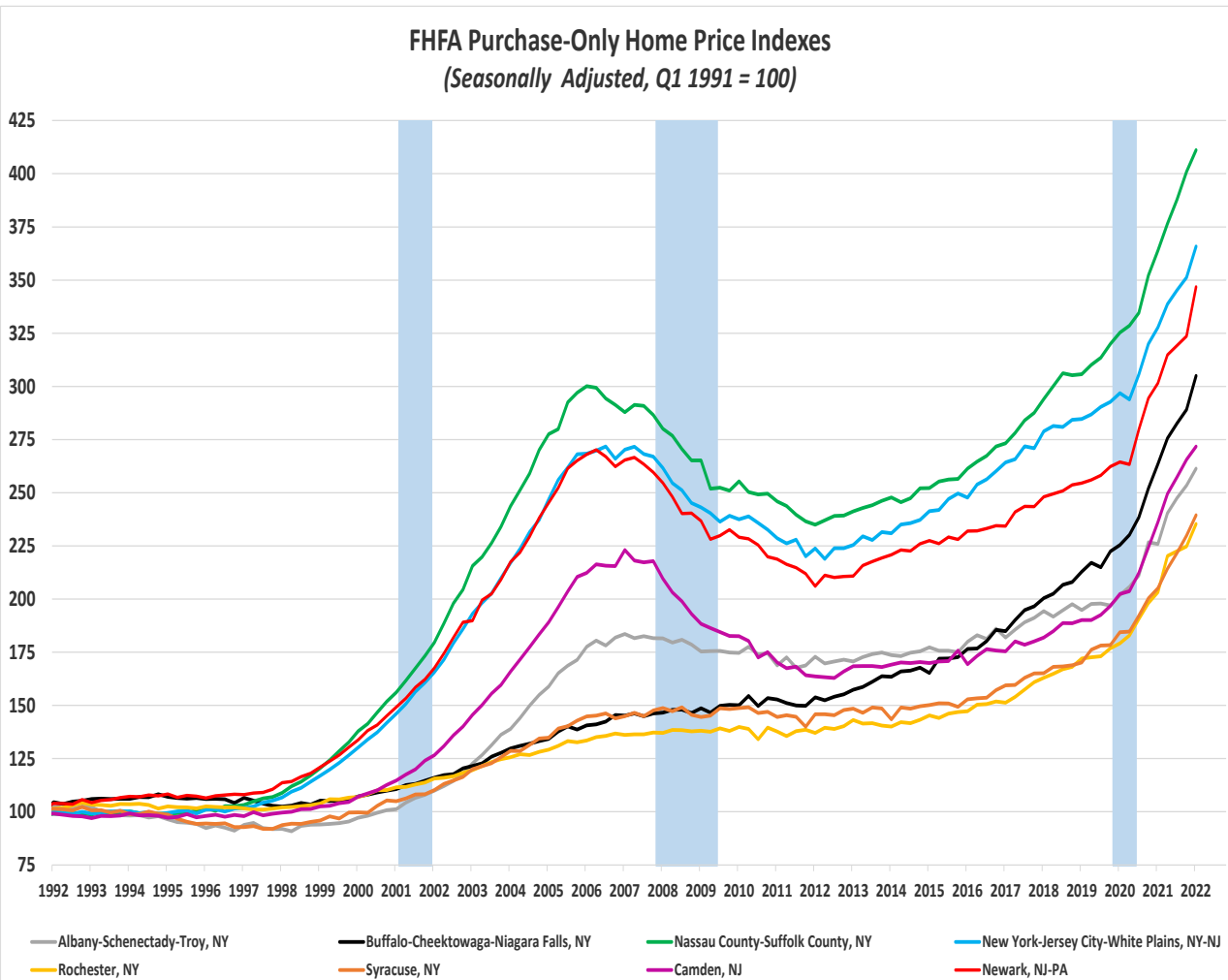
Near-Record Low Dwellings on the Market Will Support Local Home Prices Until Supply Comes on Stream



Notes: Blue shaded areas denote recession. Orange shaded area denotes current economic expansion.
Sources: NYSAR, NJ Realtors and FHLBNY estimates



Home-Price Performance Has Varied Widely Across the FHLBNY District



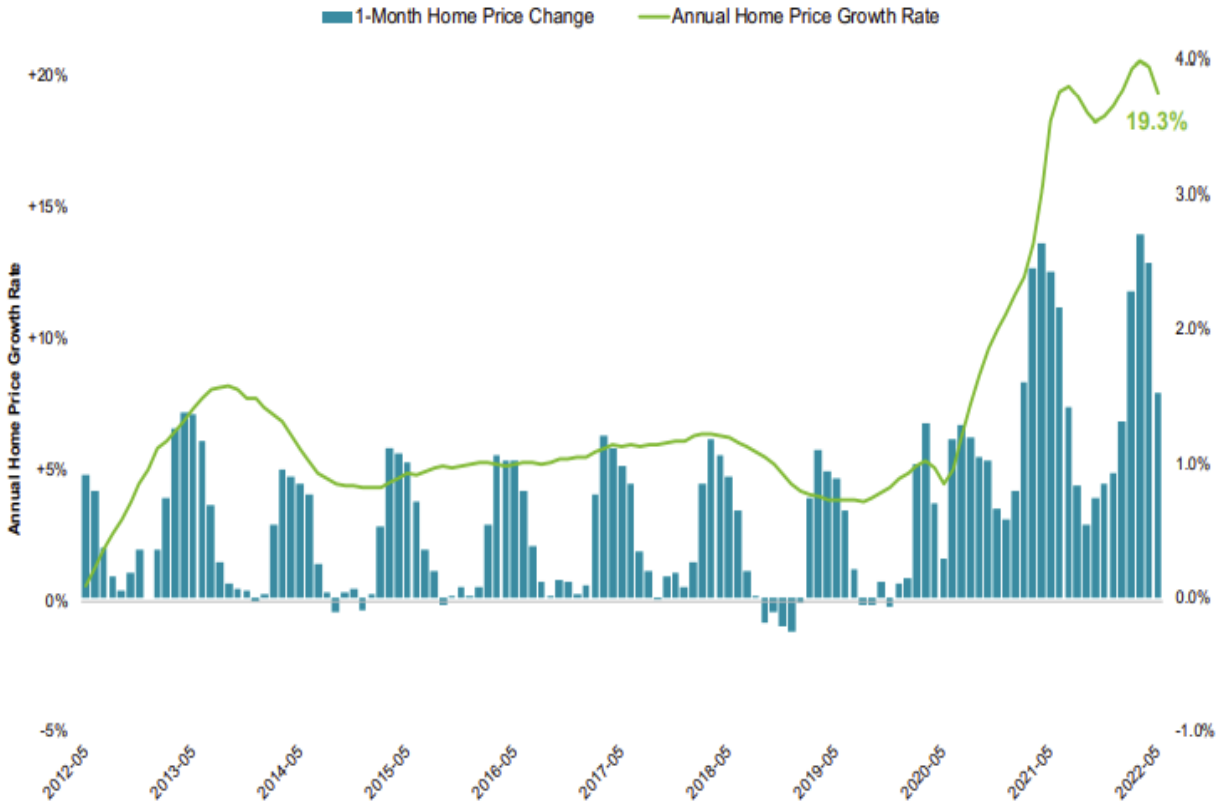
Notes: Blue shaded areas denote recessions.

Sources: Bureau of Labor Statistics, Federal Housing Finance Agency, National Bureau of Economic Research, and FHLBNY estimates



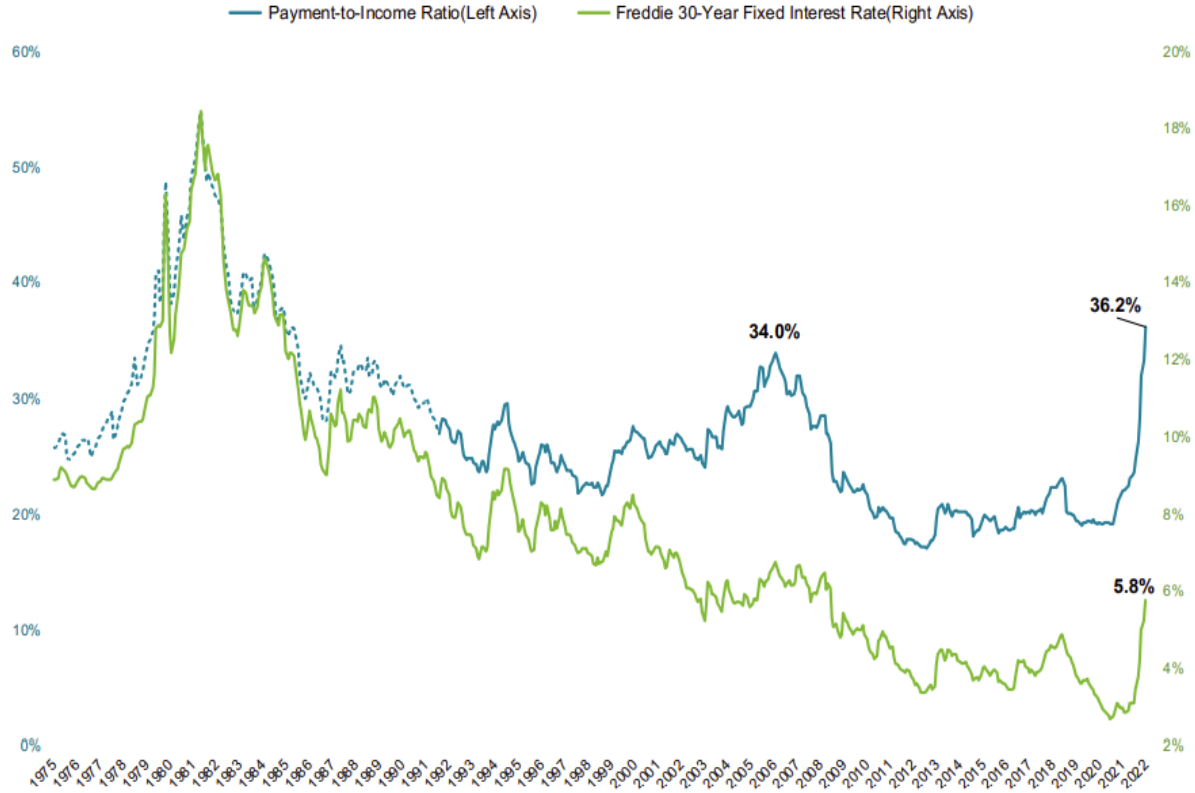
Higher Home Prices and Mortgage Interest Rates Have Made Housing Less Affordable

BLACK KNIGHT HOME PRICE INDEX



Source: Black Knight Home Price Index (HPI)

NATIONAL PAYMENT-TO-INCOME RATIO*

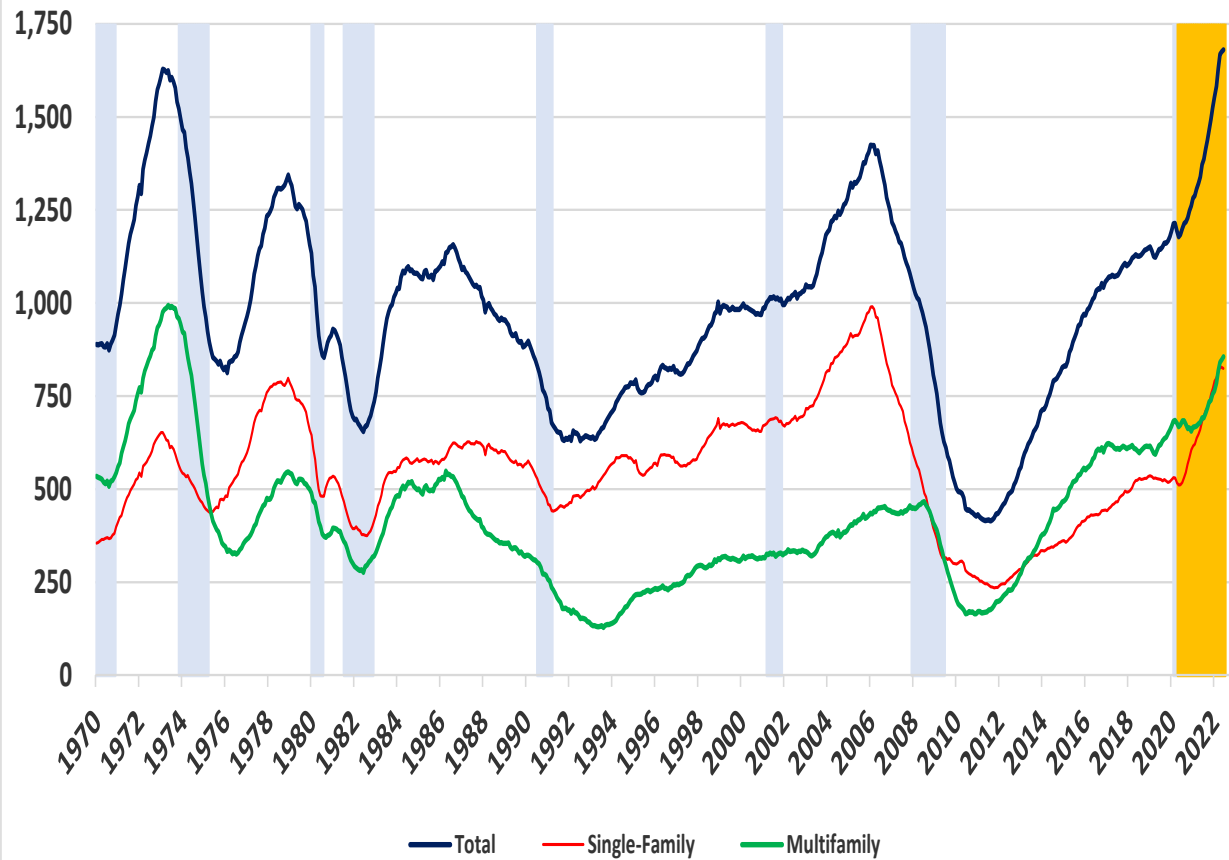


Source: Black Knight HPI, Census Bureau, FHLMC PMMS, Moody's
 *The National Payment to Income Ratio is the share of median income needed to make the monthly principal and interest payment on the purchase of the average-priced home using a 20% down 30-year fixed rate mortgage at the prevailing interest rate
 2022: Data as of June 16th, 2022

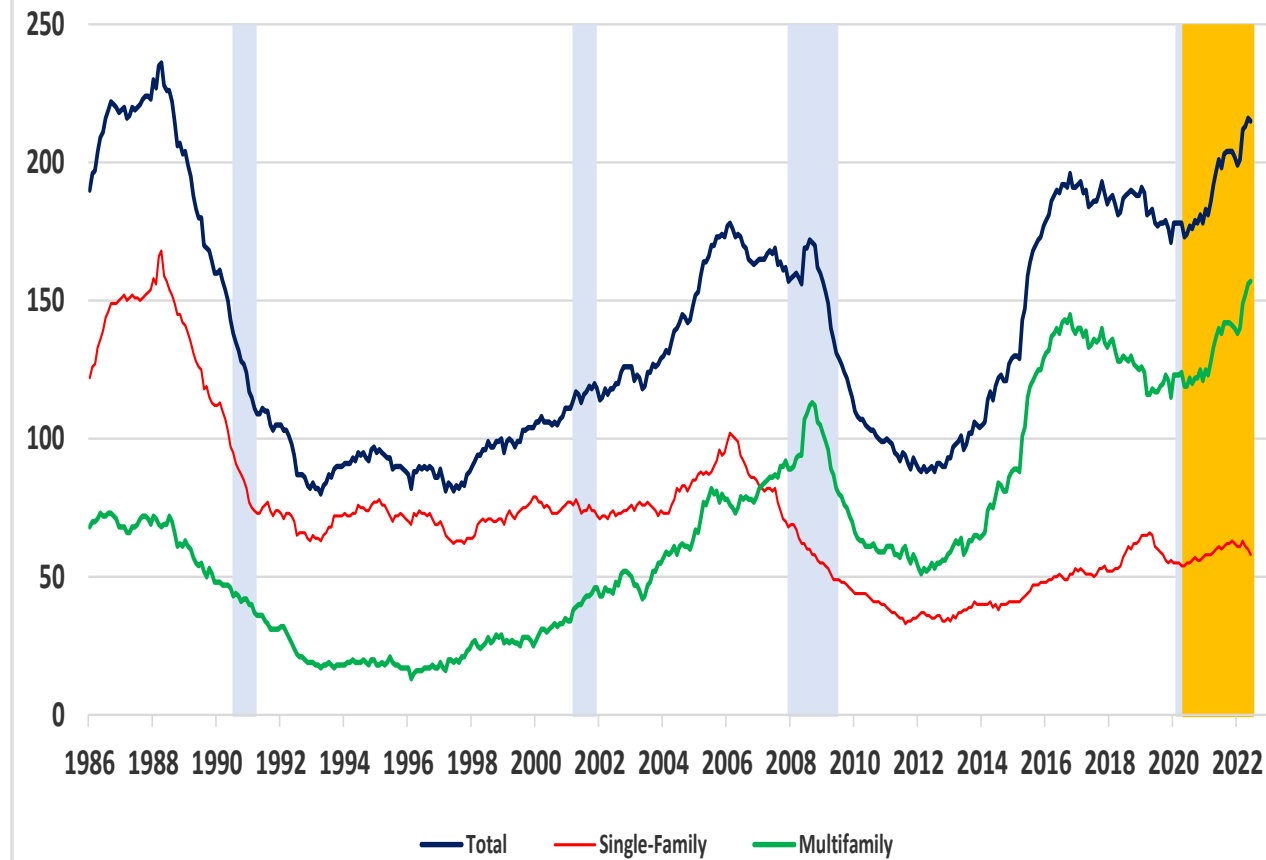


Builders Have Responded to Housing Shortage, But Completion Times Have Lengthened

U.S. Housing Units Under Construction
(thousands, seasonally adjusted annual rate)



Northeast Housing Units Under Construction
(thousands, seasonally adjusted annual rate)

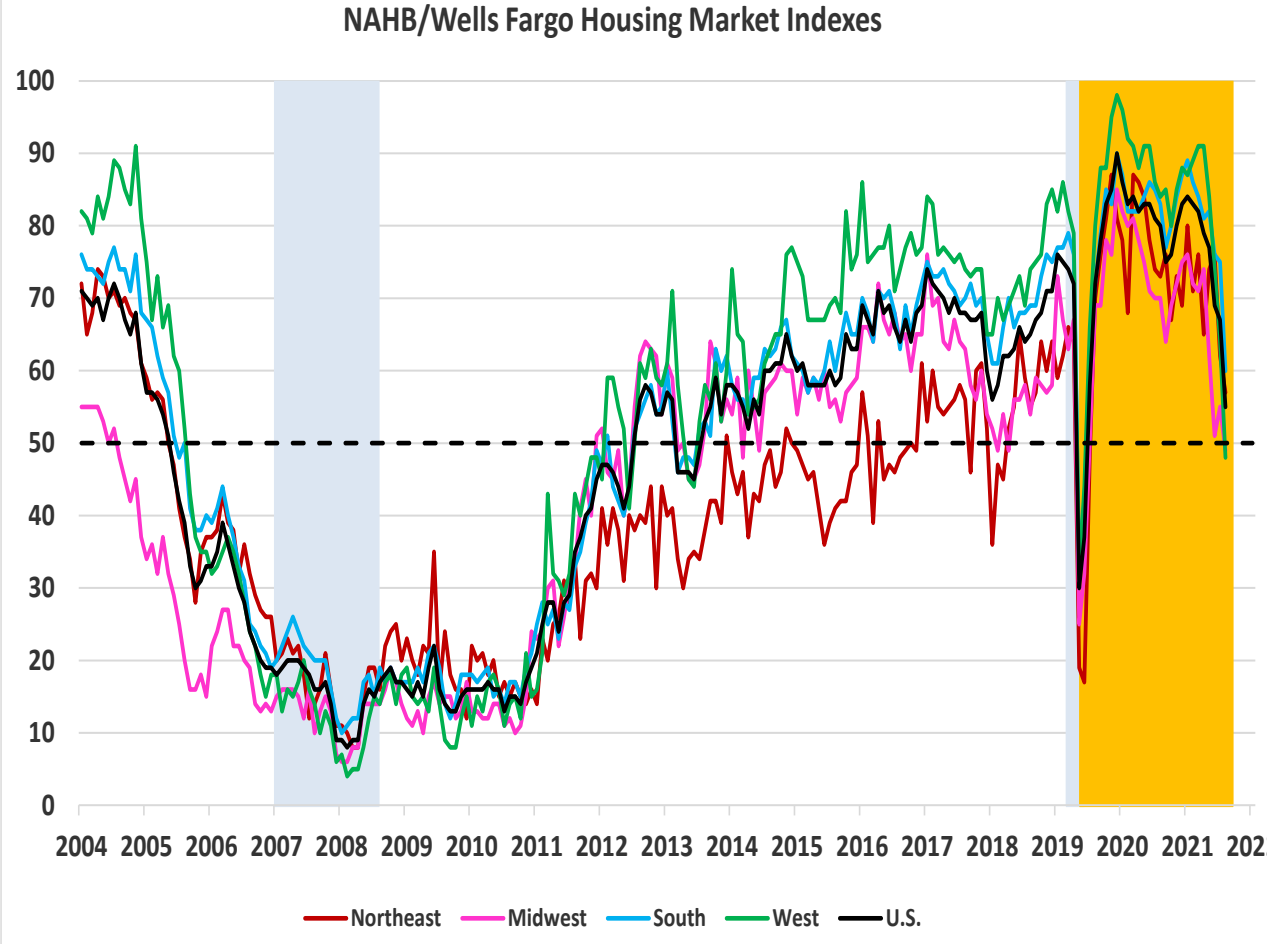
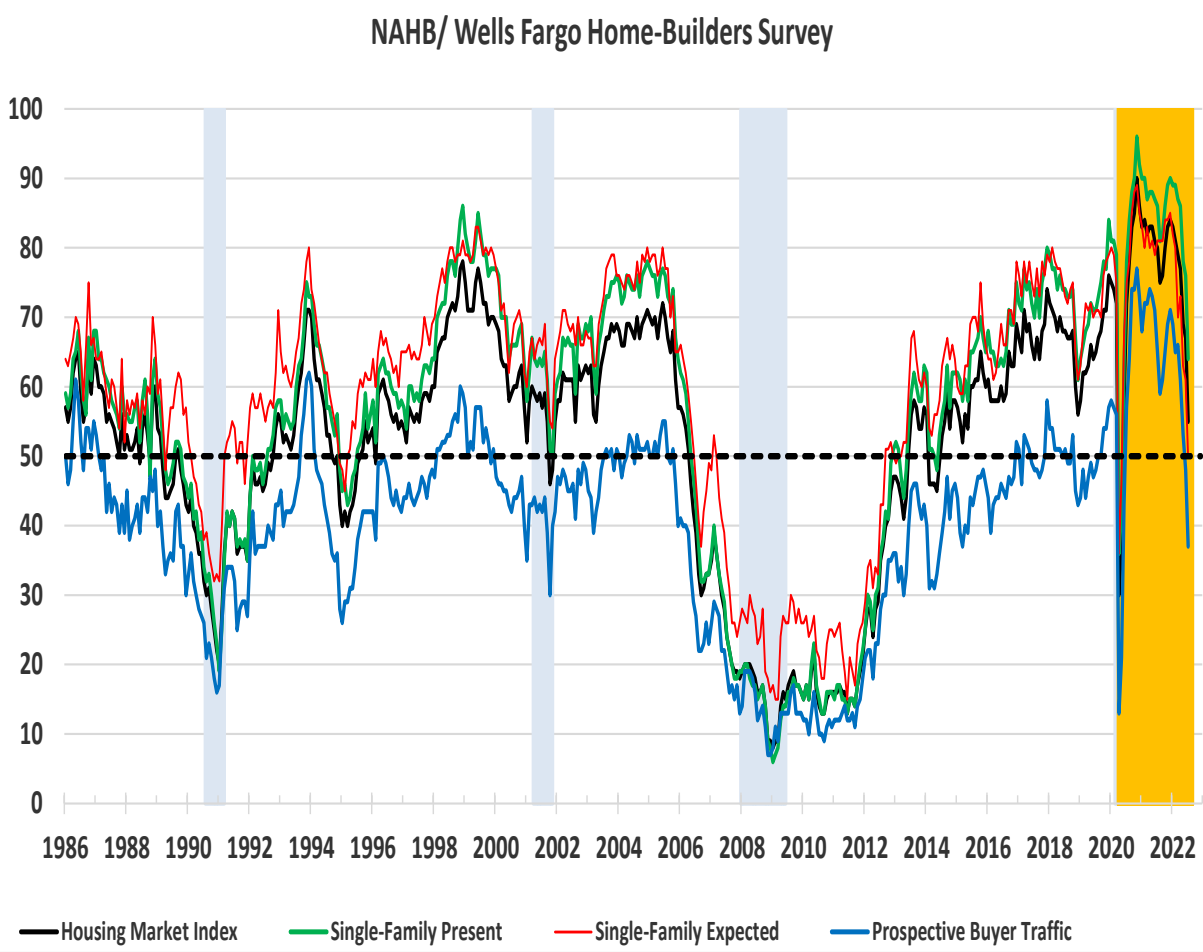


Notes: Blue shaded areas denote recession. Orange shaded areas highlight current economic expansion.

Sources: Census Bureau and National Bureau of Economic Research



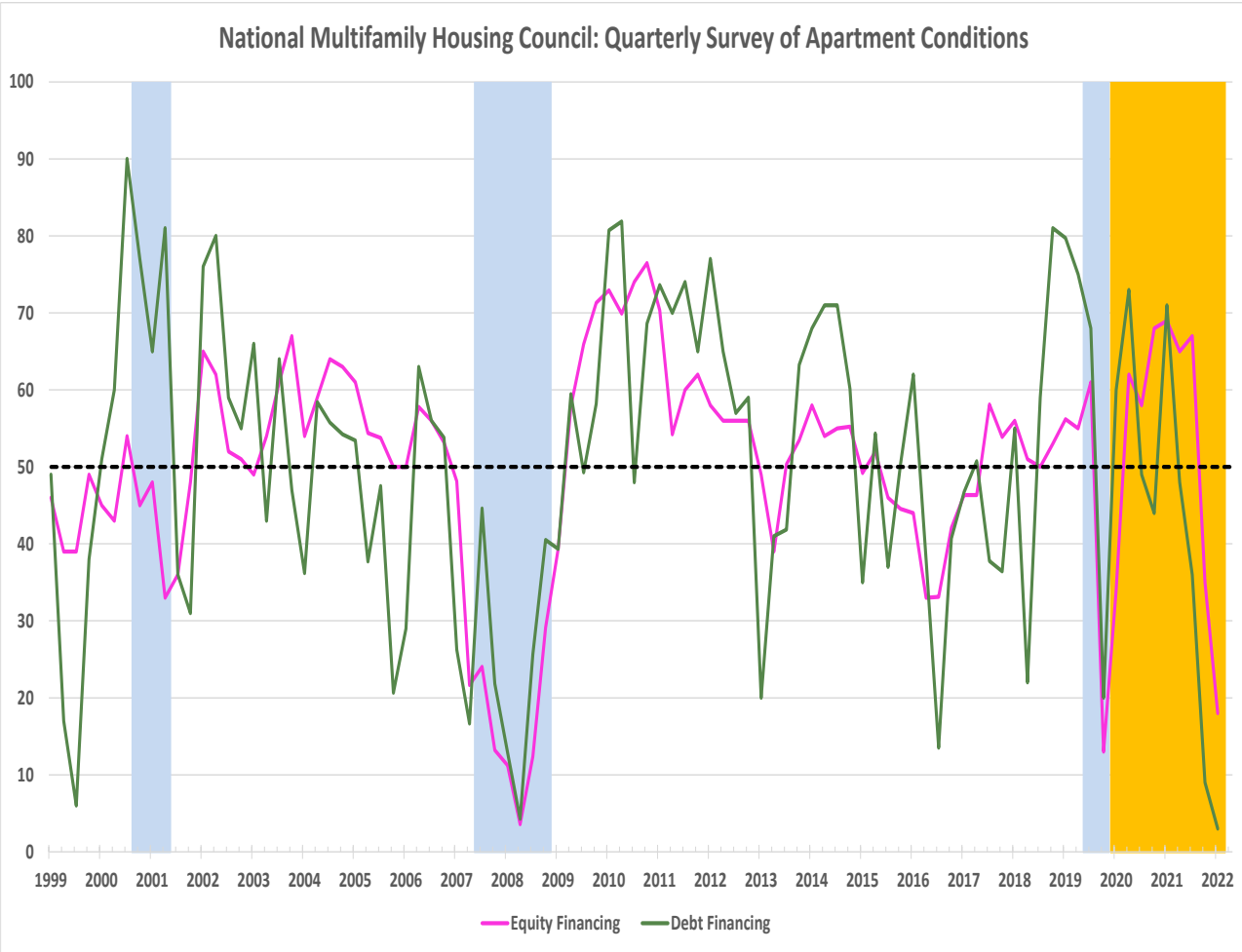
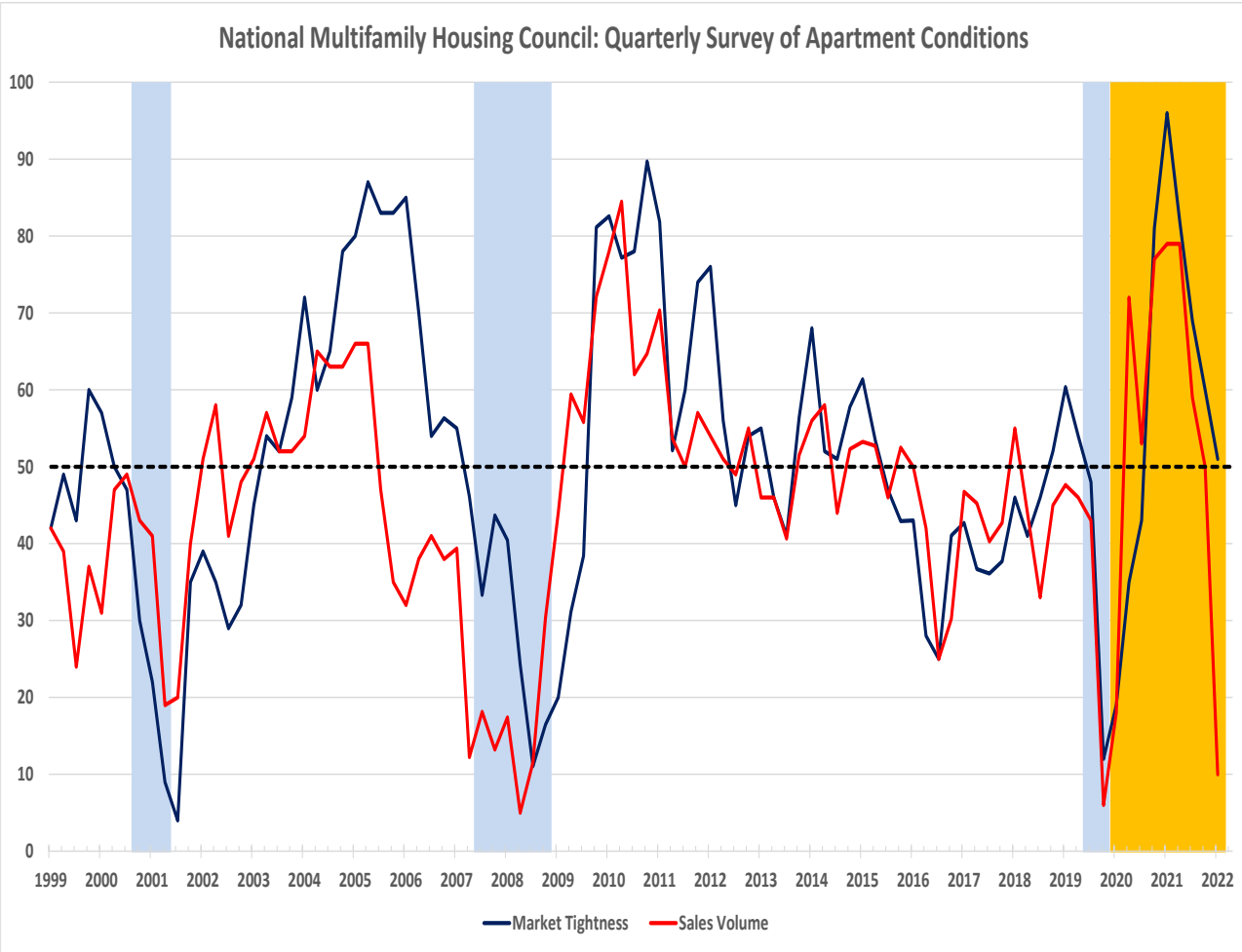
Higher Materials Costs and Interest Rates Are Weighing on Home-Builder Sentiment



Notes: Blue shaded areas denote recessions. Orange shaded areas highlights current expansion.
 Sources: National Association of Home Builders/Wells Fargo, National Bureau of Economic Research



Apartment Market Conditions Remained Tight, But Sales Volumes Fell Amid a Deteriorating Financing Environment



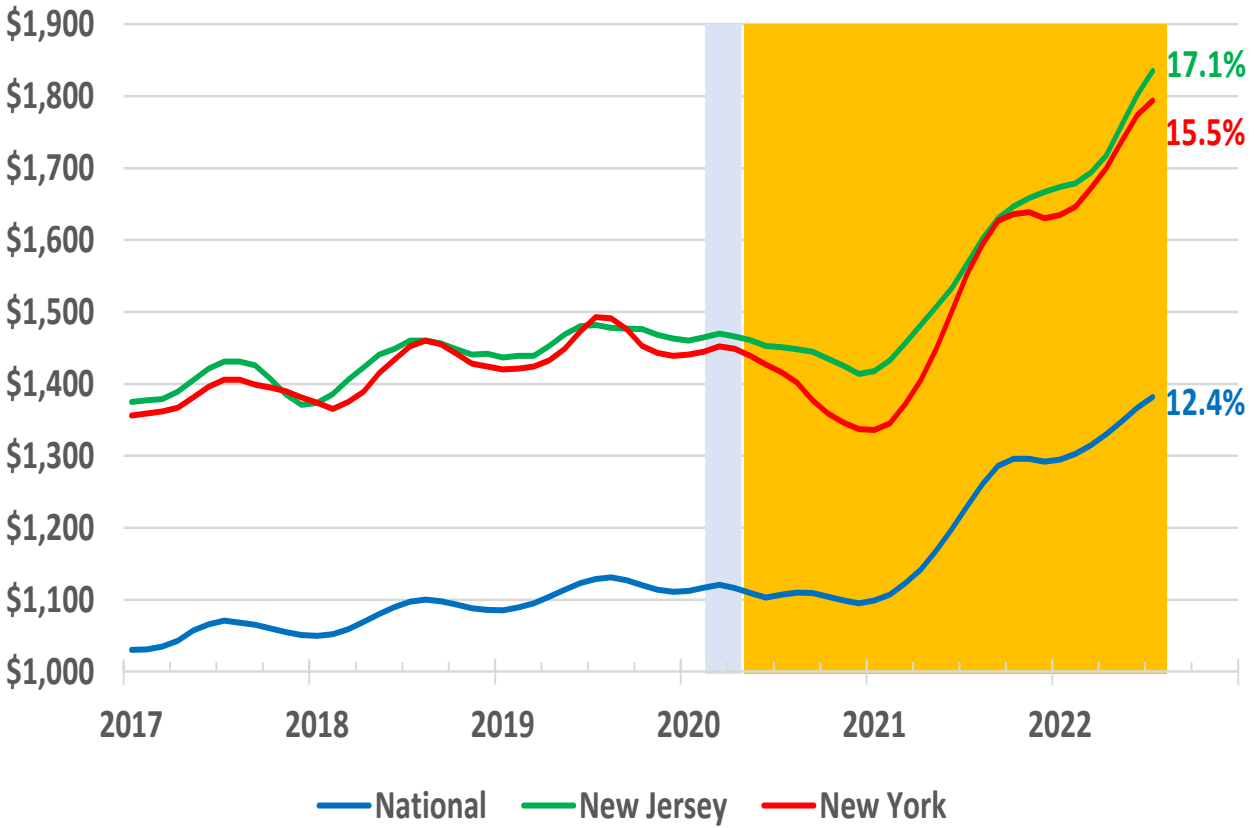
Notes: The diffusion indexes above are calculated by taking one-half the difference between positive and negative responses and adding 50. Blue shaded areas denote recessions. Orange shaded areas highlight current expansion.

Sources: National Multifamily Housing Council, National Bureau of Economic Research

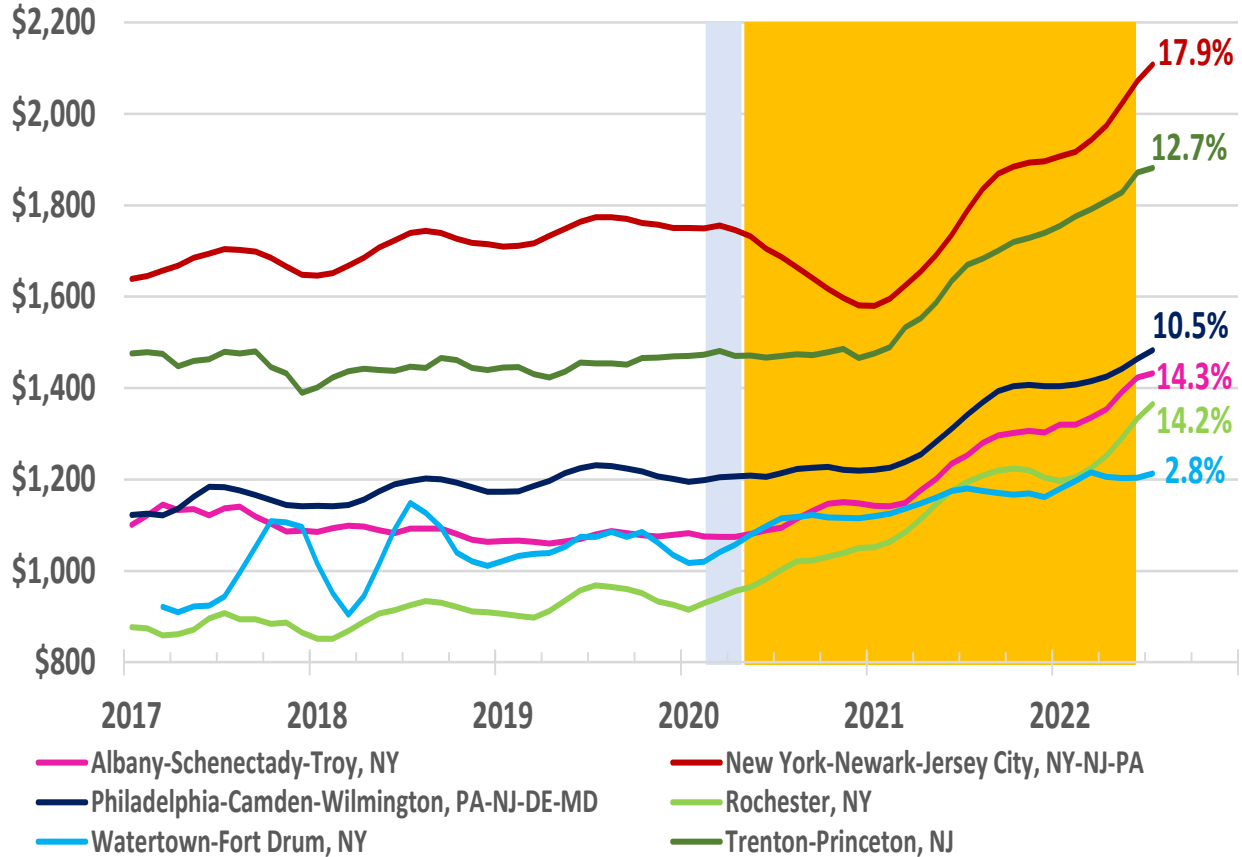


Apartment Rents Are Rising at Double-Digit Rates Across the Country and FHLBNY Coverage Area

Monthly Apartment Rents



Selected Apartment Rents in the FHLBNY District

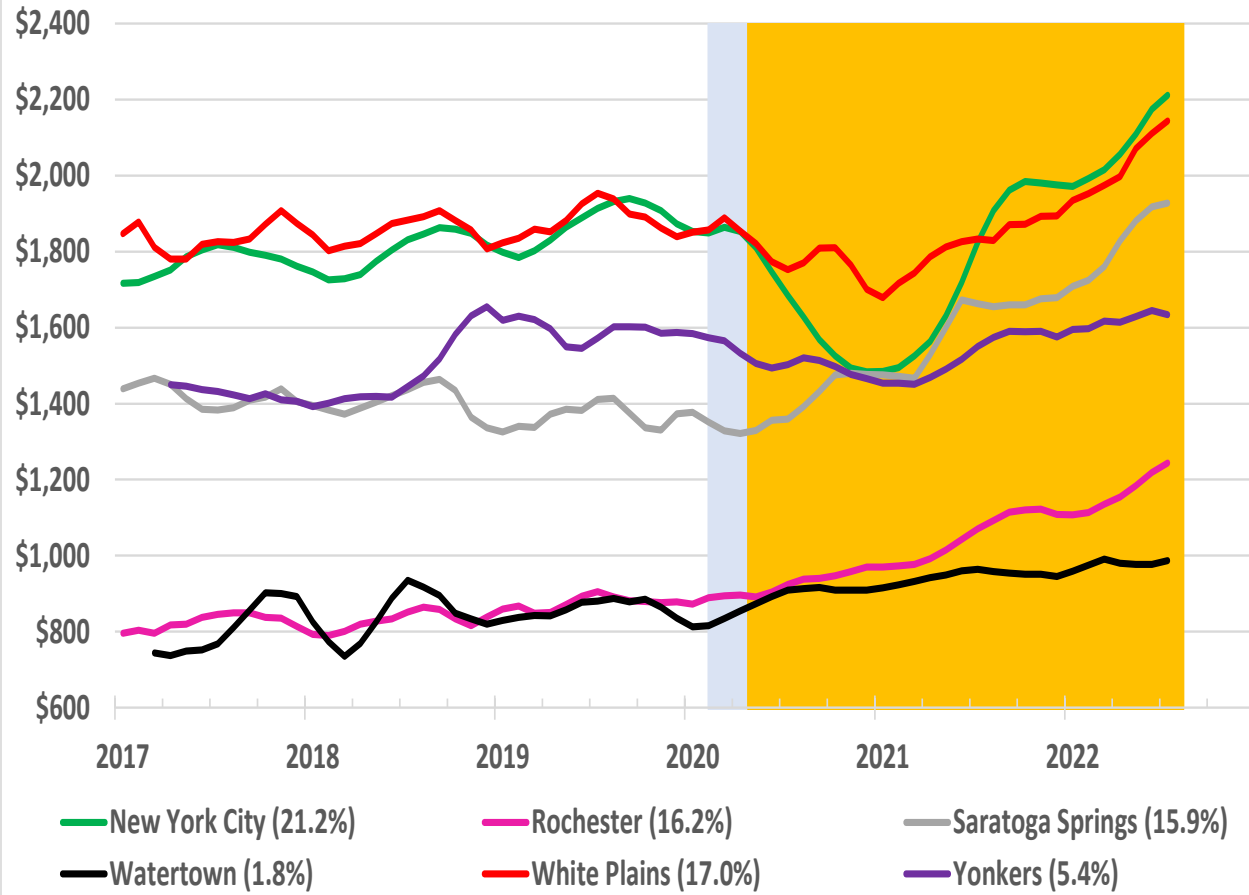


Notes: Blue shaded areas denote recession. Orange shaded areas highlight the current economic expansion. Percentage changes are from May 2021.
Sources: Apartment List, National Bureau of Economic Research

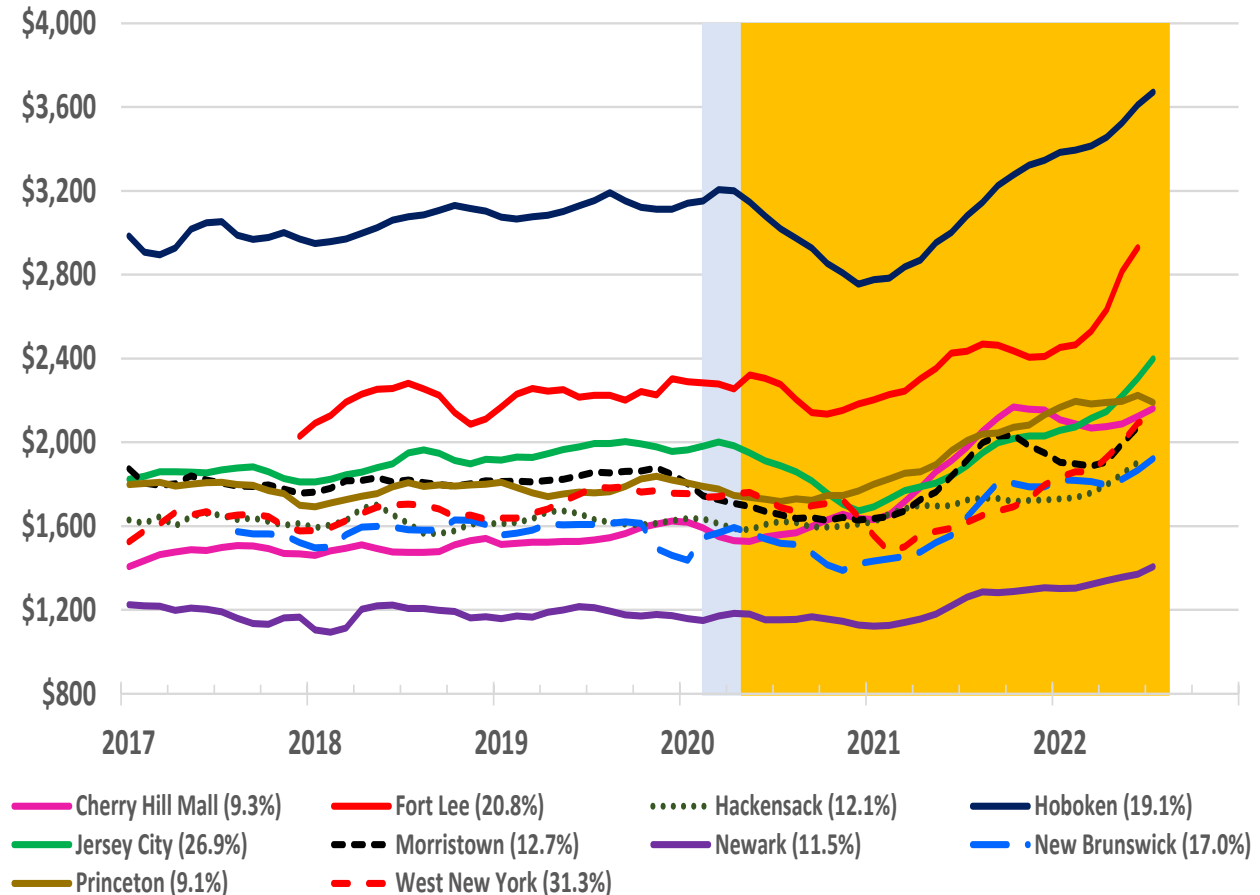


Residential Rents Rising at Double-Digit Rates Across Most of the Empire and Garden States

Selected Apartment Rents in New York State



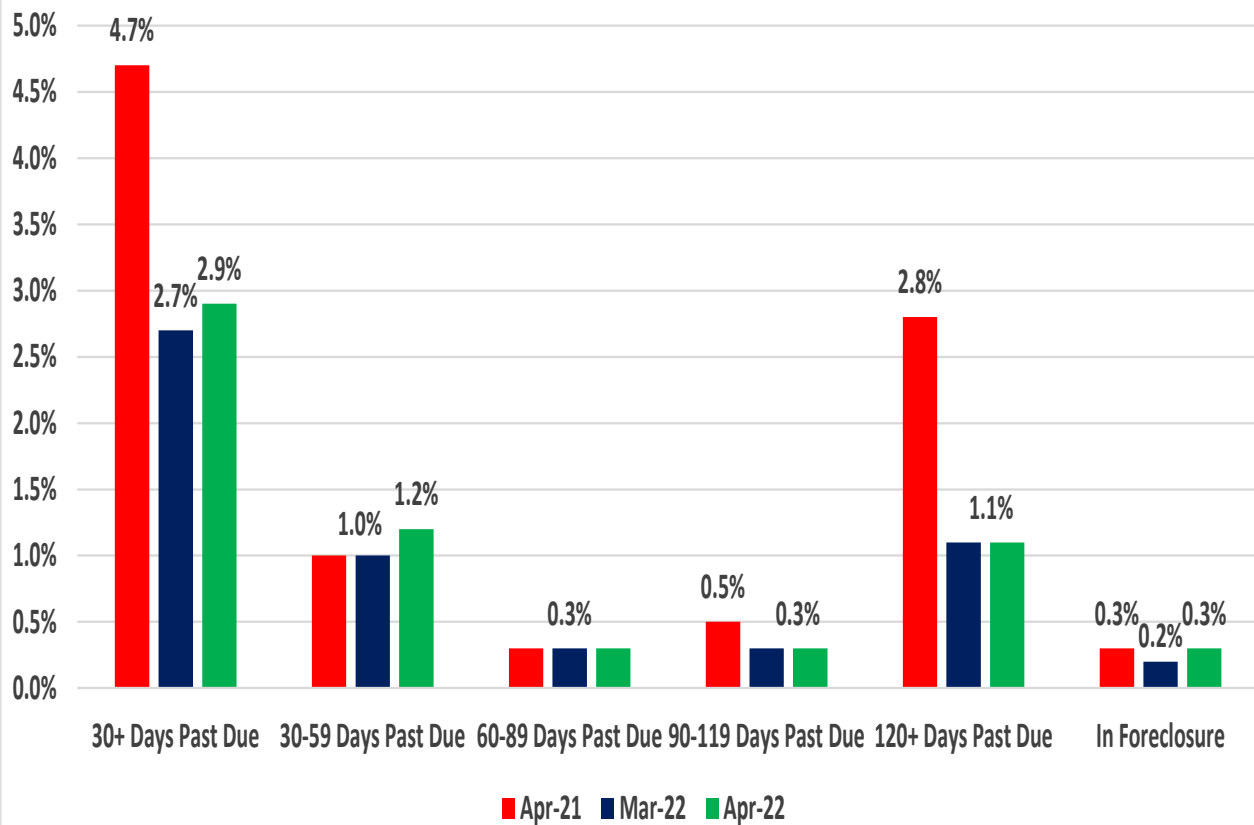
Selected Apartment Rents in New Jersey



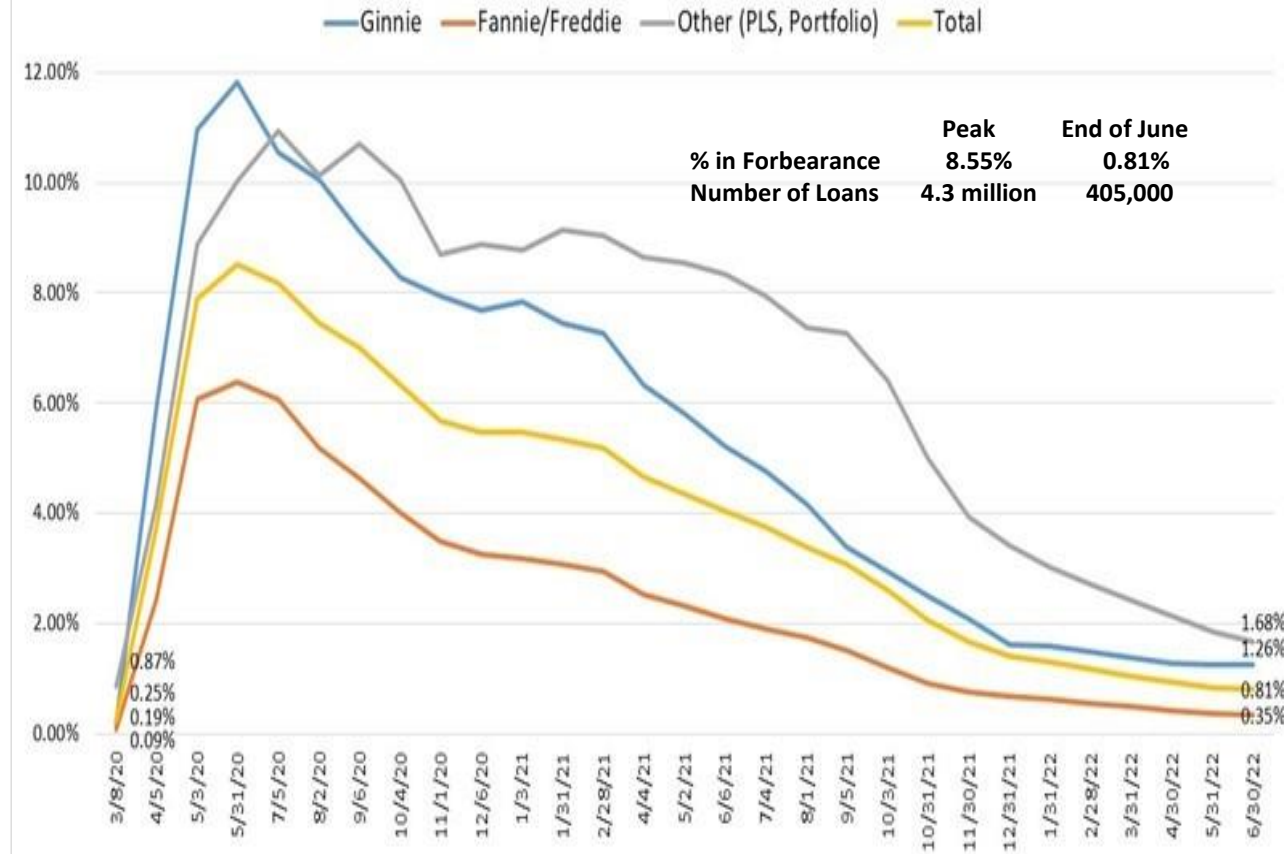
Notes: Blue shaded areas denote recession. Orange shaded areas highlight the current economic expansion. Percentages changes from June 2021 in parenthesis.
Sources: Apartment List, National Bureau of Economic Research

Mortgage Performance Improving; Forbearances Remain on a Downtrend

Mortgage Delinquency Rates



Loans in Forbearance by Investor Type (as % of Servicers' Portfolio Volume) at Month-End



Sources: CoreLogic and Mortgage Bankers Association



FHLBNY District Commercial Real Estate Markets Have Been Mixed Since the Pandemic Struck (changes in key metrics from 4Q 2019 to 2Q 2022)

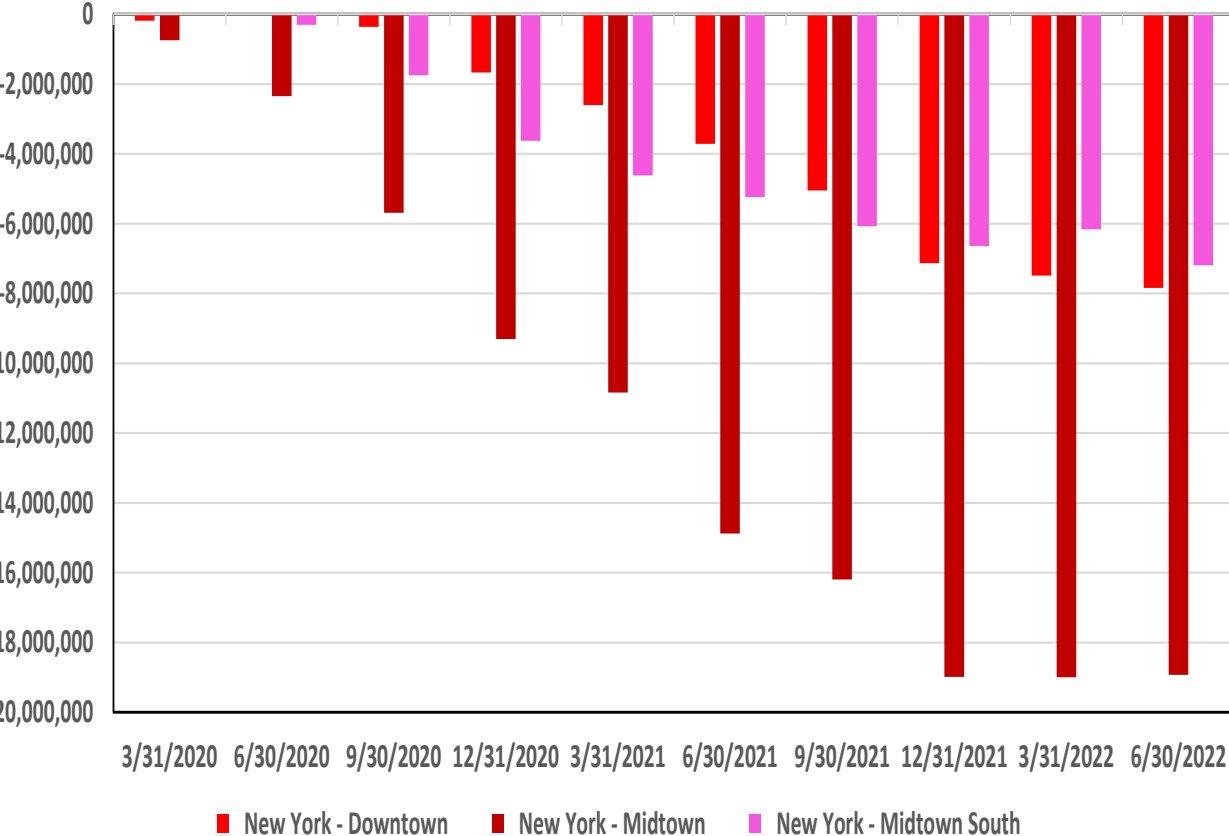
Office Markets:	Net Absorption (sq. ft.)	Vacancy Rate	Asking Rents	Industrial Markets:	Net Absorption (sq. ft.)	Vacancy Rate	Asking Rents
Binghamton, NY	-17,657	1.1%	4.0%	Binghamton, NY	604,955	-7.5%	-0.6%
Buffalo, NY	31,311	1.9%	0.0%	Buffalo, NY	2,420,841	-5.2%	56.8%
Long Island, NY	-867,758	2.5%	2.8%	Long Island, NY	2,761,094	-1.9%	51.0%
New Jersey - Central	-2,902,795	3.4%	3.9%	New Jersey - Central	16,713,900	-0.1%	80.4%
New Jersey - Northern	-2,942,177	3.6%	1.2%	New Jersey - Northern	8,315,096	-1.4%	47.3%
New York - Brooklyn	374,927	2.8%	6.5%	New York - Outer Boroughs	2,893,305	-1.2%	25.4%
New York - Downtown	-7,837,962	10.0%	-9.4%	Rochester, NY	2,495,848	-2.7%	52.8%
New York - Midtown	-18,930,351	9.8%	0.5%	Syracuse, NY	1,346,035	-3.8%	19.8%
New York - Midtown South	-7,188,048	13.0%	-5.7%				
Rochester, NY	-795,093	3.6%	-11.1%	Shopping Centers:	Net Absorption (sq. ft.)	Vacancy Rate	Asking Rents
Syracuse, NY	-19,765	1.0%	1.1%	Albany	-222,546	0.8%	4.3%
Westchester County, NY	-957,846	3.9%	4.3%	Buffalo	-768,179	3.0%	6.5%
				New York City Metro	751,171	0.3%	-5.3%
				Rochester	-360,449	1.5%	4.9%
				Syracuse	20,159	-0.1%	7.1%



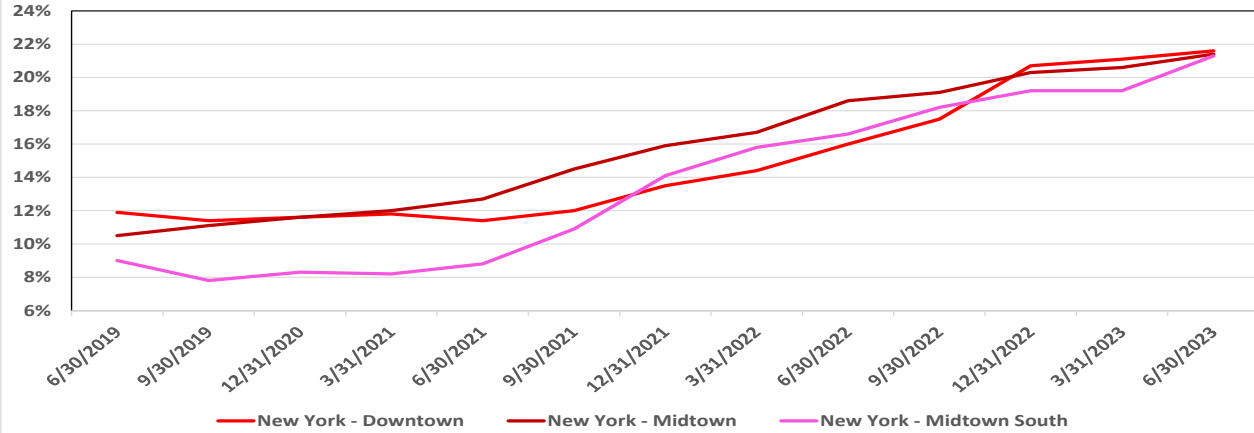
Source: Cushman & Wakefield

Demand for Office Space in NYC Remains Exceptionally Weak

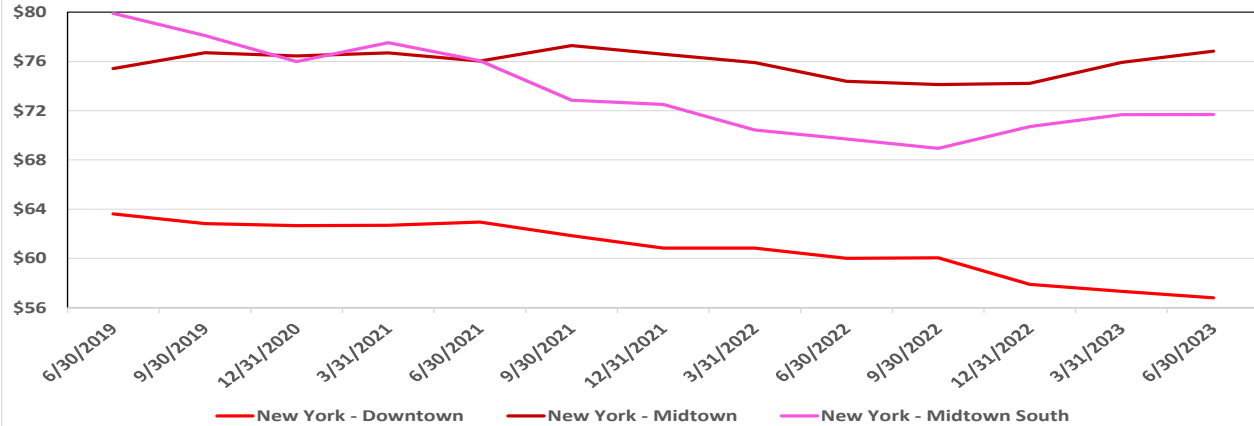
Cumulative Net Absorption of Office Space in NYC Since the End of 2019
(square feet)



Office Vacancy Rates in New York City
(percent)



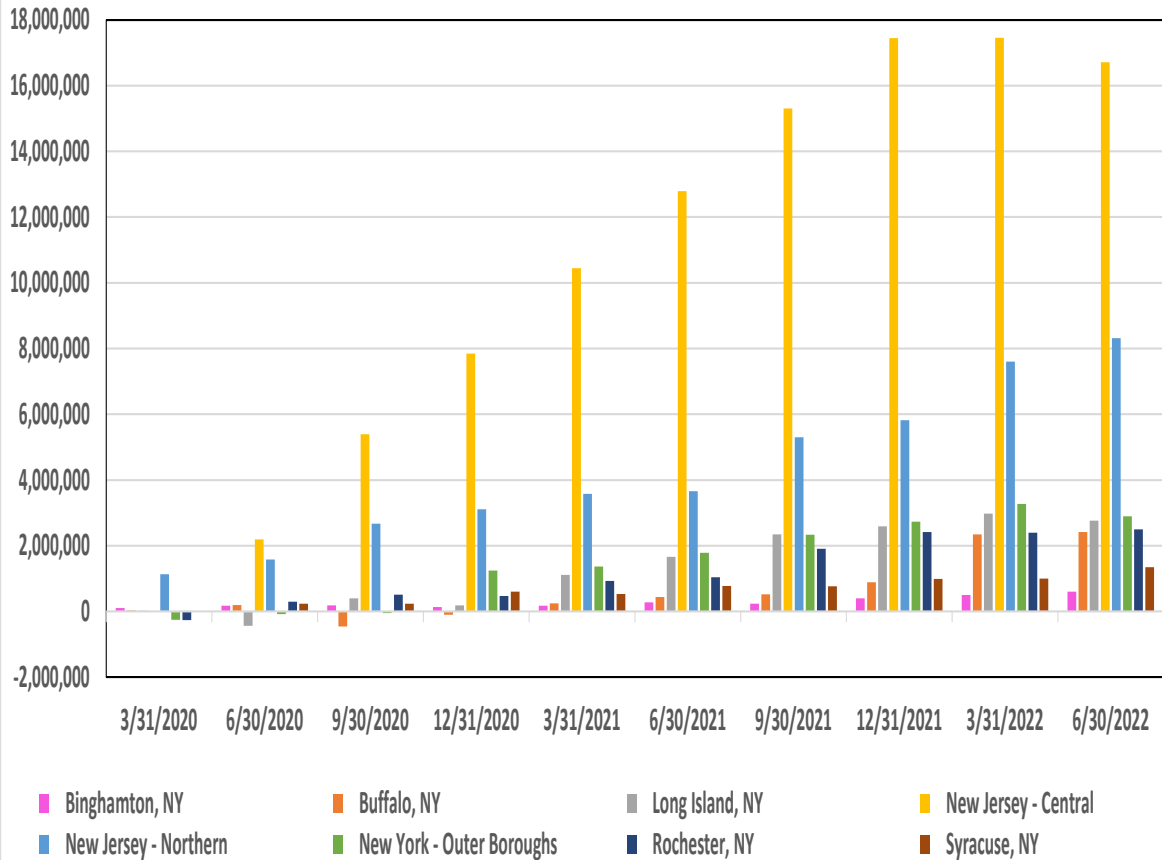
Asking Rents for Office Space in New York City
(\$ per square foot)



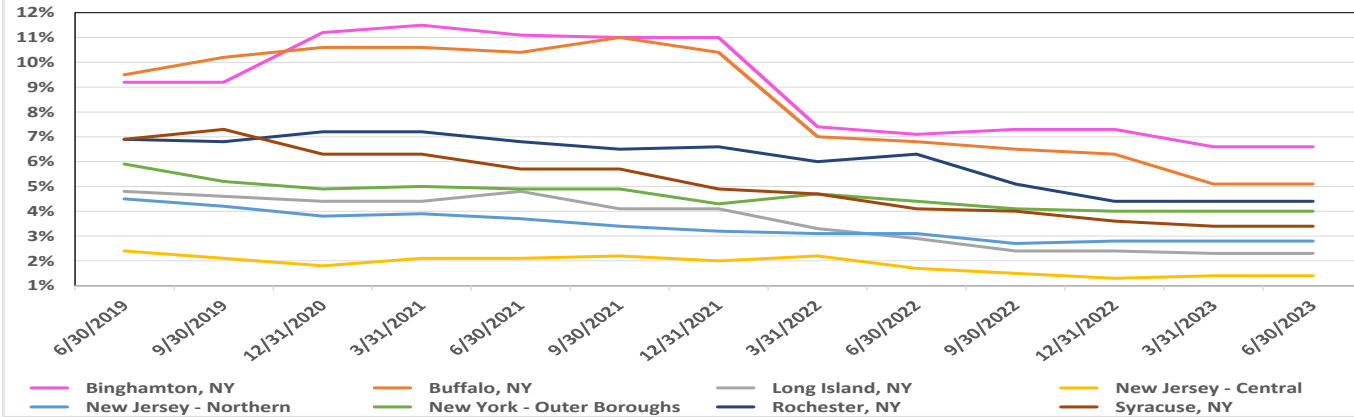
Source: Cushman & Wakefield

New Jersey Markets Have Accounted for Two Thirds of Industrial Space Absorbed Across FHLBNY District Since the End of 2019

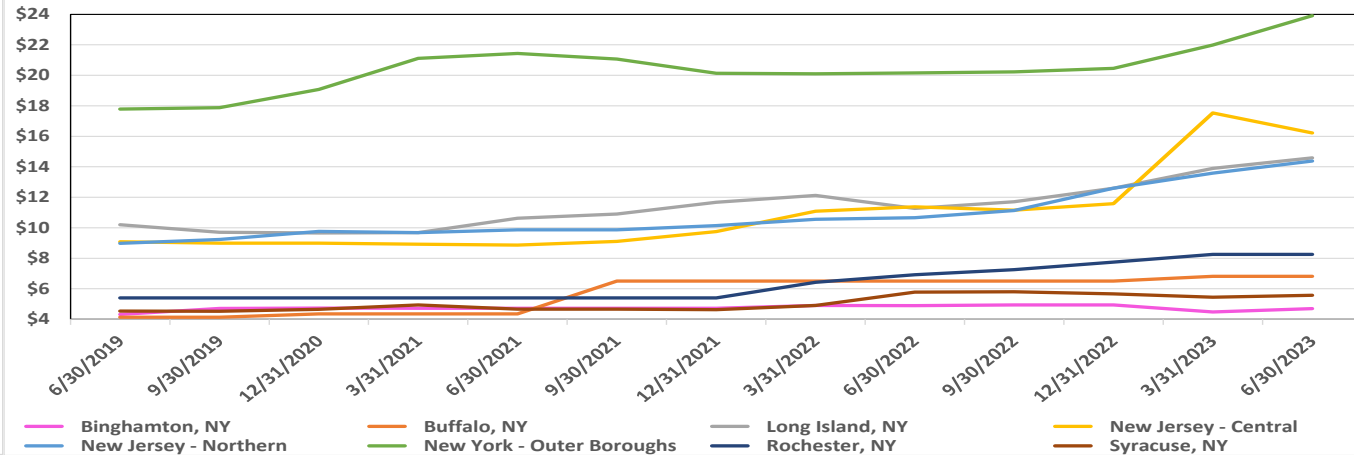
Cumulative Net Absorption of Industrial Space Across the FHLBNY District Since the End of 2019
(square feet)



Industrial Vacancy Rates Across the FHLBNY District
(percent)

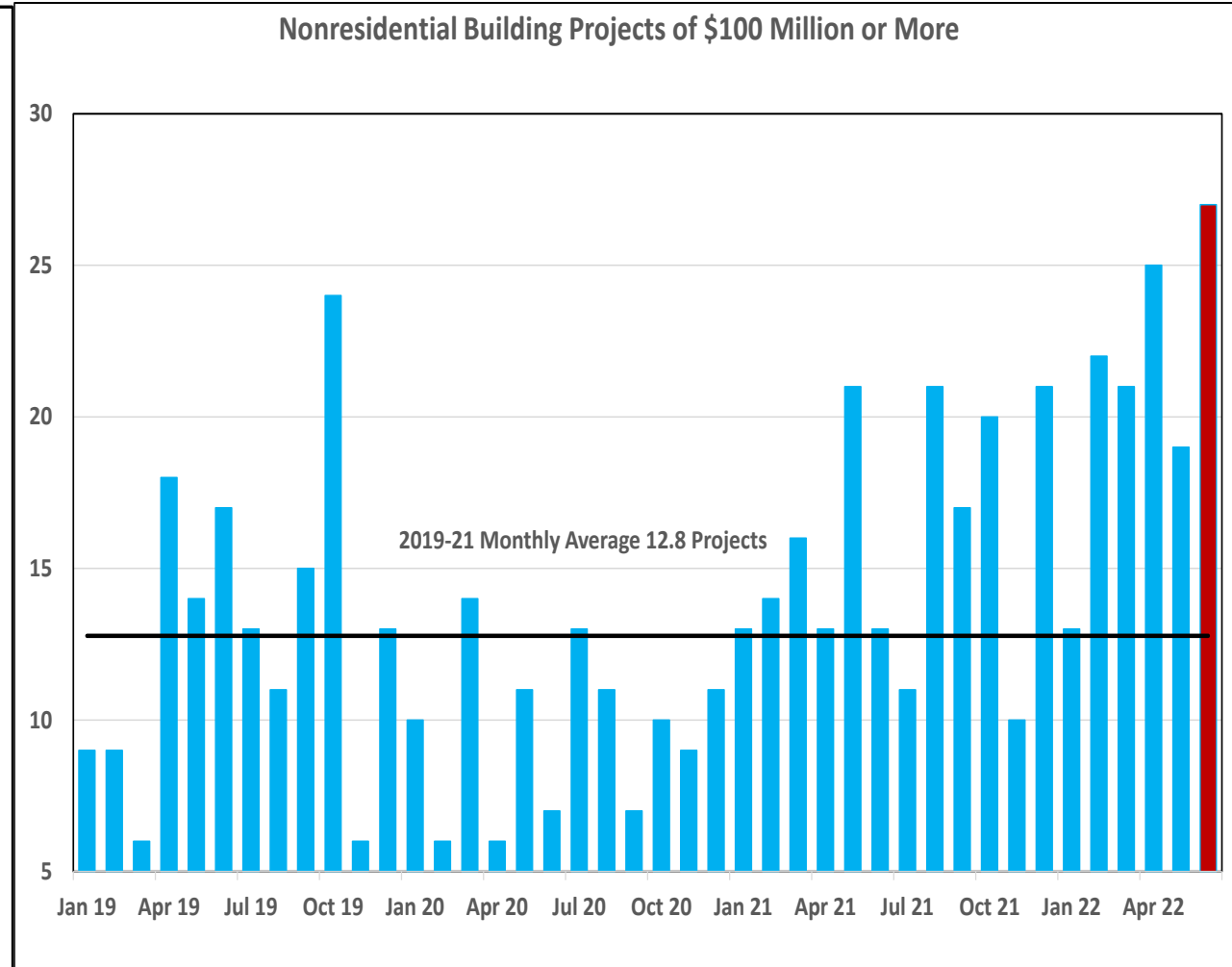
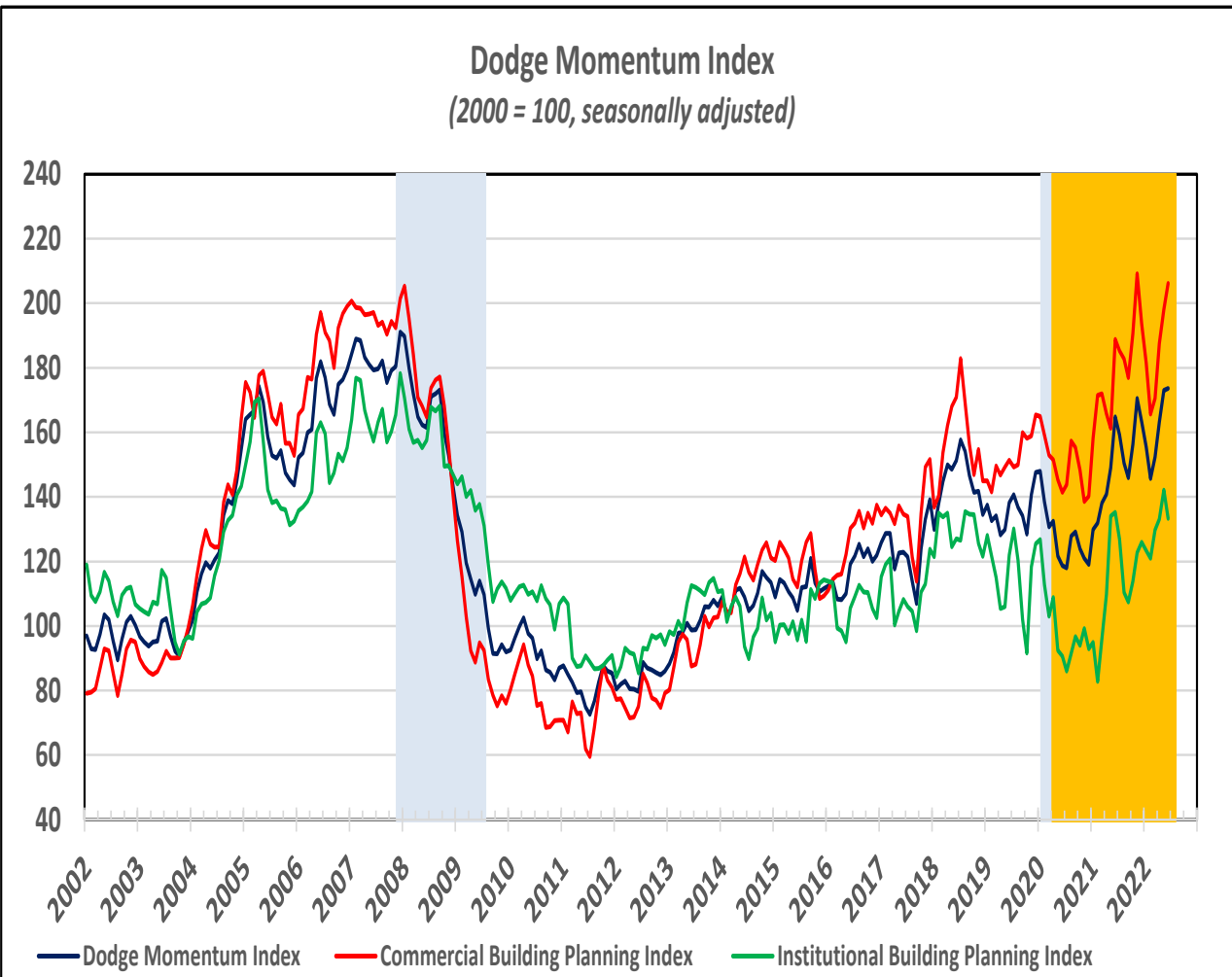


Asking Rents for Industrial Space Across the FHLBNY District
(\$ per square foot)



Source: Cushman & Wakefield

Nonresidential Building Projects in Planning Have Been Volatile, But Trending Higher



Notes: Blue shaded areas denote recession. Orange shaded area highlights the current economic expansion.

Sources: Dodge Data & Analytics, Federal Reserve Bank of St. Louis





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NEW YORK

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