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# Social Narratives, Economic Realities and the Outlook for Phoenix and Arizona



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Founding Partner, Beacon Economics

October 2024



# The Economic Outlook

## Beacon Economics

Independent LA-based economic research firm founded in 2006 on the principle of letting the data drive the results

## Today's Presentation

- What we *think* is happening in our economy (our social narrative or “lived experience”)
- What is *actually* happening in our economy (our objective statistical reality)
- It is the combination of the two that drives the forecast:

***Narratives drive choices. Economics determines outcomes.***

***Good policy starts with the right narrative.***



Access to slides available through QR code at end of presentation

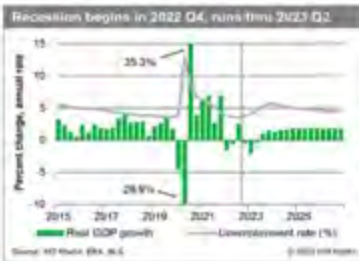


# The 2023 / 2024 Macro Narratives

## The Forecast: Recession is Nigh!!!

**US Fed meeting decision today: PIMCO warns market is underestimating risk of US recession and rate hikes**

**Opinion: The US economy will likely enter a recession soon**



### Why a Soft Landing Could Prove Elusive

On the eve of recessions in 1990, 2001 and 2007, many Wall Street economists proclaimed the U.S. was on the cusp of achieving a soft landing, in which interest-rate increases would corral inflation without



### Regulators seize First Republic Bank, sell assets to JPMorg

By Scott Horsbach, Filipe Nakant and Chris New

NEW YORK (Reuters) - Regulators seized First Republic Bank on Monday, selling its assets to JPMorgan Chase & Co.

Economics | Central Banks

## Fed Pivot Will Dominate Year of Rate Cuts

- Quarterly outlook on what to expect from monetary policy
- About-turn follows most aggressive tightening in decades

NEWS > STOCKS

## A record high in the S&P 500 would suggest double-digit gains in 2024

Matthew Fox Jan 8, 2024, 10:14 AM PST

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REAL ESTATE

## Mortgage demand jumps nearly 10% to start the year, even as interest rates tick up again

PUBLISHED WED, JAN 10 2024 7:50 AM EST | UPDATED WED, JAN 10 2024 7:39 AM EST

NEWS > ECONOMIC NEWS

## Improved Sales, Economic Outlook Push Small Business Optimism to 5-Month High

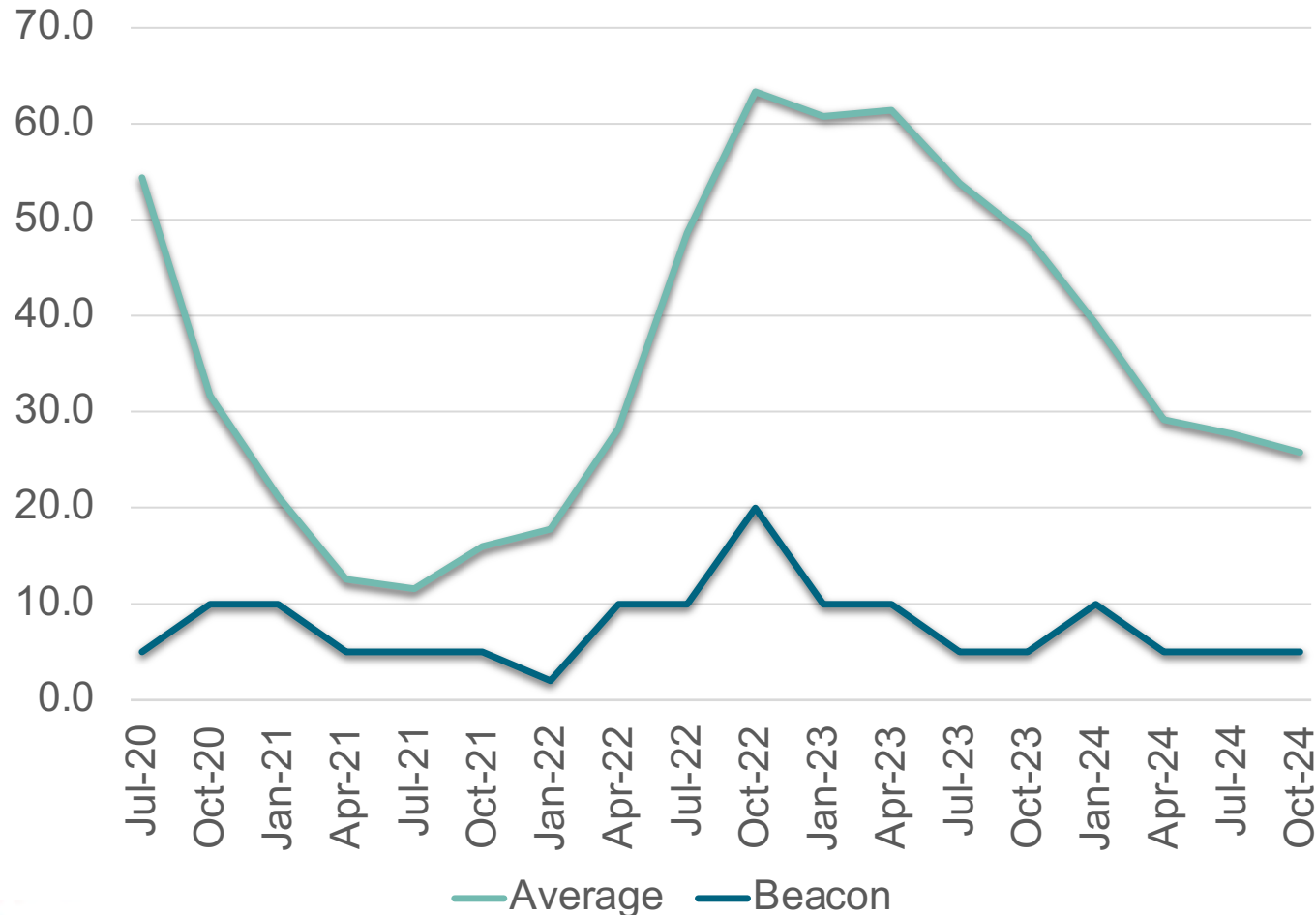
By TERRY LANE, Contributor January 10, 2024



# Beacon's Outlook

## WSJ Recession Probability Forecast

Chance of US entering a recession in the next 12 months



## *We aren't worried now...*

- The consumer is doing fine, ergo the economy is too
- The Fed is backing off on the brakes... sorta
- Labor force growth picking up

## *... but we are worried.*

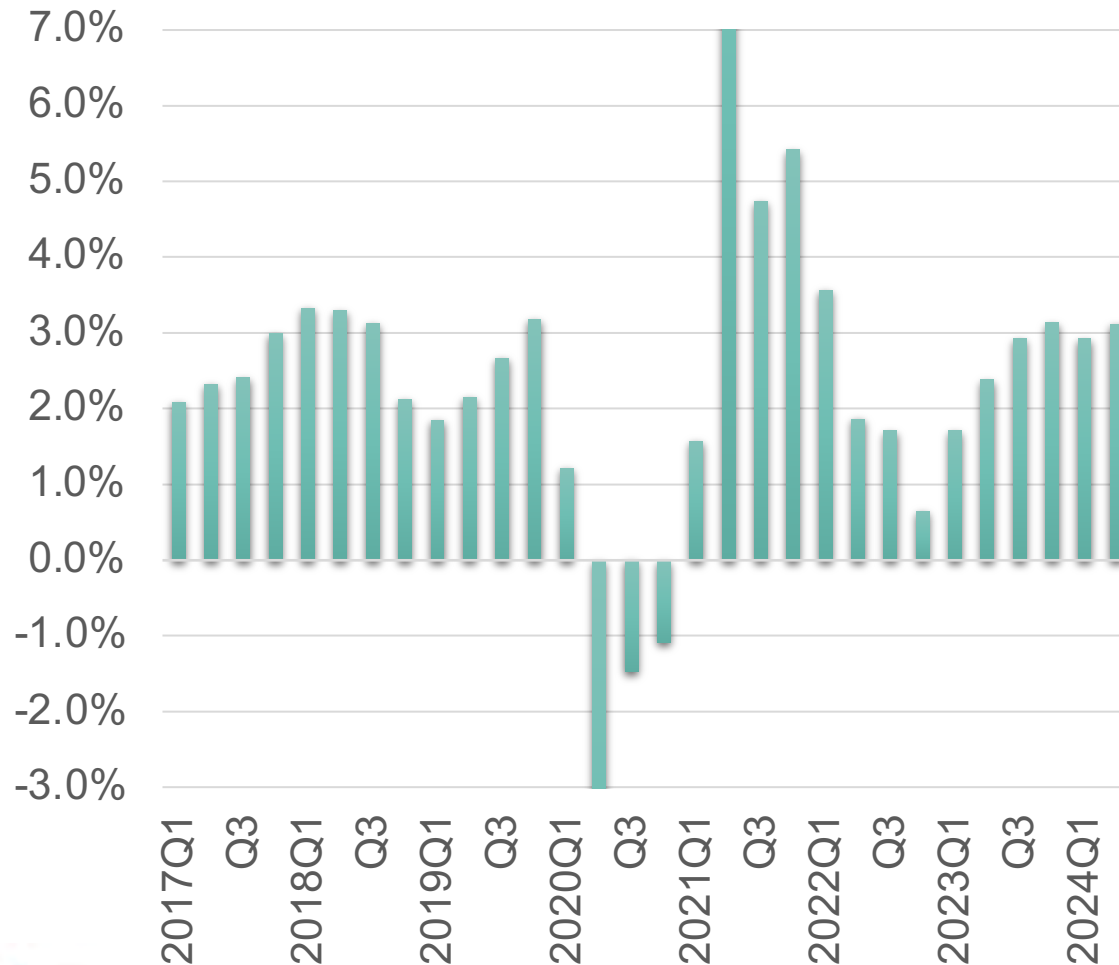
- Bubbly asset prices, yawning Federal deficits, growing external imbalances—something has to break eventually
- False narratives still driving bad policy and ugly politics



# 2024: GDP Still Growing!



## YoY Real GDP Growth



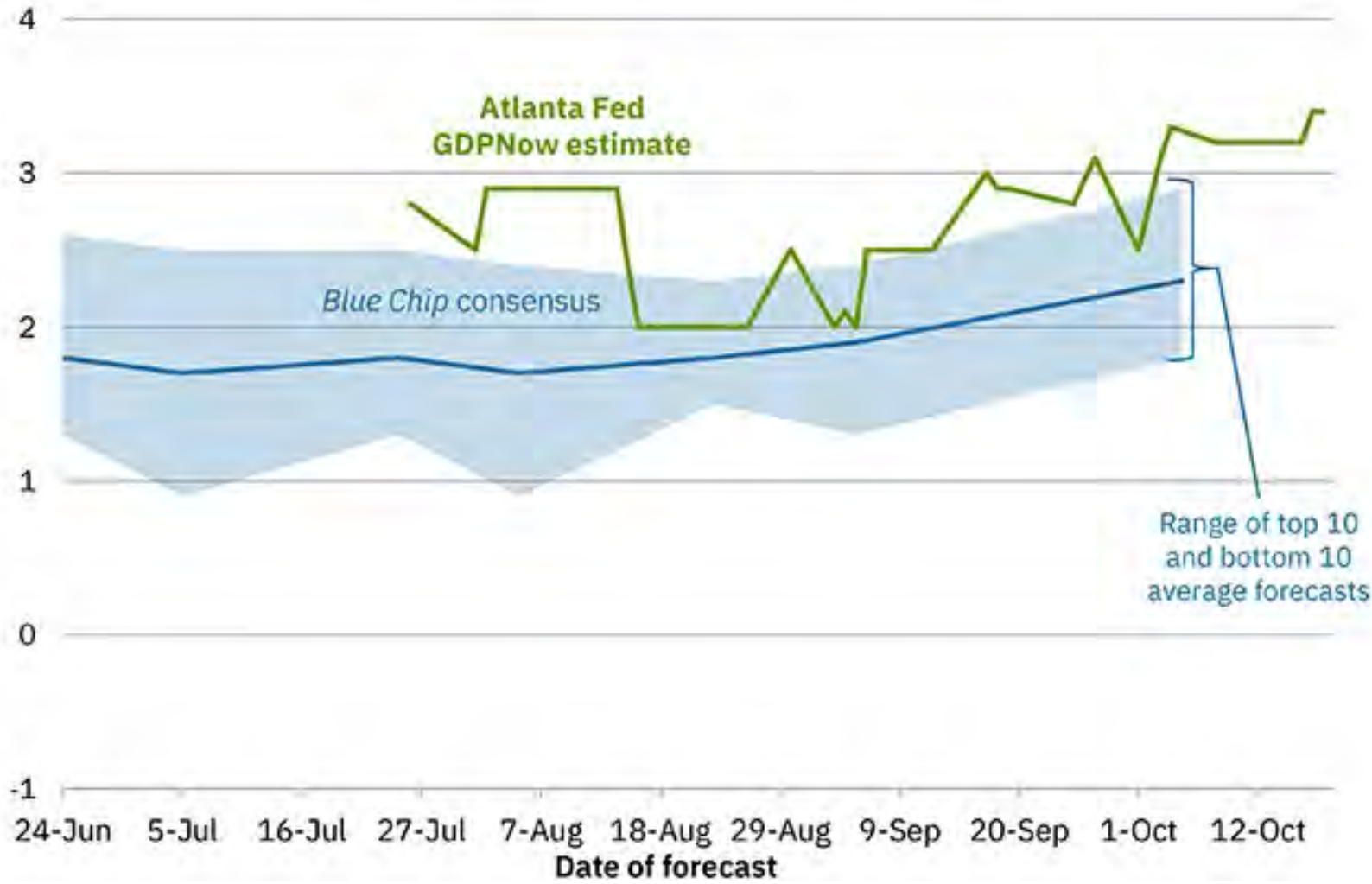
## Contributions to Real GDP Growth

	2019	2022	2023	2024 H
GDP	3.20	0.68	3.15	2.47
Final Demand	3.08	0.77	3.28	2.75
<b>Personal consumption</b>	<b>1.73</b>	<b>0.78</b>	<b>1.85</b>	<b>1.43</b>
Durable goods	0.38	0.01	0.46	0.13
Nondurable goods	0.40	-0.16	0.30	0.15
Services	0.94	0.93	1.10	1.15
<b>Fixed investment</b>	<b>0.52</b>	<b>-0.15</b>	<b>0.63</b>	<b>0.78</b>
Structures	0.20	0.03	0.47	0.07
Equipment	-0.12	0.26	-0.03	0.17
Intellectual property	0.36	0.43	0.17	0.34
Residential	0.08	-0.87	0.02	0.21
Change in inventories	-0.27	-0.29	-0.36	0.04
Net exports	0.40	0.20	0.23	-0.33
Exports	0.12	0.52	0.20	0.17
Imports	0.28	-0.32	0.02	-0.49
Government	0.82	0.13	0.79	0.55



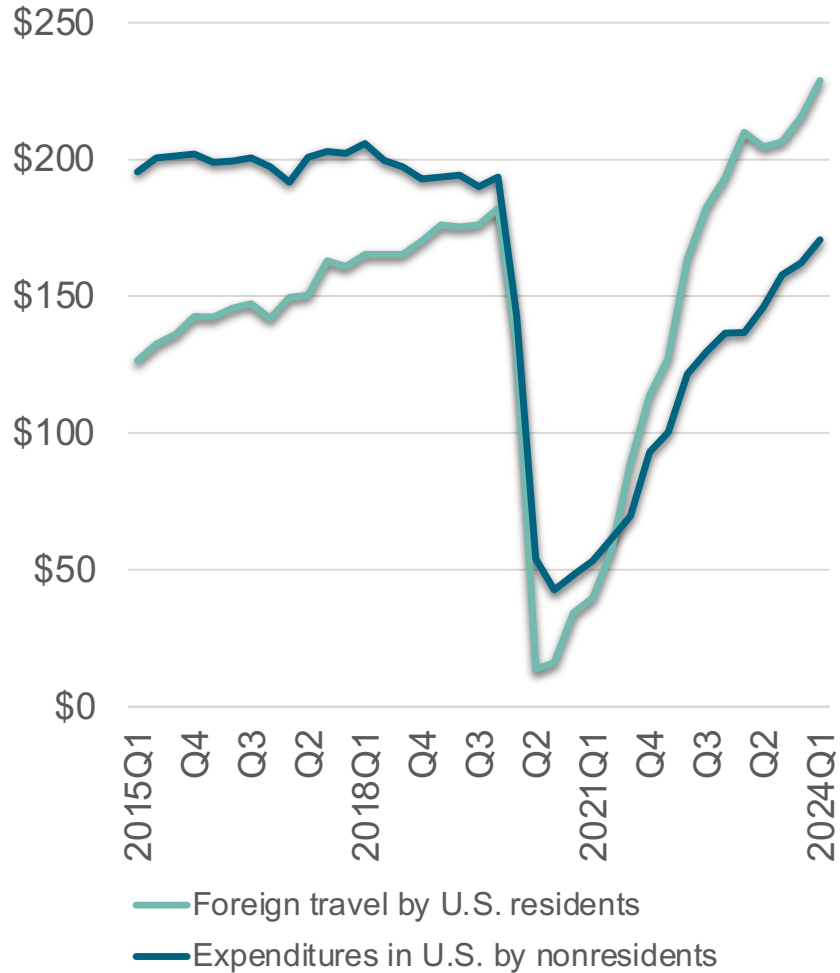
# Evolution of Atlanta Fed GDPNow real GDP estimate for 2024: Q3

Quarterly percent change (SAAR)

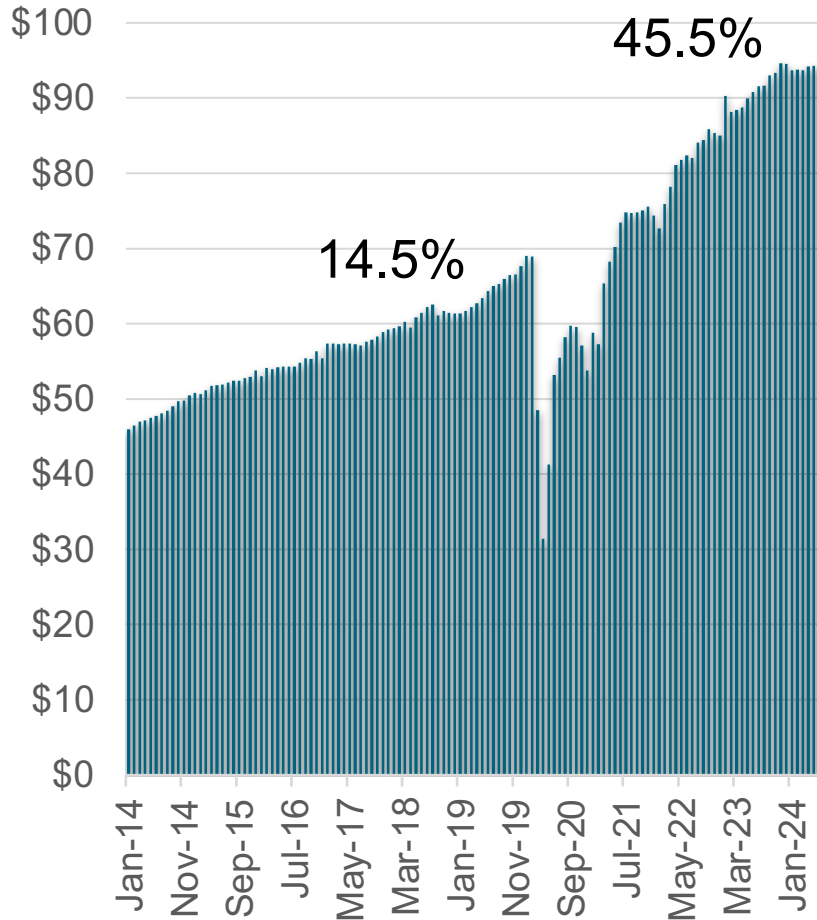


# Americans still having fun!!

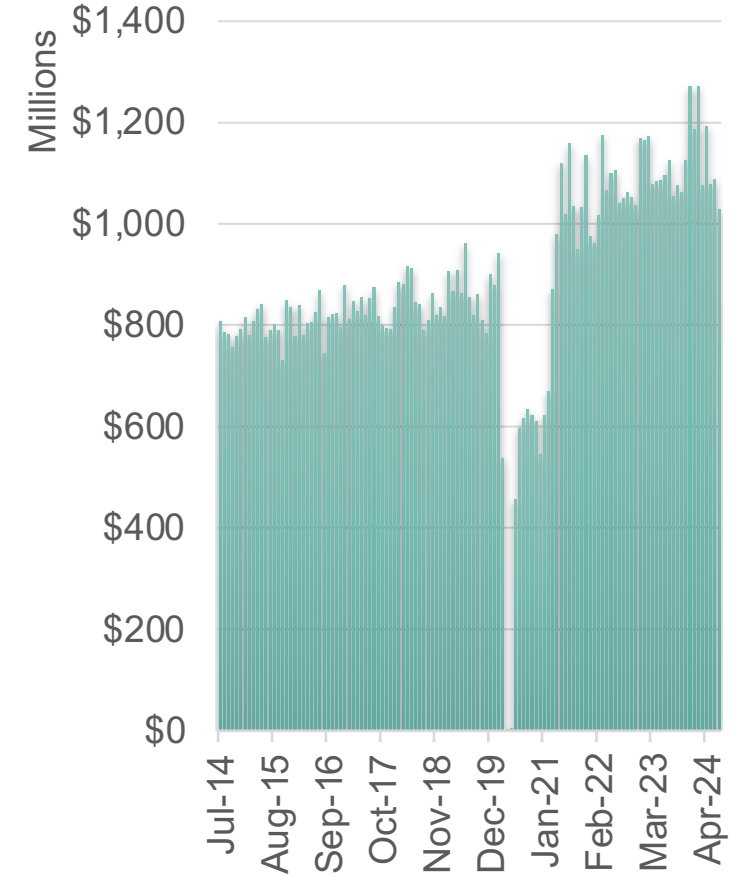
## Global Travel: Real Spending



## Retail Sales Restaurants & Bars

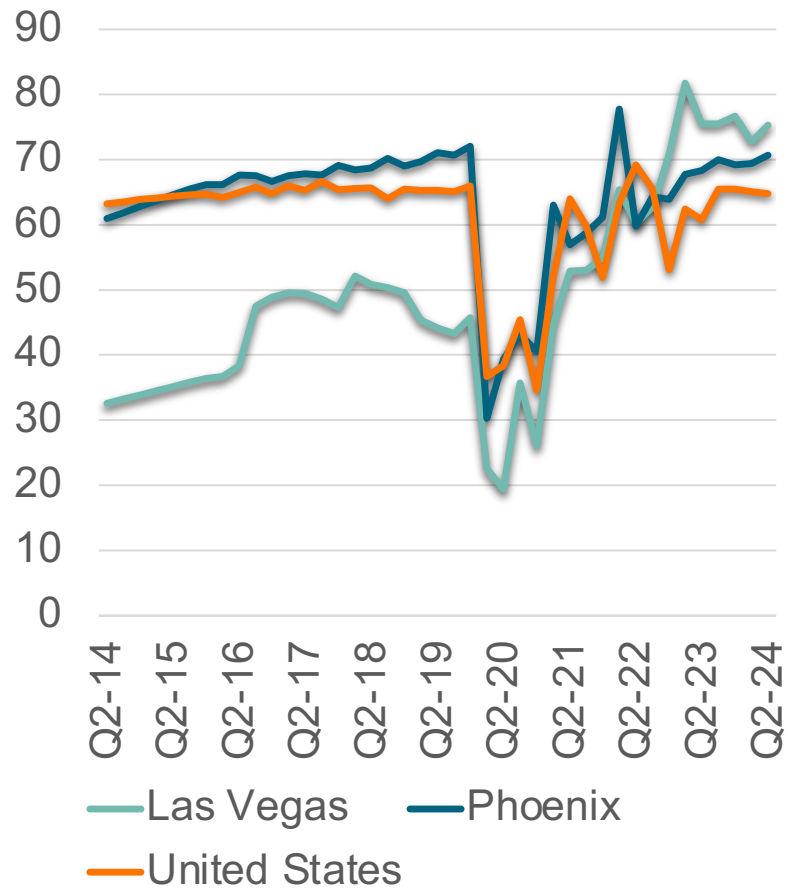


## Clark County Gaming Revenue



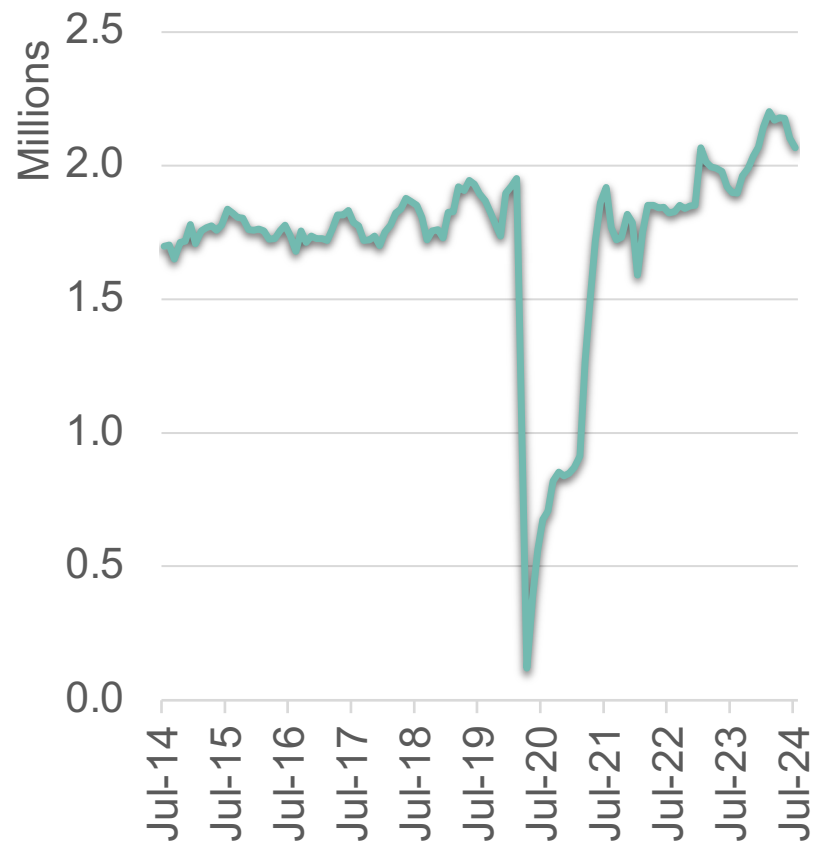
# Desert Travel: Solid Numbers

## Hotel Occupancy Rates



Location	Q2-24 (\$)	Change since Q4-19 (%)
United States	98.39	16.2
Las Vegas	135.06	103.8
Phoenix	114.98	20.3
Denver	101.40	4.5
Salt Lake City	94.30	20.1
Inland Empire	90.54	14.5
Tucson	82.10	6.6
Reno	74.04	10.8

## Phoenix Sky Harbor Passenger Traffic





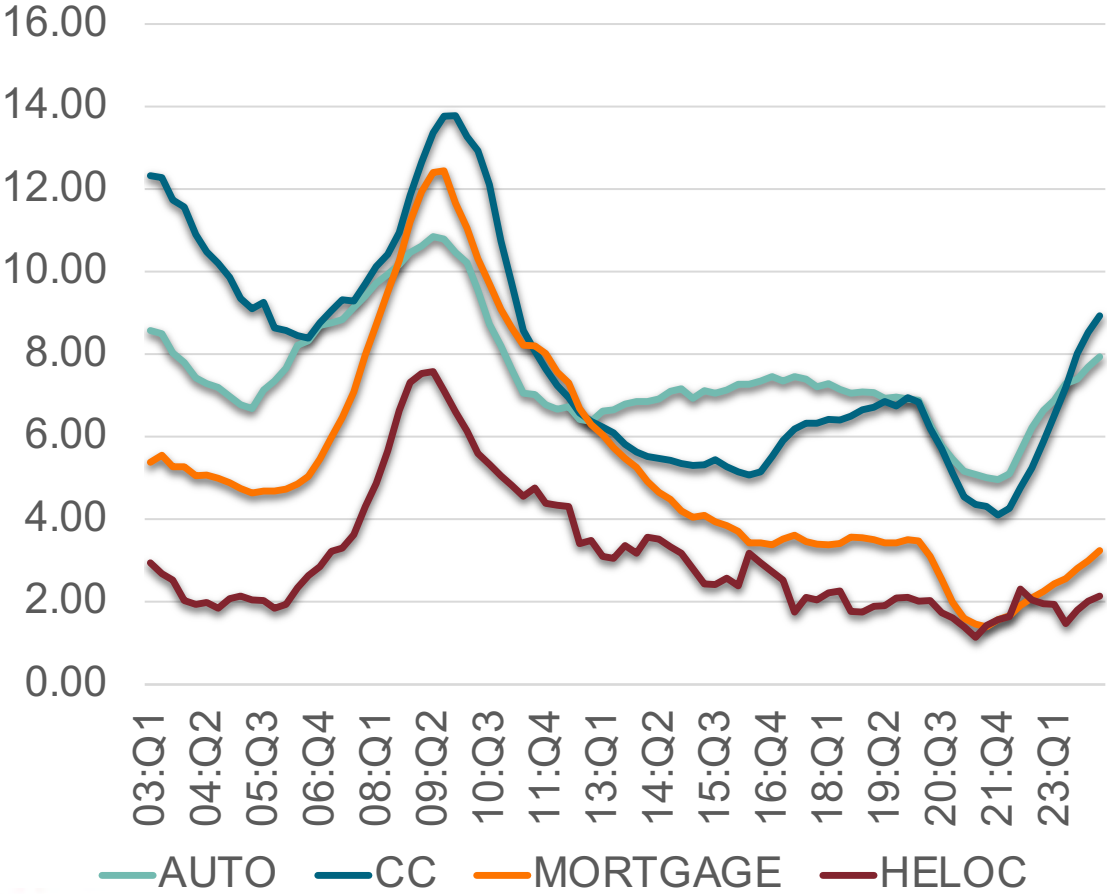
# Arizona Tourism Gross Sales through August

Sector	2024 YTD Sales	2023 YTD Sales	% Change
Lodging	\$ 3,803,176,367	\$ 3,819,261,164	-0.4%
Restaurant/Bar	\$ 14,975,993,586	\$ 14,692,608,048	1.9%
Retail	\$ 66,765,566,003	\$ 67,756,993,541	-1.5%
Amusement	\$ 1,604,212,609	\$ 1,733,378,891	-7.5%
Total	\$ 87,148,948,565	\$ 88,002,241,644	-1.0%

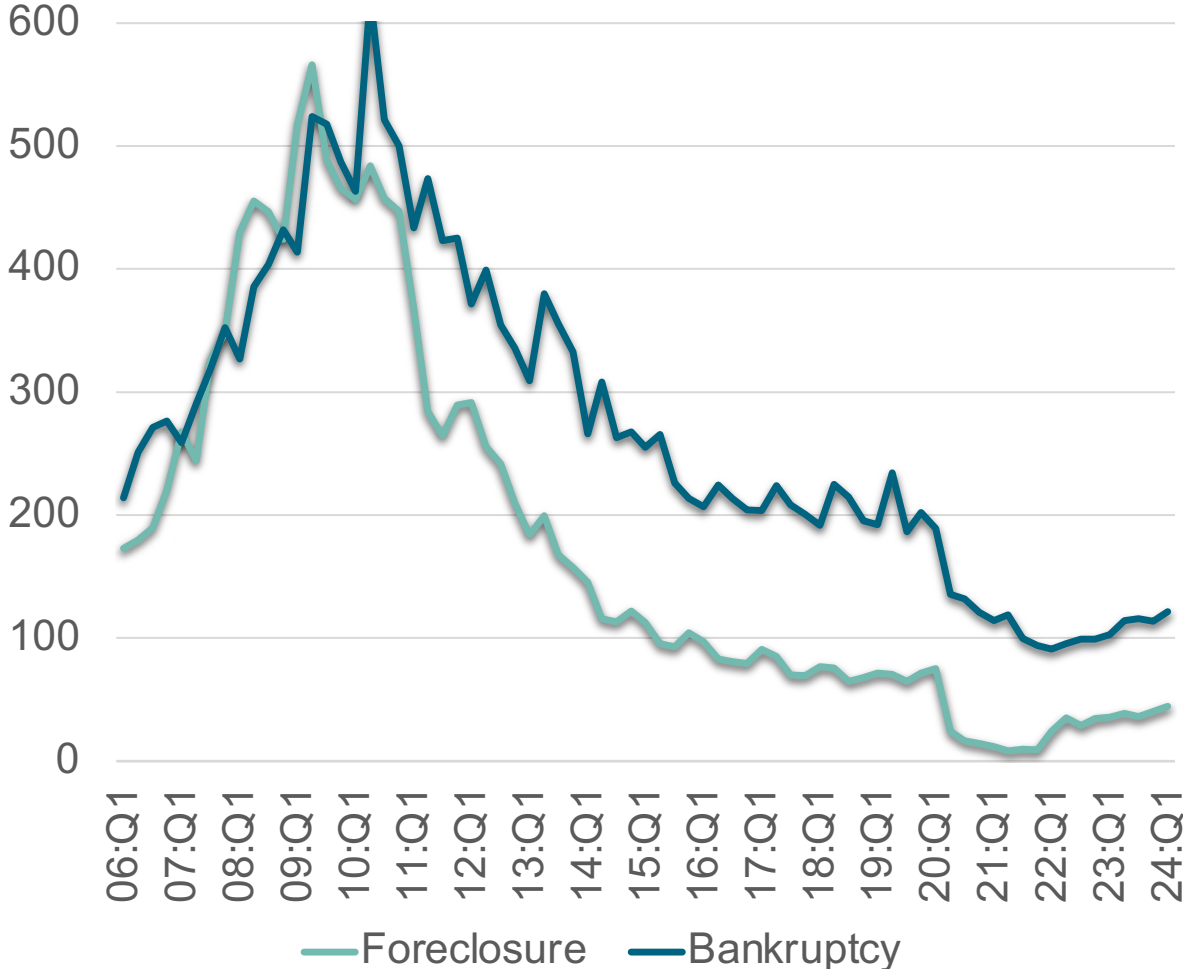


# Little topline financial distress

Transition to 30 day+ Delinquency by Debt Type (NY Fed)

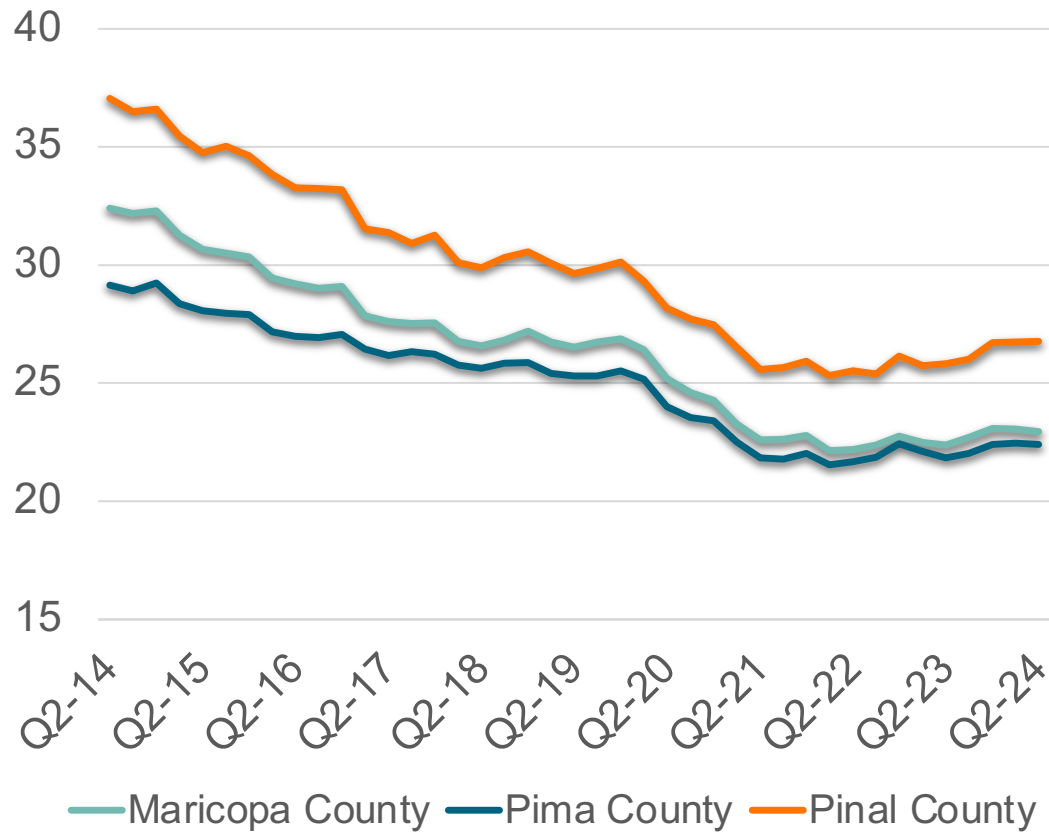


Household Defaults (000s)

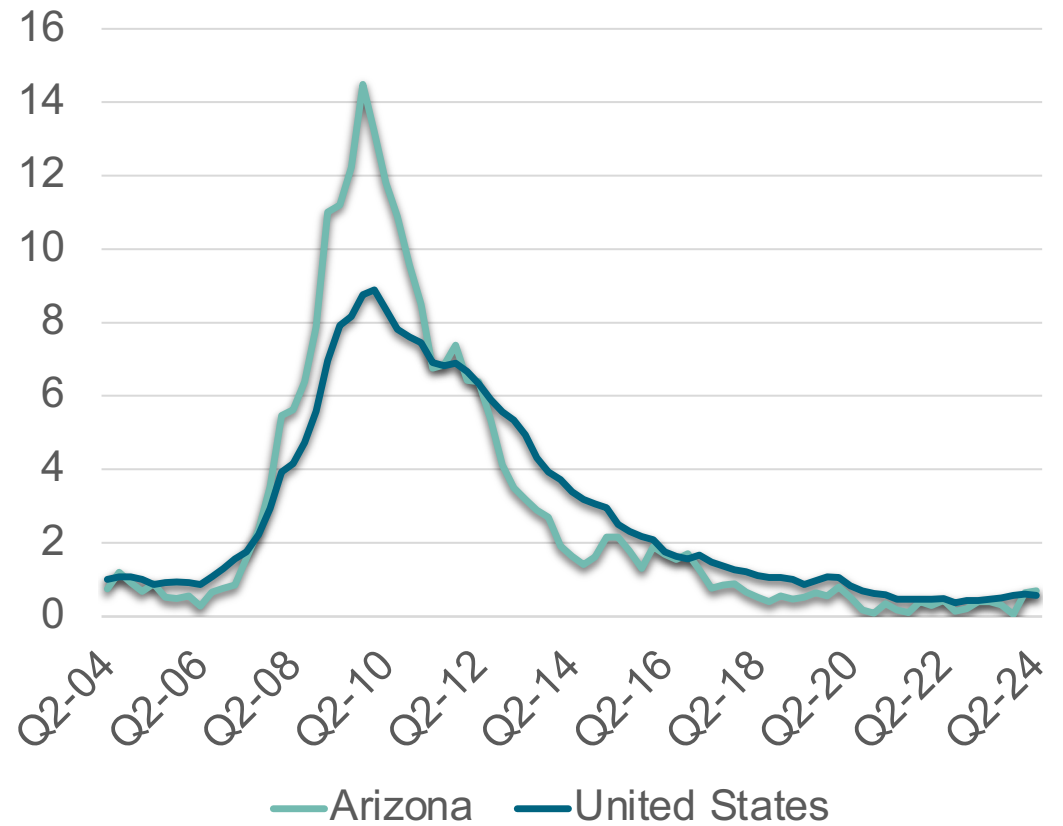


# AZ Consumer Credit

## Equifax Subprime Credit Population

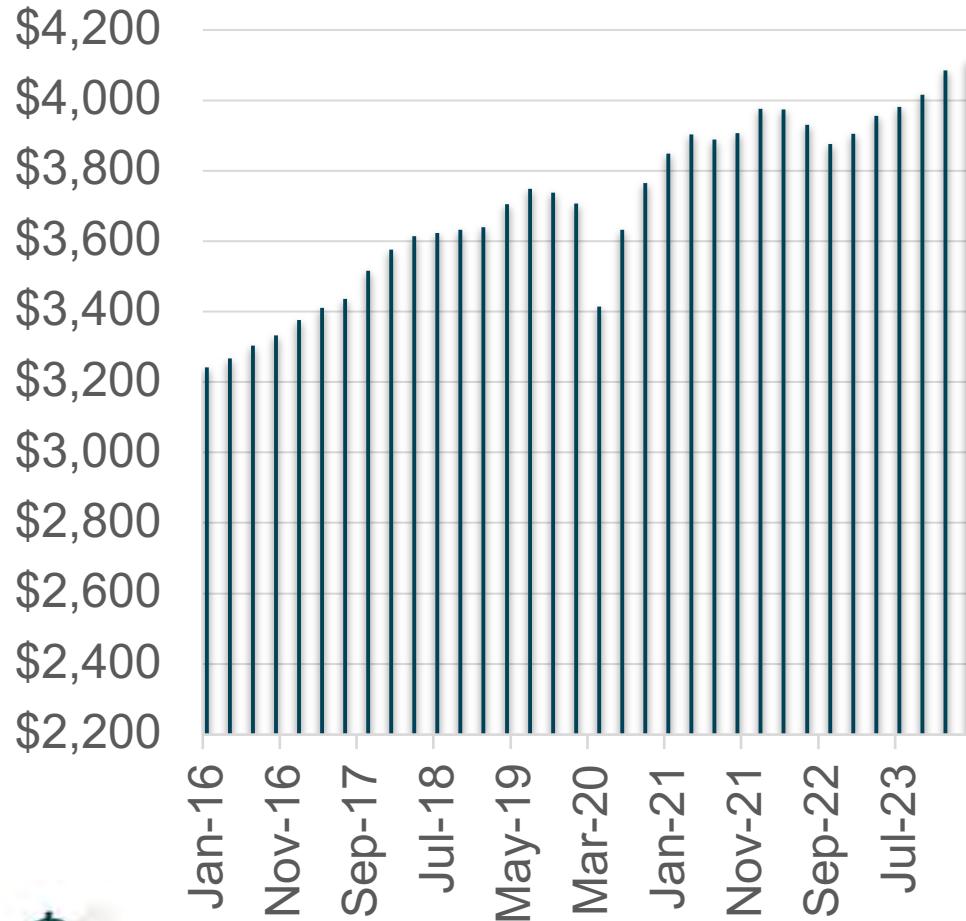


## Percent of Mortgage Debt 90+ Days Late



# Real Investment Up

**Total US Real Investment**  
\$Bil SAAR

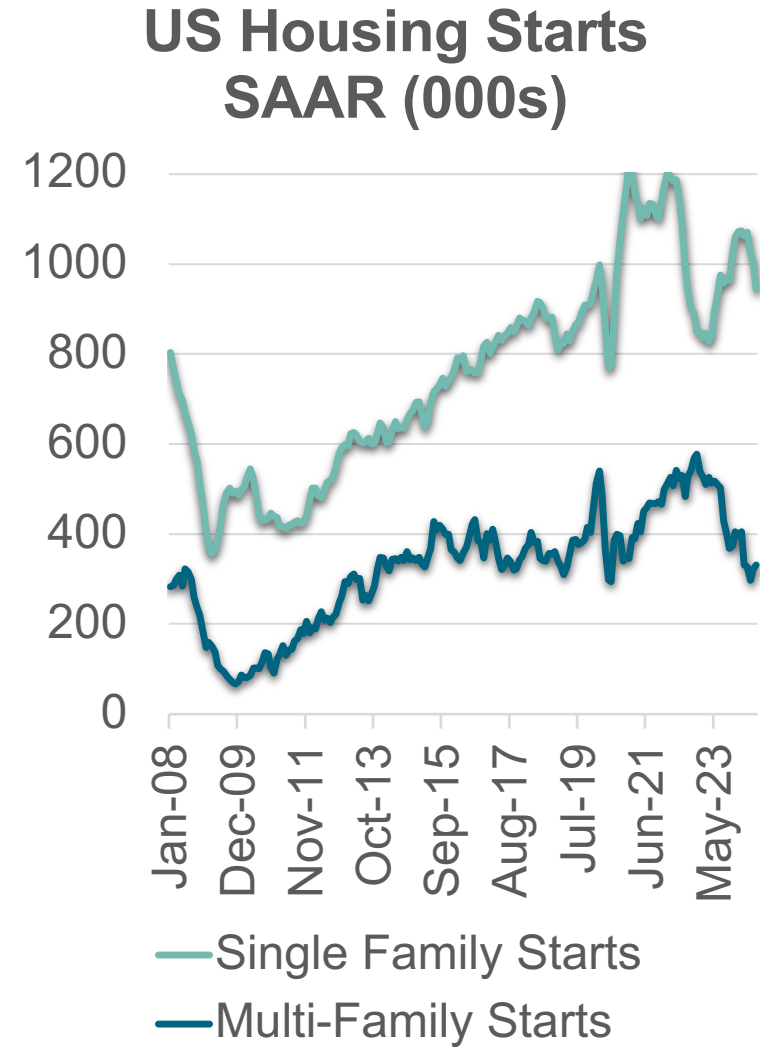
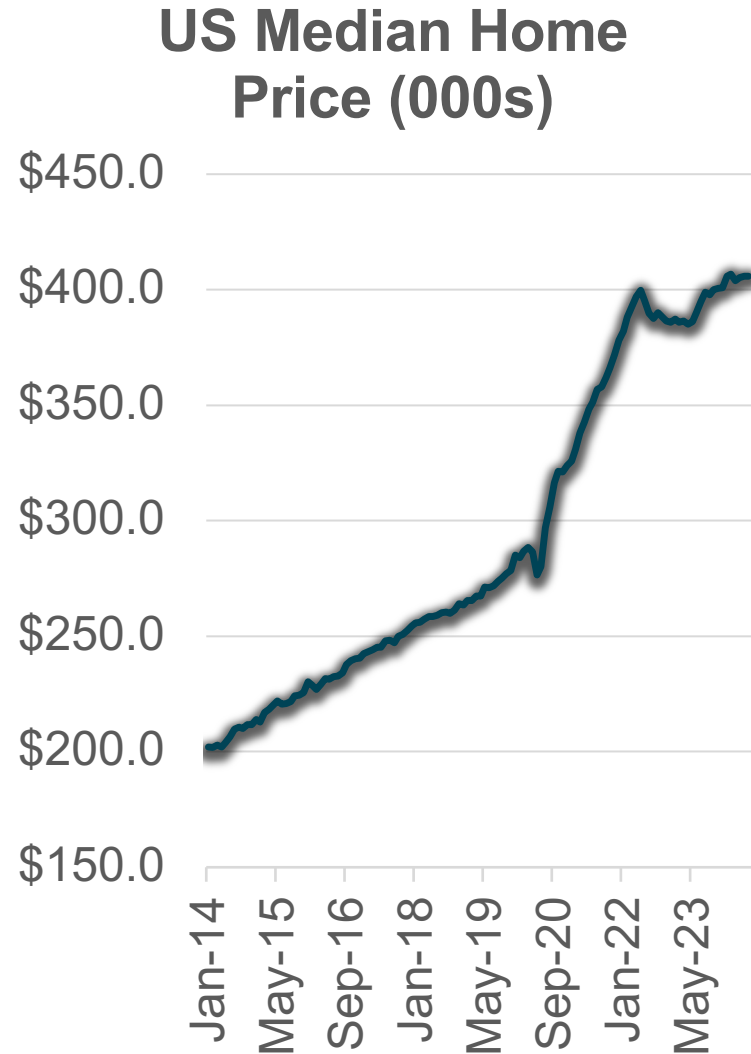
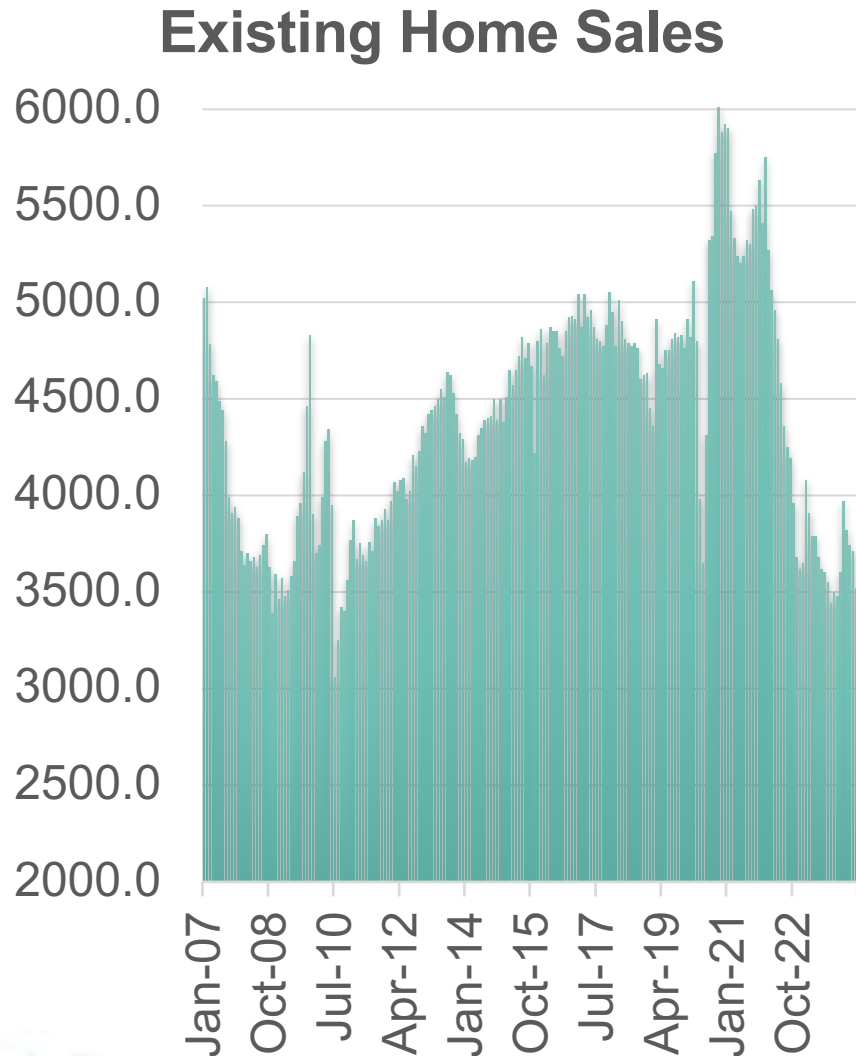


**US Real Fixed Investment**

	Q2 24	1 Year	5 Year
Private fixed investment	4120	4.2%	11.2%
Manufacturing Str	155	23.9%	111.6%
Software	776	9.0%	69.2%
Multifamily	98	-2.2%	28.6%
Research and development	615	1.8%	22.1%
Information processing eq	506	5.1%	16.3%
Single family	280	12.4%	9.1%
Entertainment, literary	93	-1.2%	4.9%
Industrial equipment	254	0.8%	-0.3%
Other structures	376	3.3%	-8.1%
Commercial and health care Str	167	-0.2%	-8.3%
Transportation equipment	272	-1.4%	-12.1%
Power and communication	110	5.2%	-12.1%

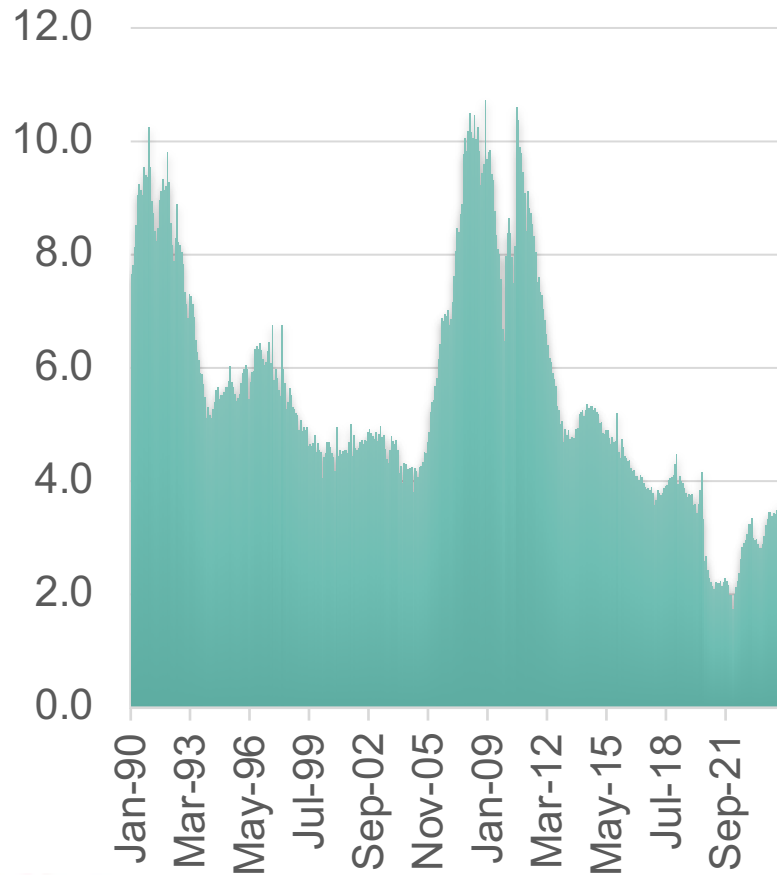


# A frozen housing market, and yet...

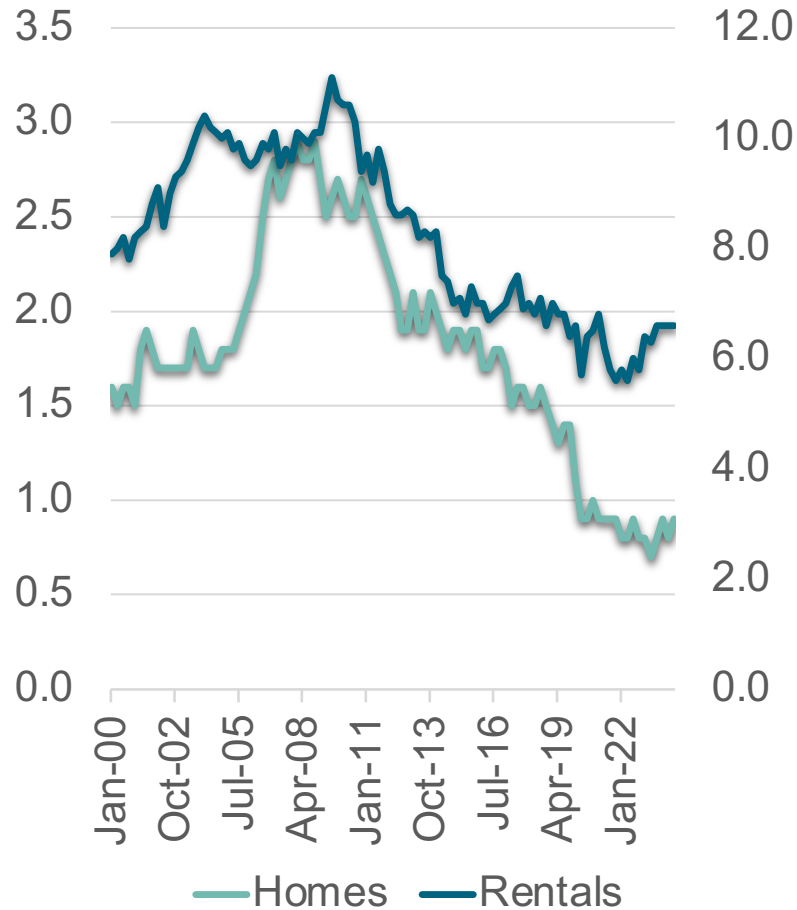


# The real issue? Low Supply

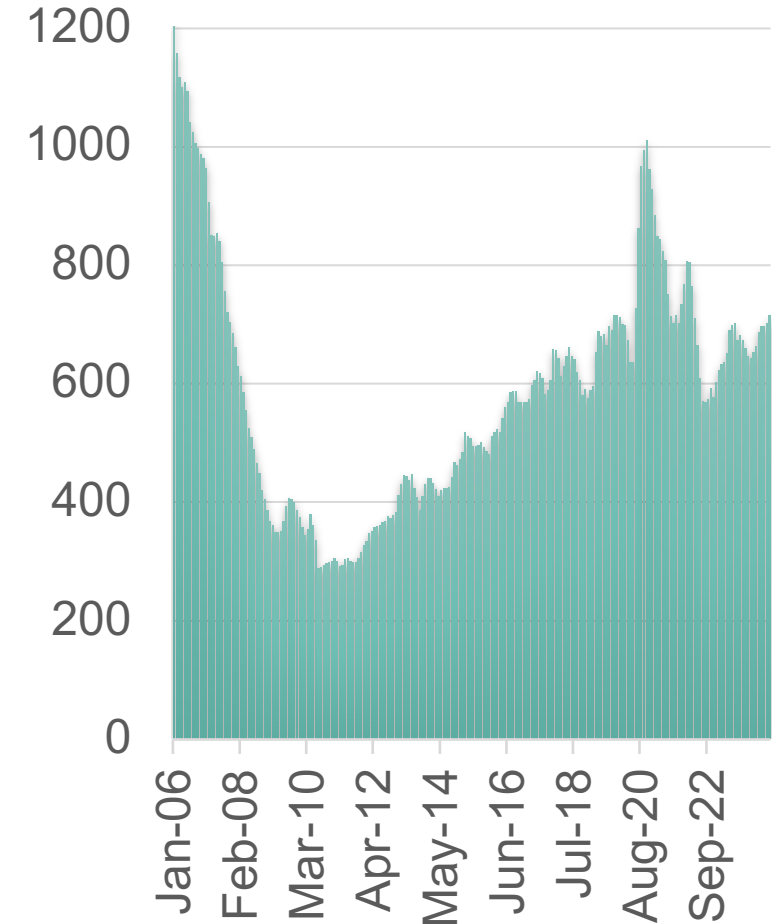
## Months Supply Existing Homes



## US Housing Vacancy Rates (%)

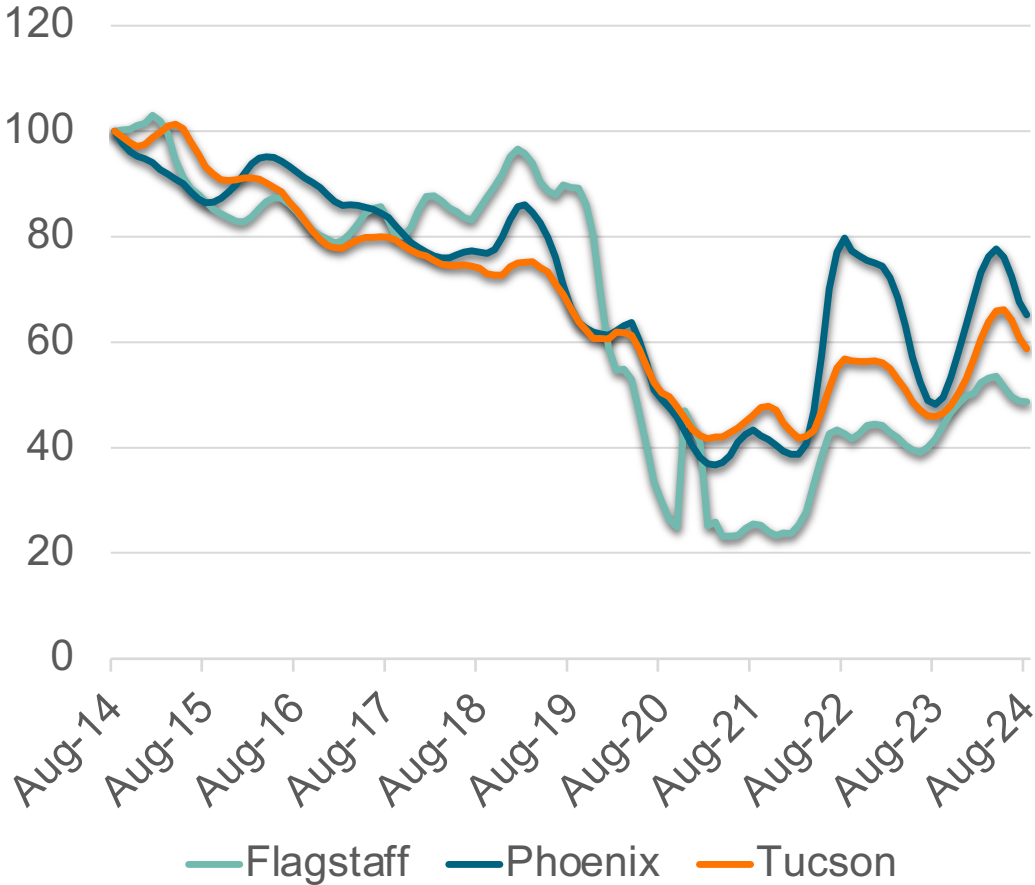


## US New Home Sales

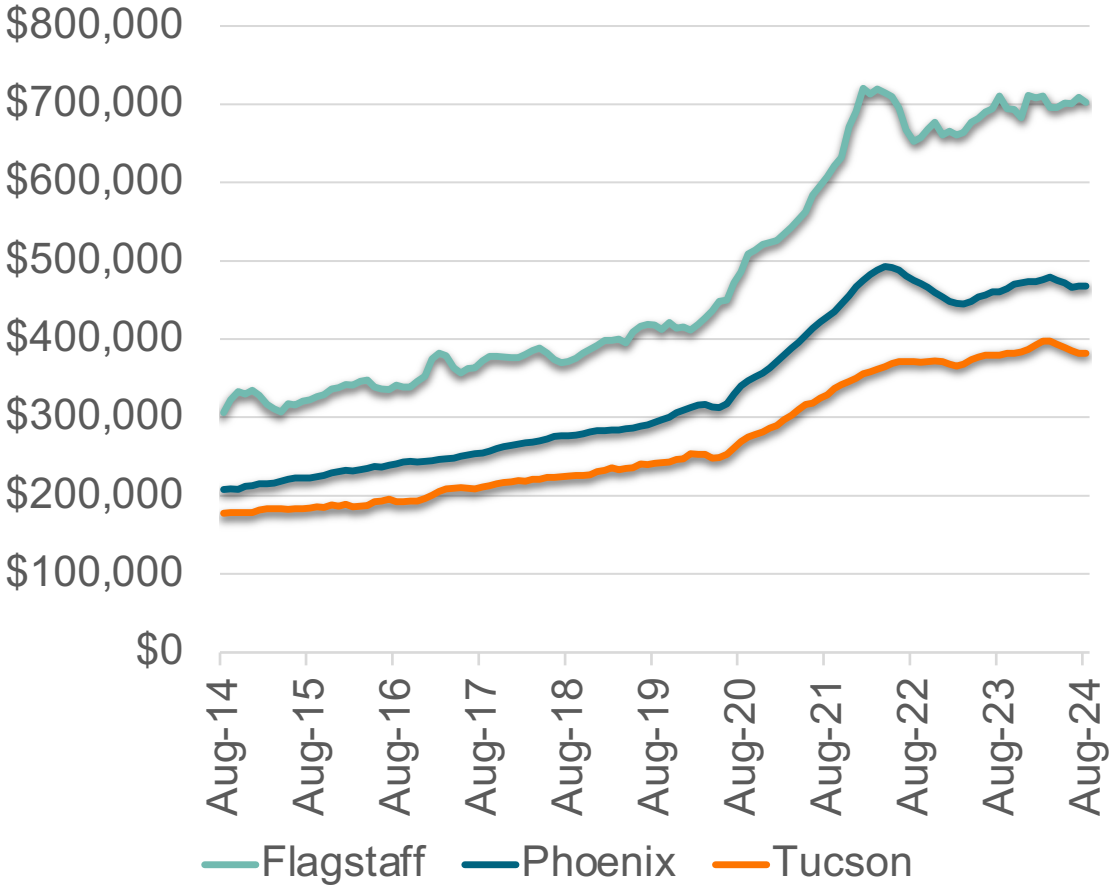


# AZ Home Inventories / Prices

### Indexed Home Inventory



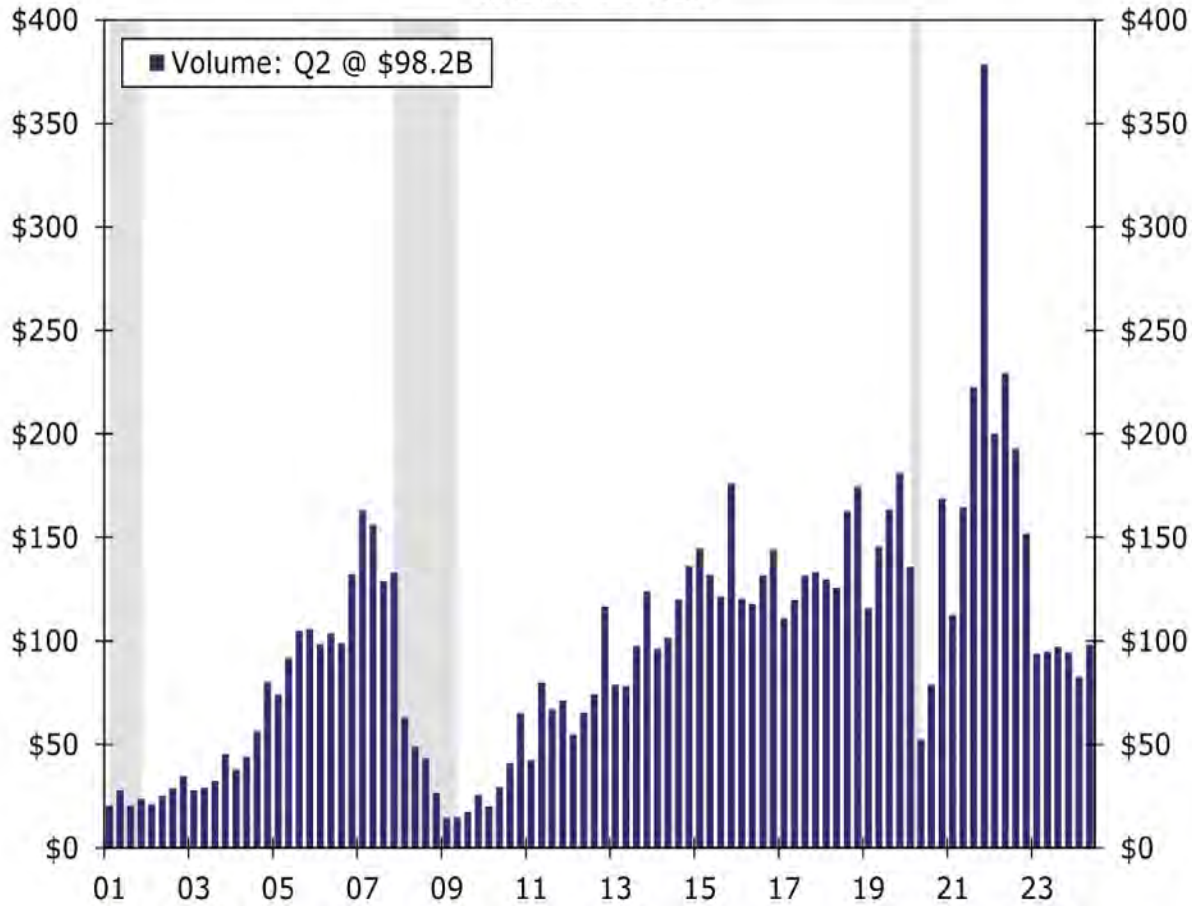
### Median Home Price



# Commercial Activity

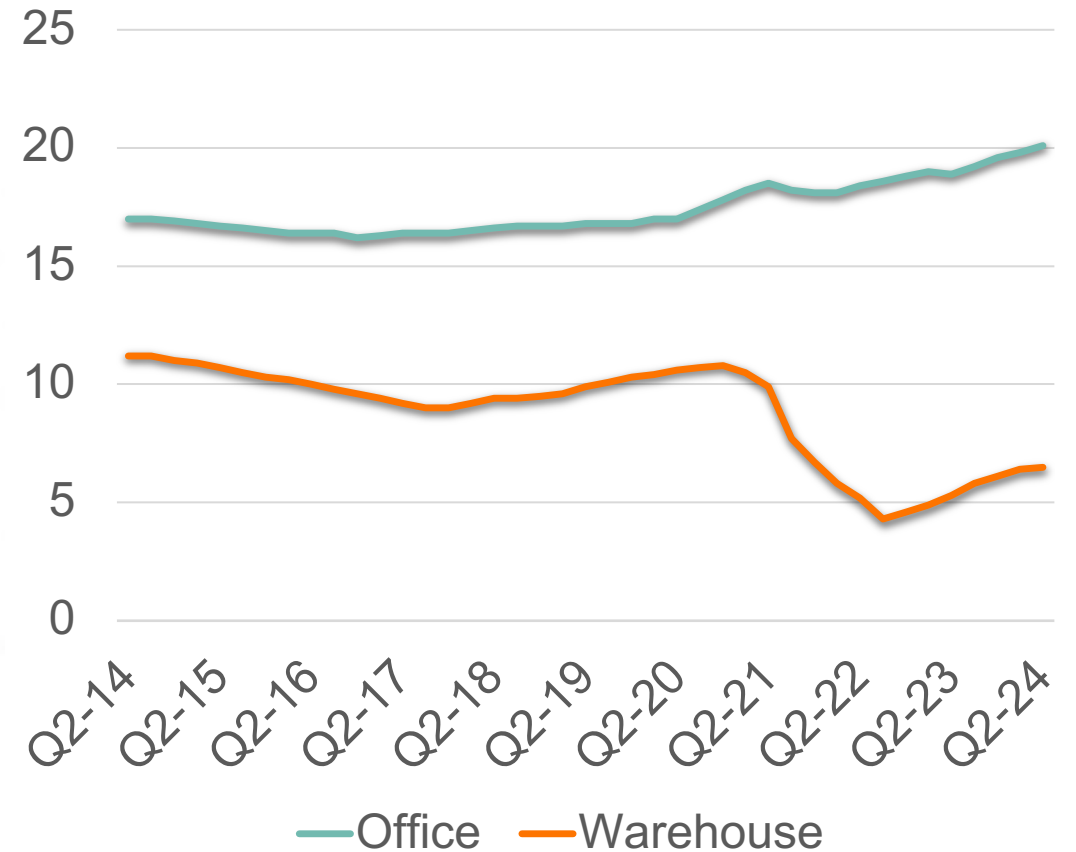
## CRE Transaction Volume

In Billions of USD



Source: CoStar Inc. and Wells Fargo Economics

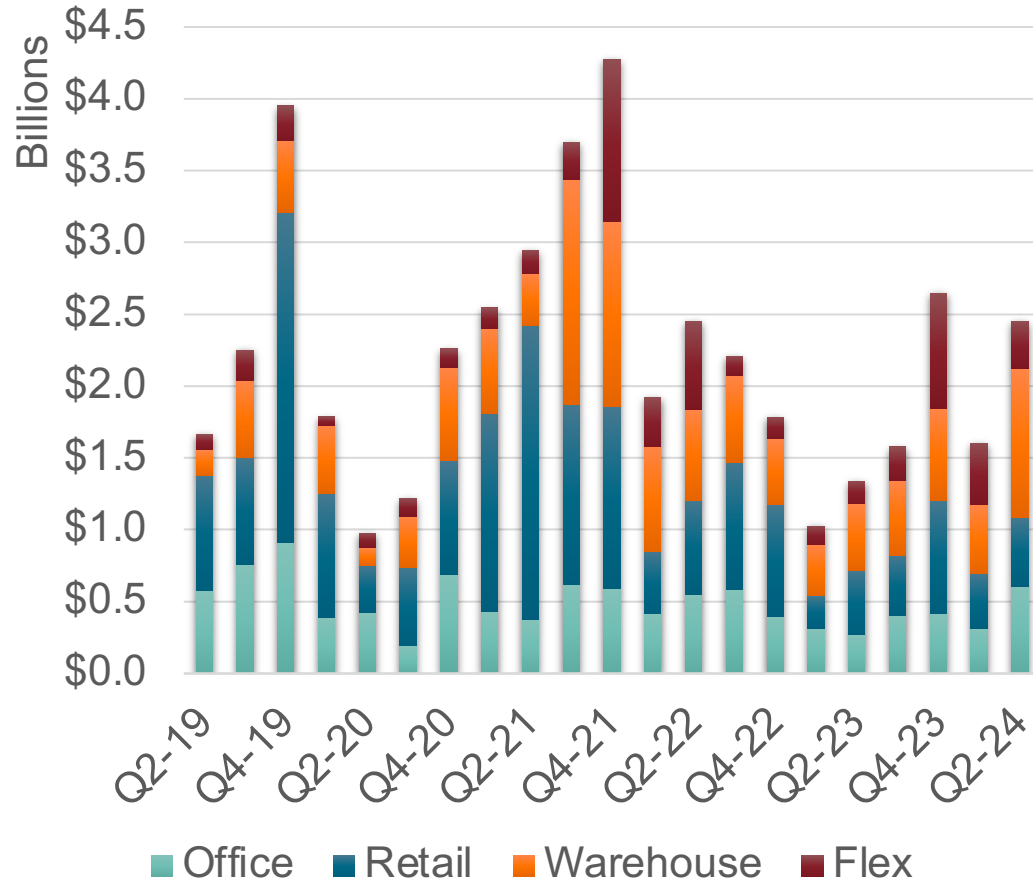
## United States Commercial Vacancy Rates



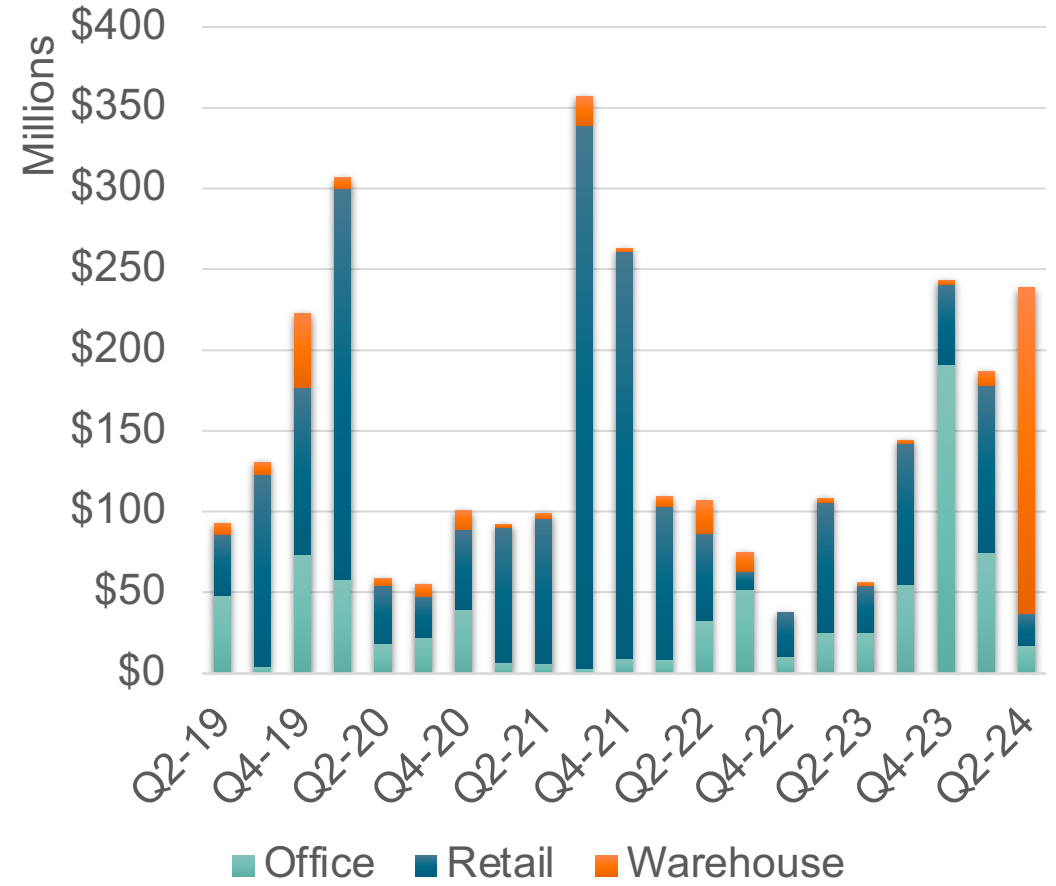


# Local Transactions

## Phoenix CRE Transactions

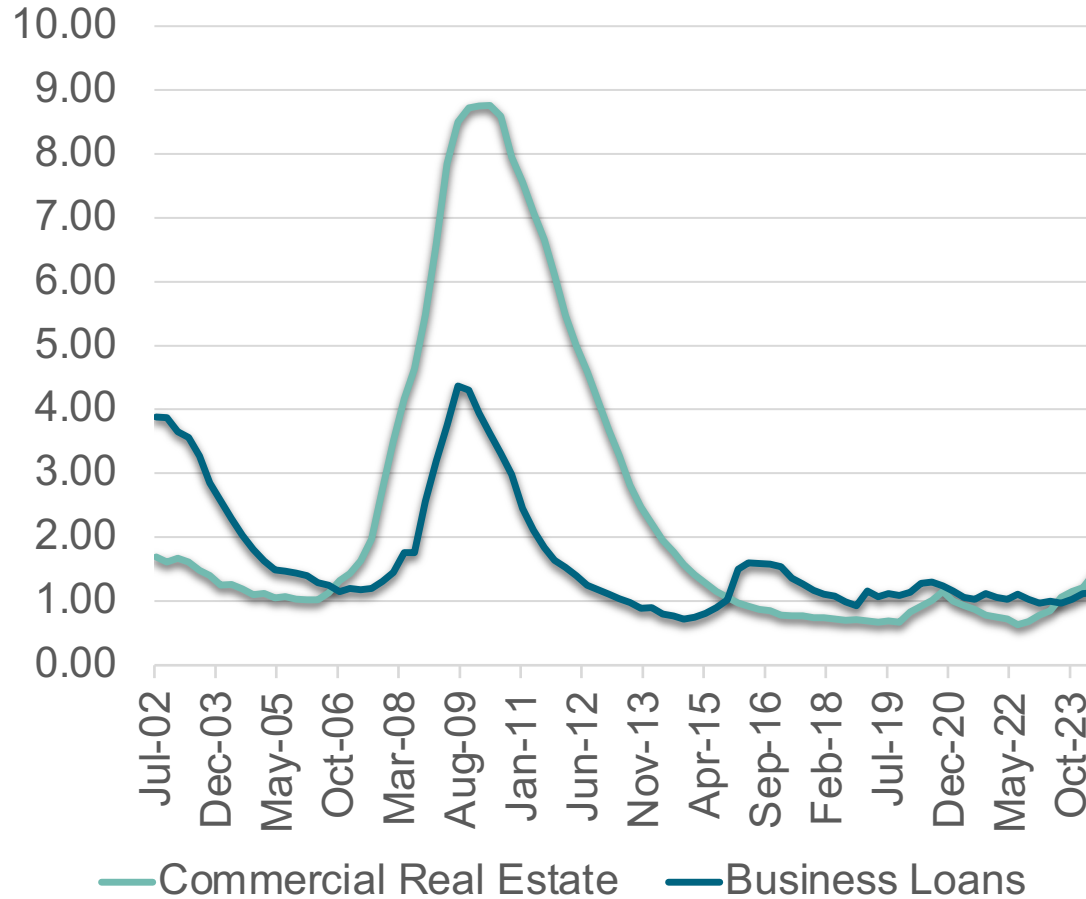


## Tucson CRE Transactions

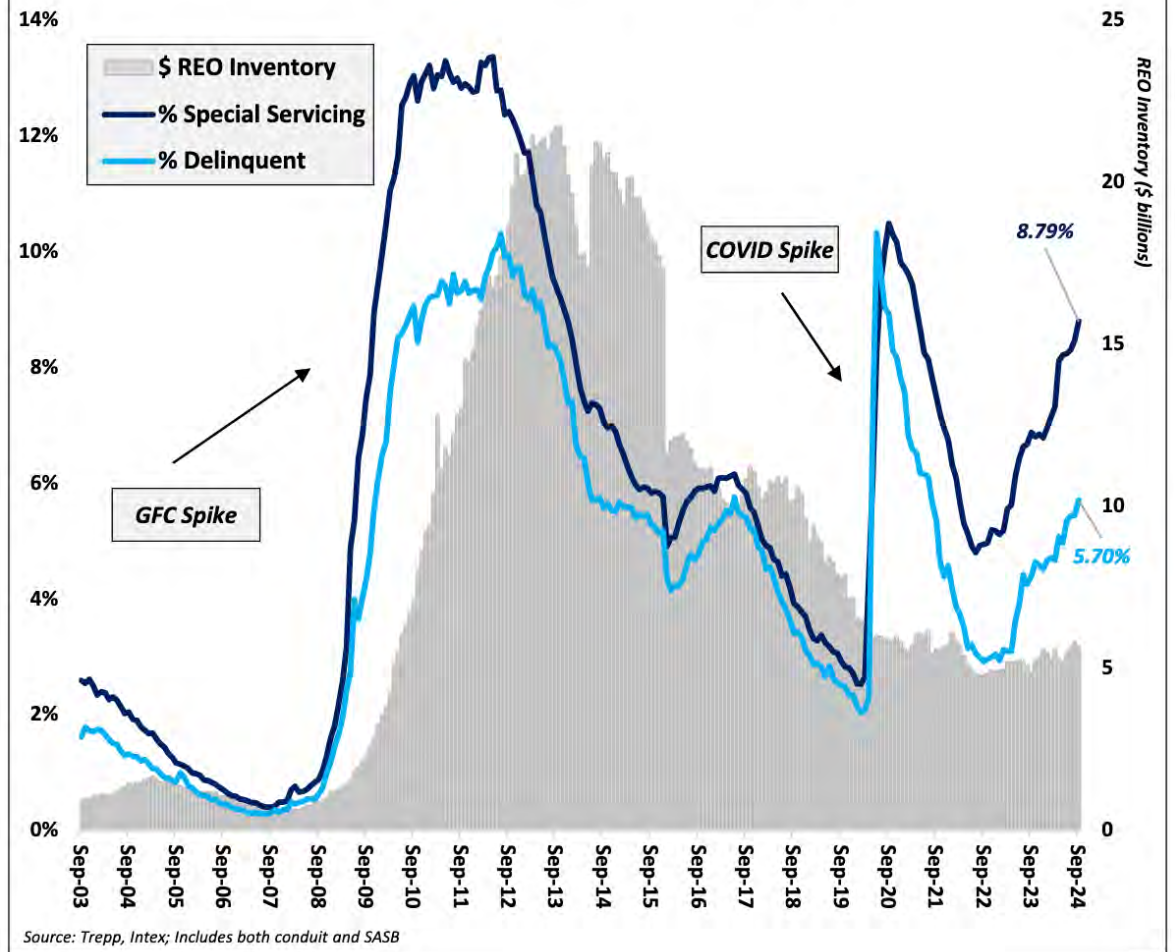


# Modest Increases in Distress

## Commercial Bank Delinquencies



## CMBS Delinquency and Special Servicing



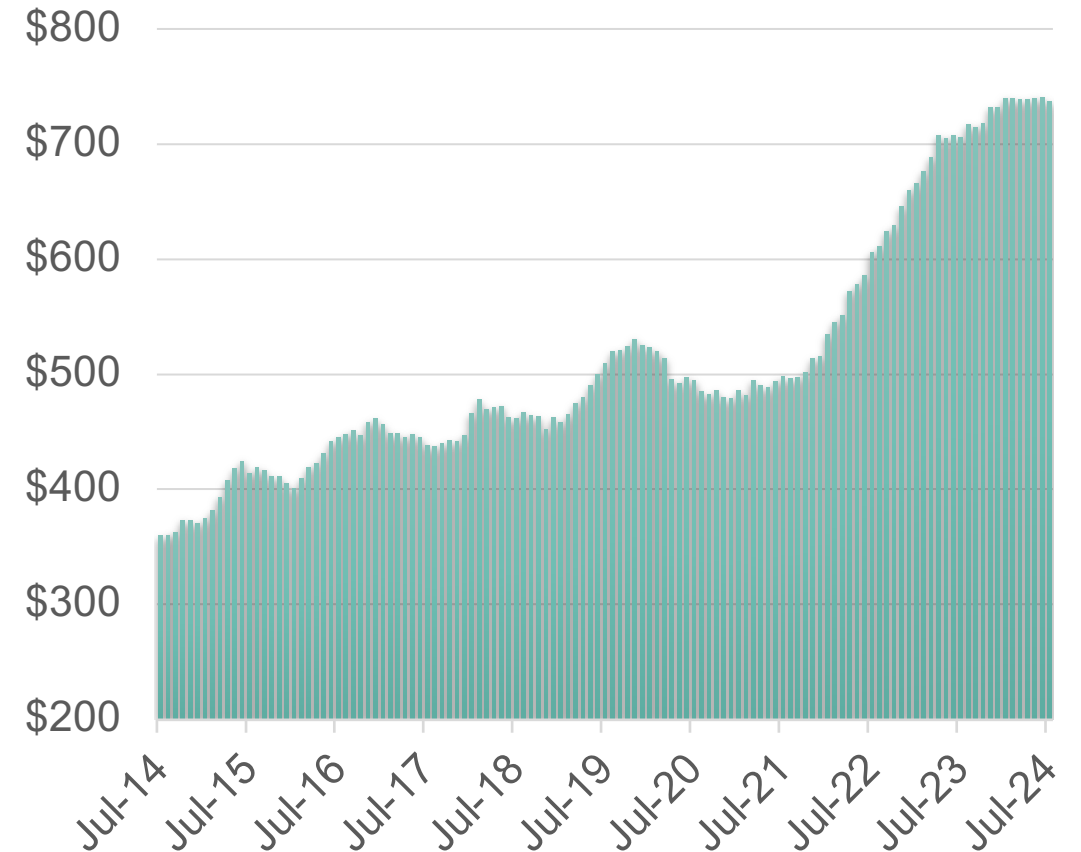
Source: Trepp, Intex; Includes both conduit and SASB



# Non-Res Construction Spending

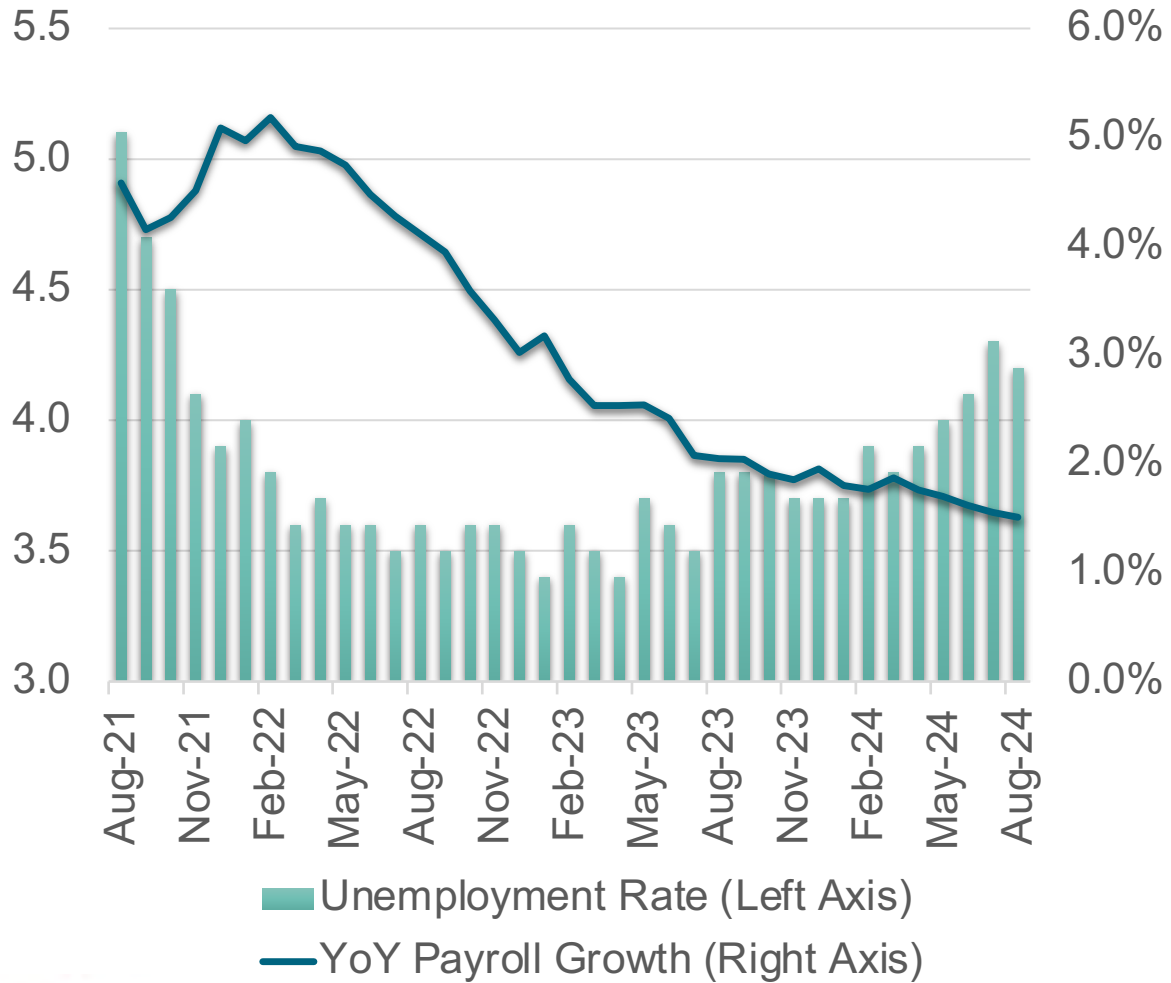
Type	Jul-24 (\$ Mil.)	1-Year Chg. (%)	5-Year Chg. (%)
Nonresidential	737,154	4.5	44.8
Manufacturing	236,074	20.2	188.8
Power	122,572	8.8	6.6
Commercial	119,359	-14.8	47.8
Office	83,546	1.9	3.6
Health Care	52,548	1.7	41.7
Communication	27,536	-0.1	26.7
Educational	24,191	5.2	10.8
Lodging	22,587	-9.2	-31.5
Transportation	22,332	9.0	33.6
Amusement & Rec.	18,432	-3.9	21.3
Religious	3,878	4.4	-0.5

U.S. Private Nonresidential Construction Spending (\$Bil)

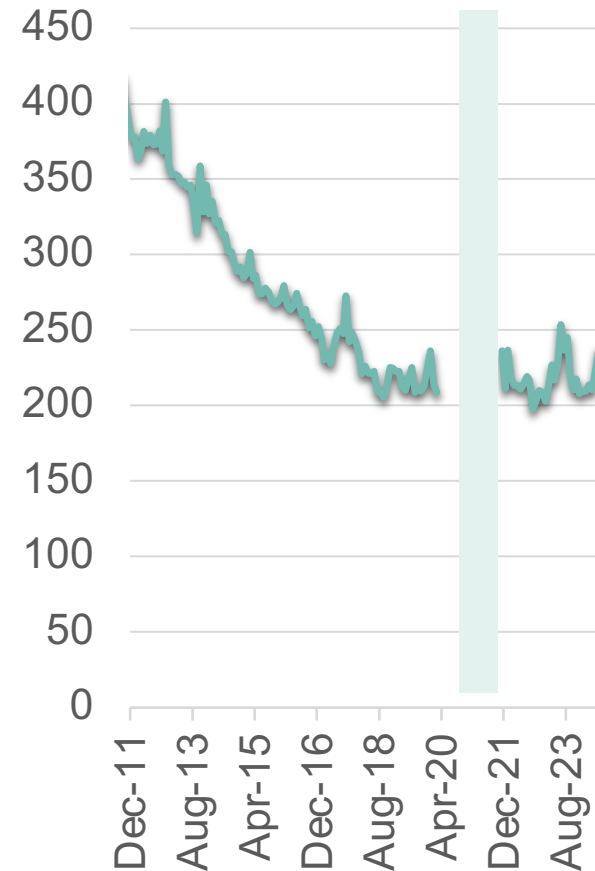


# Labor Market Blues?

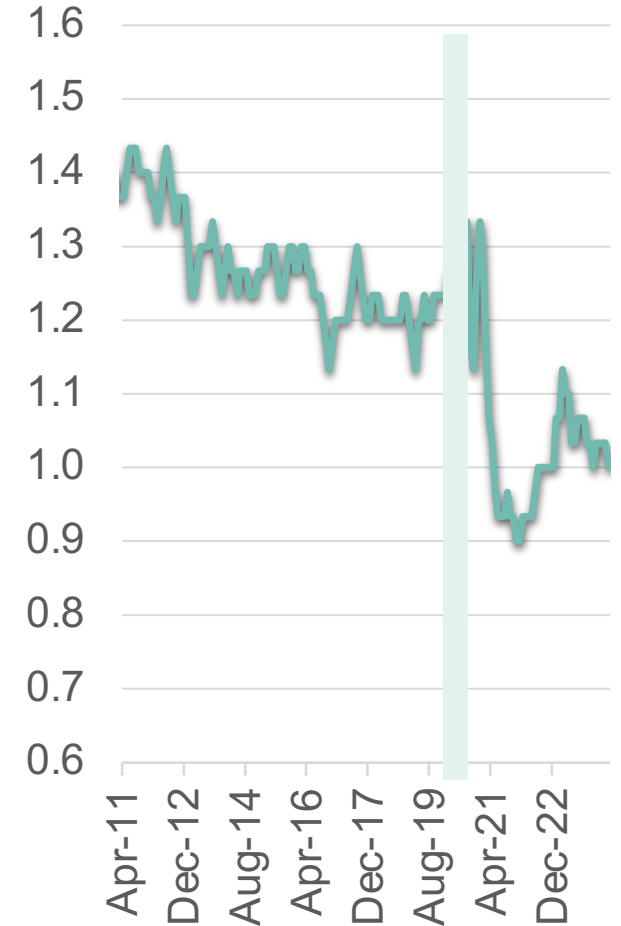
## US Labor Markets



## Initial Claims for Unemployment Insurance 000s



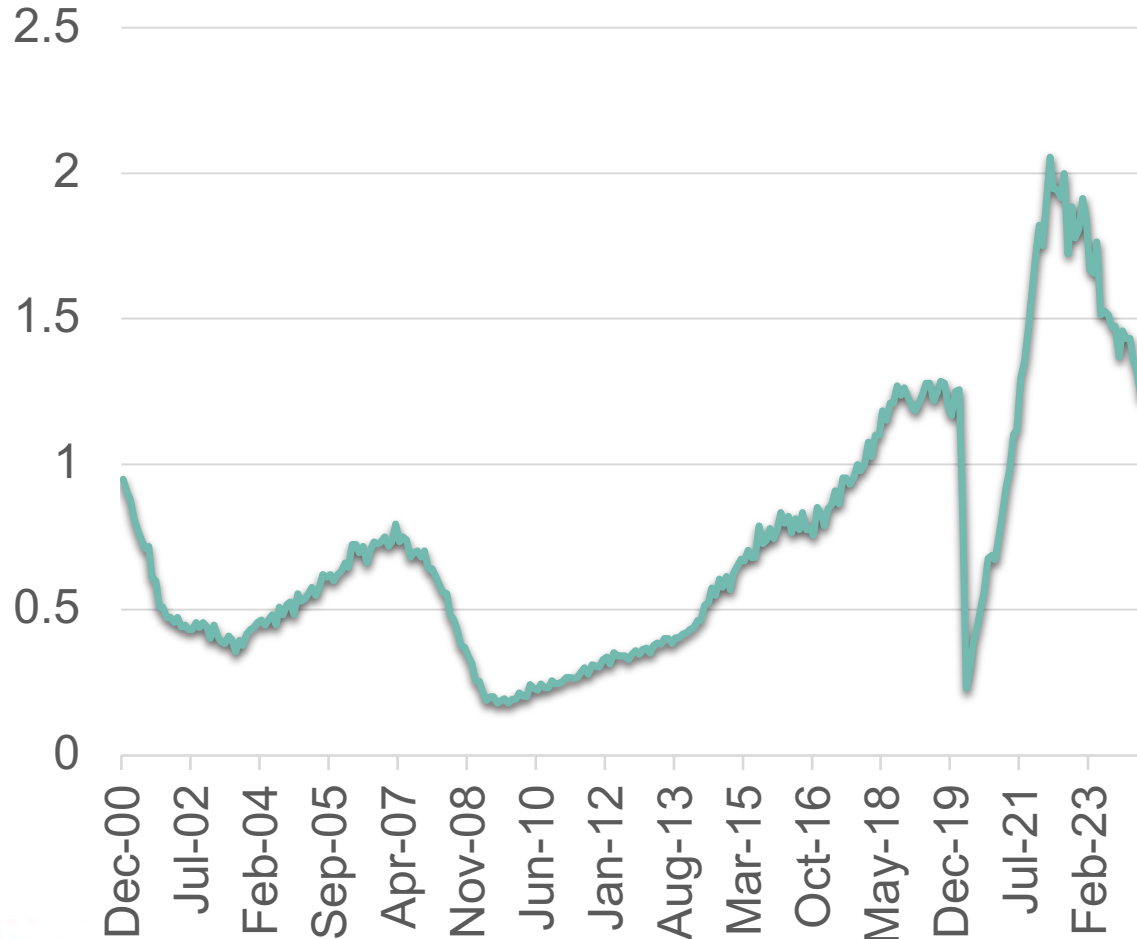
## Layoffs and Firings (Rate, SA, BLS)



# Tight Markets = Rising Wages



## Job Openings / Unemployed



## Hourly Wage Growth (YoY) *Inflation Adjusted*



# And Inequality?

YoY Growth Nominal Earnings



Real Median Net Worth for US Households in 2022 (\$thousands) and Growth Rate 2013-2022 By Percentile of income		
Less 20	\$17	119%
20–39.9	\$55	94%
40–59.9	\$171	118%
60–79.9	\$299	48%
80–89.9	\$793	107%
90–100	\$2,651	84%



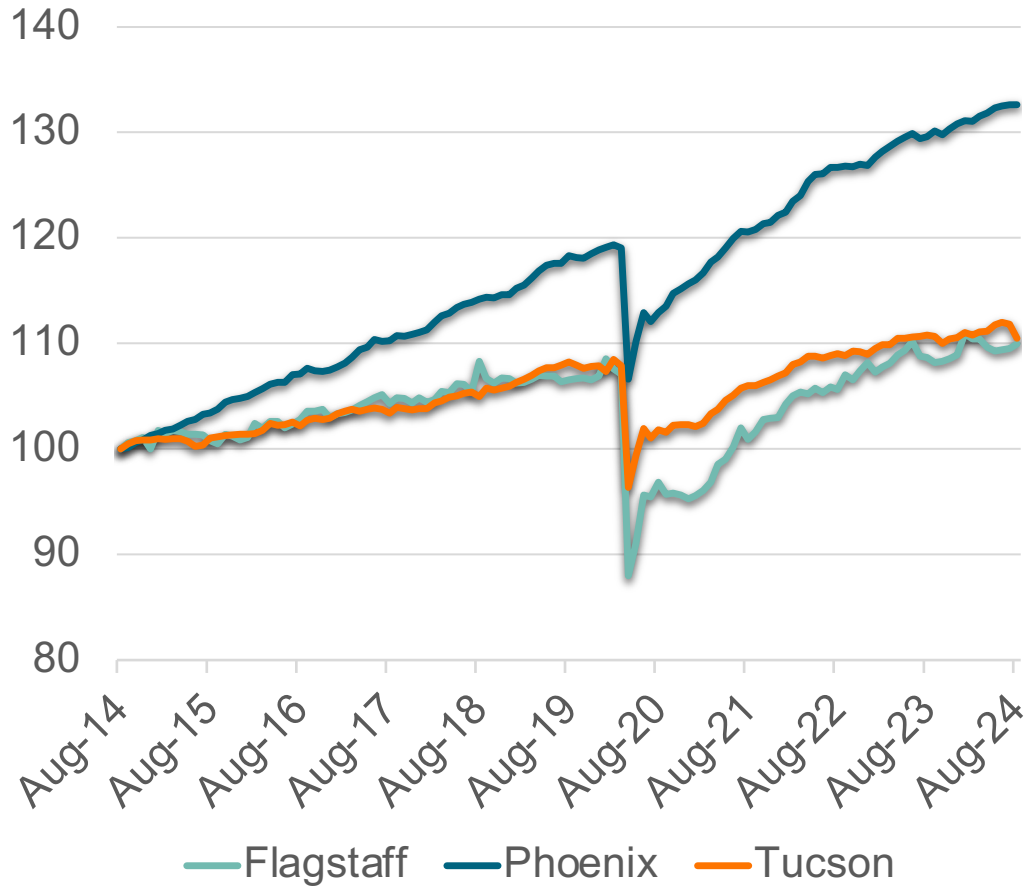
## 10 Year Wage Growth

<b>Lowest quartile</b>	<b>57.6%</b>
<b>2nd quartile</b>	<b>48.0%</b>
<b>3rd quartile</b>	<b>45.2%</b>
<b>Highest quartile</b>	<b>40.8%</b>



# State Non-farm Employment

Indexed Nonfarm Employment



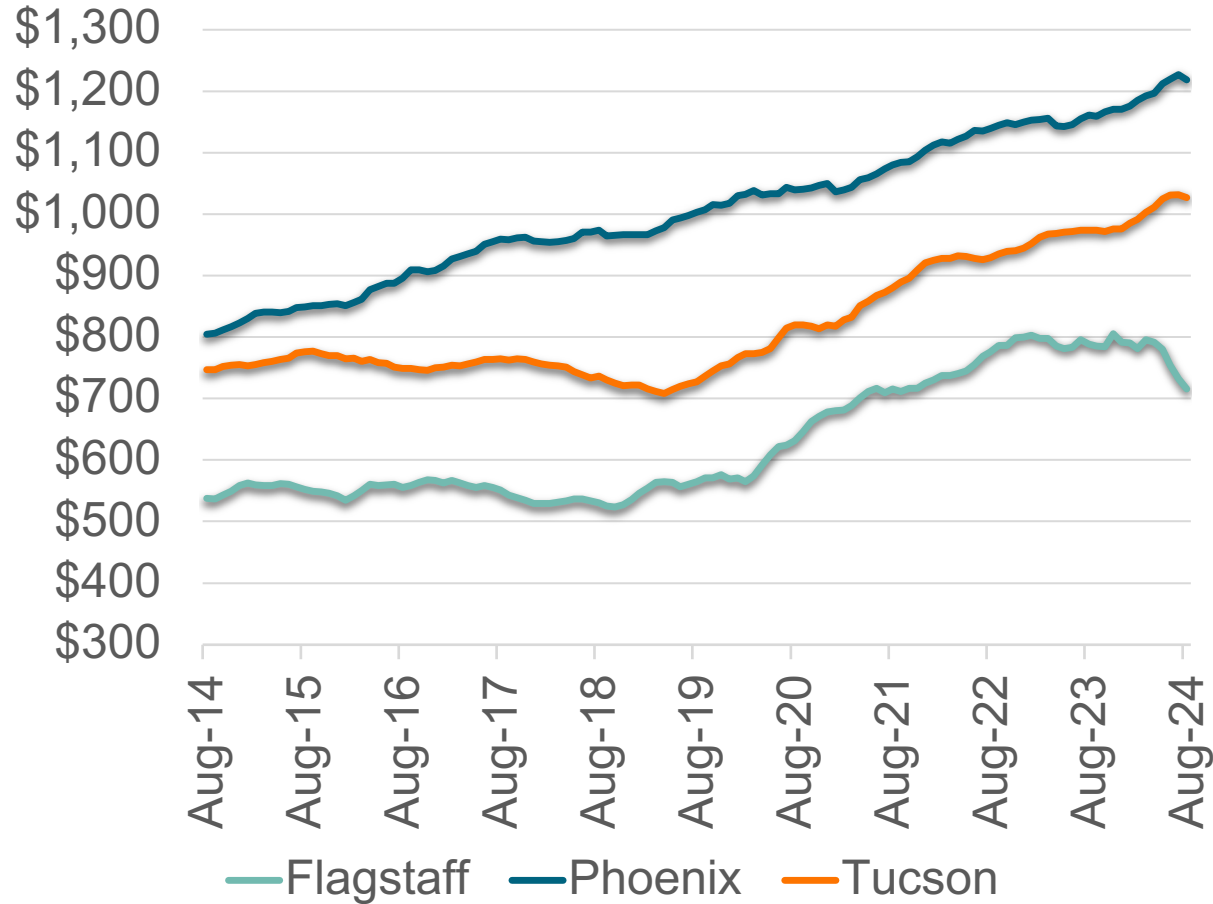
Phoenix Industry	Aug-24 Emplt (000s)	1-Year Chg. (000s)	LQ
Total Nonfarm	2,463.6	55.5	1.0
Health Care	351.5	17.4	1.0
Admin Support	206.1	6.3	1.4
Government	257.8	6.1	0.7
Wholesale Trade	104.5	4.9	1.1
Prof Sci Tech	147.4	4.4	0.9
Logistics	124.9	3.7	1.1
Financial Activities	213.6	2.8	1.5
Management	45.9	2.7	1.2
Construction	172.1	2.5	1.3
Other Services	78.4	1.6	0.9
Retail Trade	251.0	1.1	1.0
Information	40.9	-1.6	0.9
Manufacturing	146.5	-2.3	0.7
Leisure Hospitality	250.3	-2.4	0.9



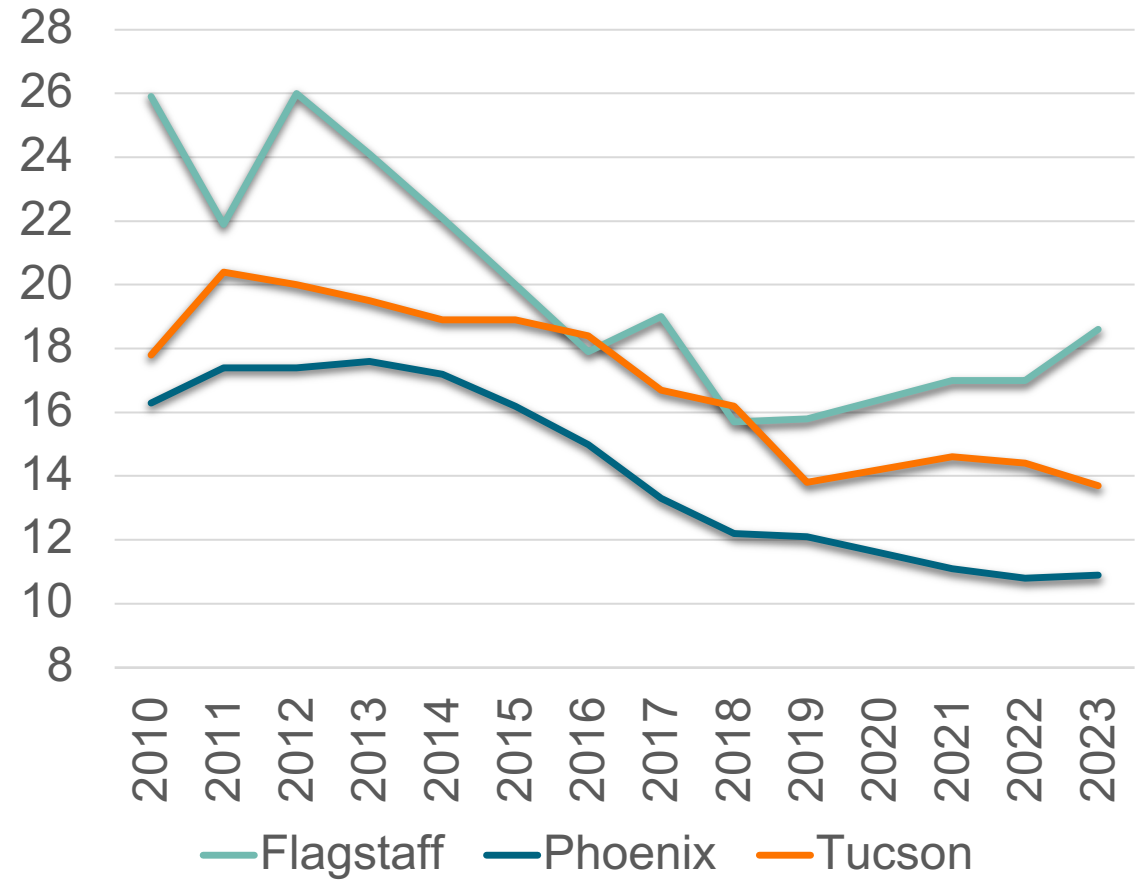


# Average Weekly Wages

## Average Weekly Wages



## Poverty Rate



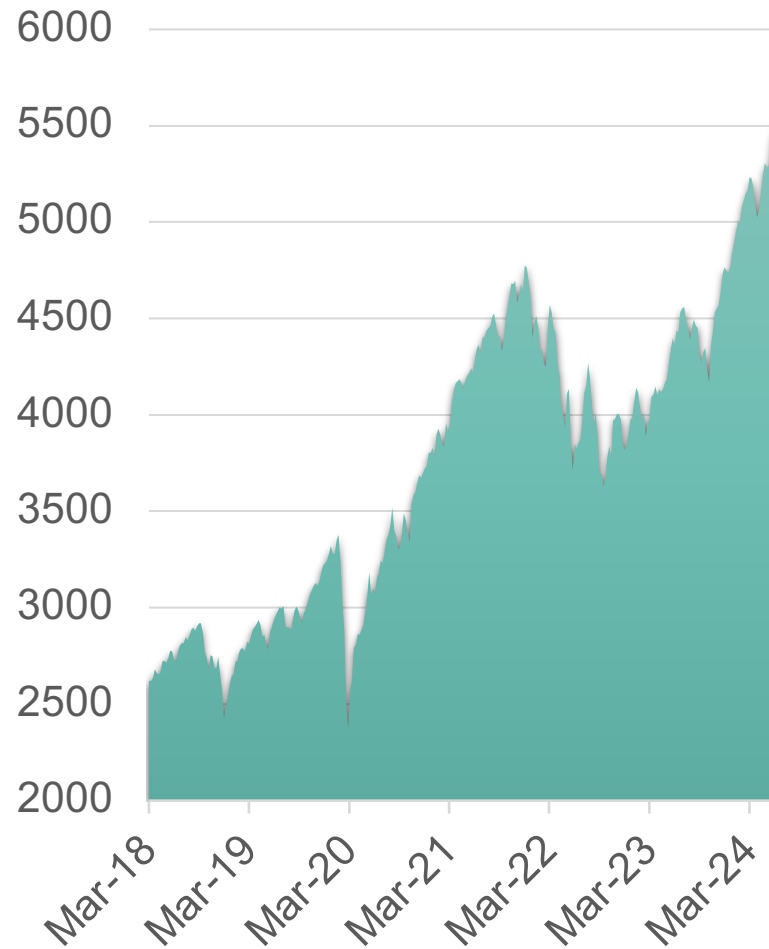
# Inflation Down, Markets Up



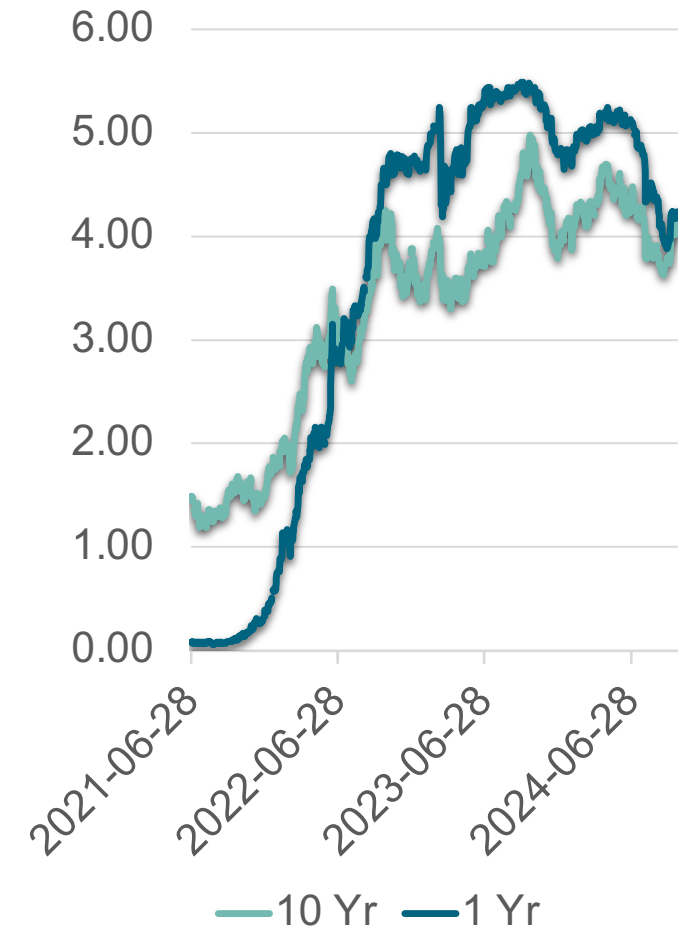
### PCE Consumption Deflator



### S&P 500 Index

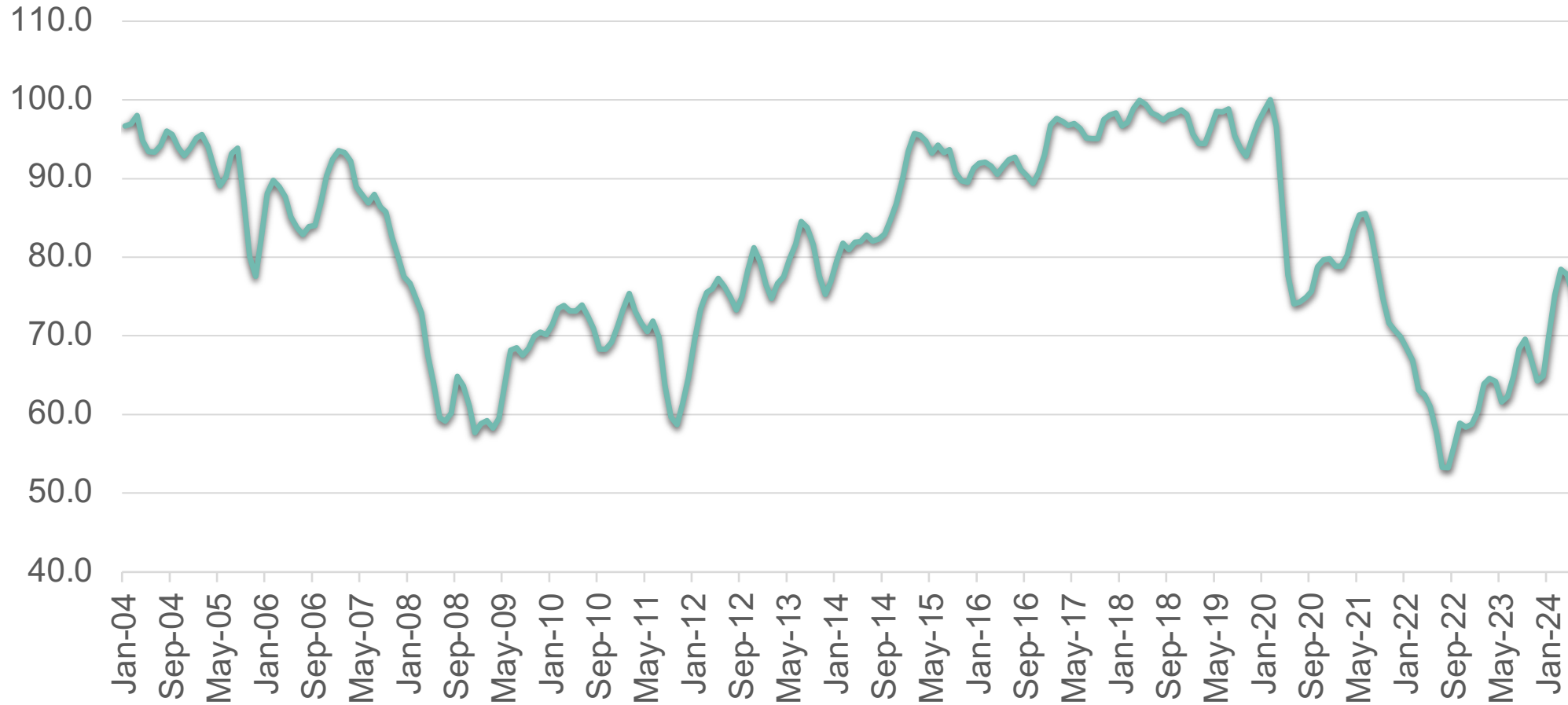


### Bond Rates



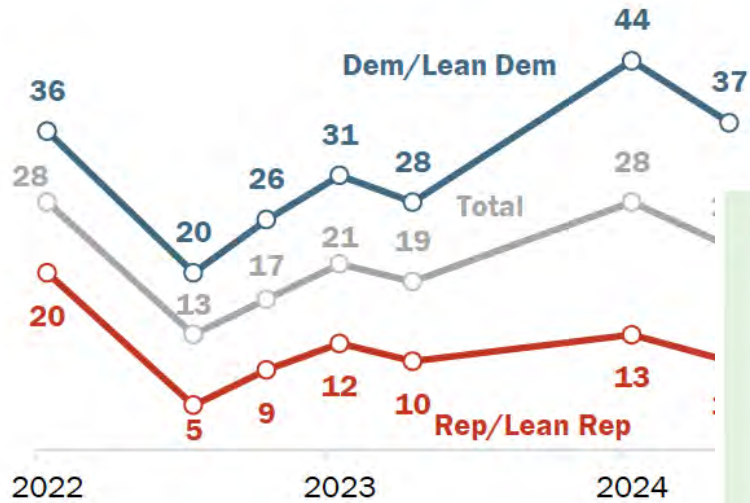
# The national mood?

U Mich Consumer Sentiment Smoothed



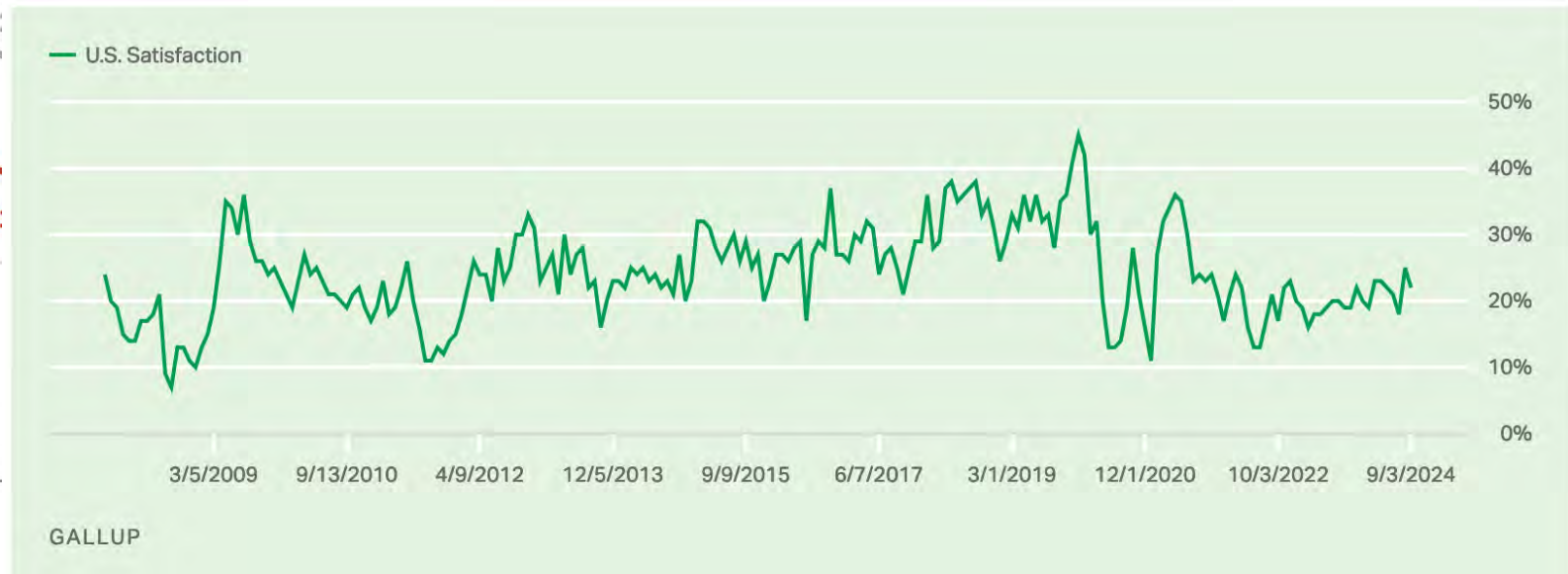
## Americans' ratings of national economic conditions have slipped since January

*% who say economic conditions in the country today are excellent or good*



Source: Survey of U.S. adults conducted May 13-19, 2024.

PEW RESEARCH CENTER



# Beware the Narrative

Social Narratives

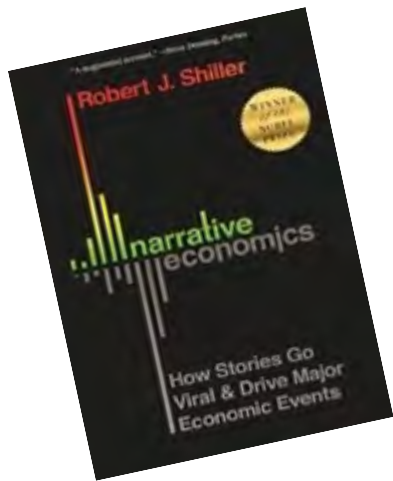
Economic Reality

Rising  
Inequality

The  
Unsustainable  
Federal Deficit



- ✓ Narratives skewing interpretations of economic news
- ✓ Narratives at the root of economic bubbles
- ✓ Narratives driving bad policy choices

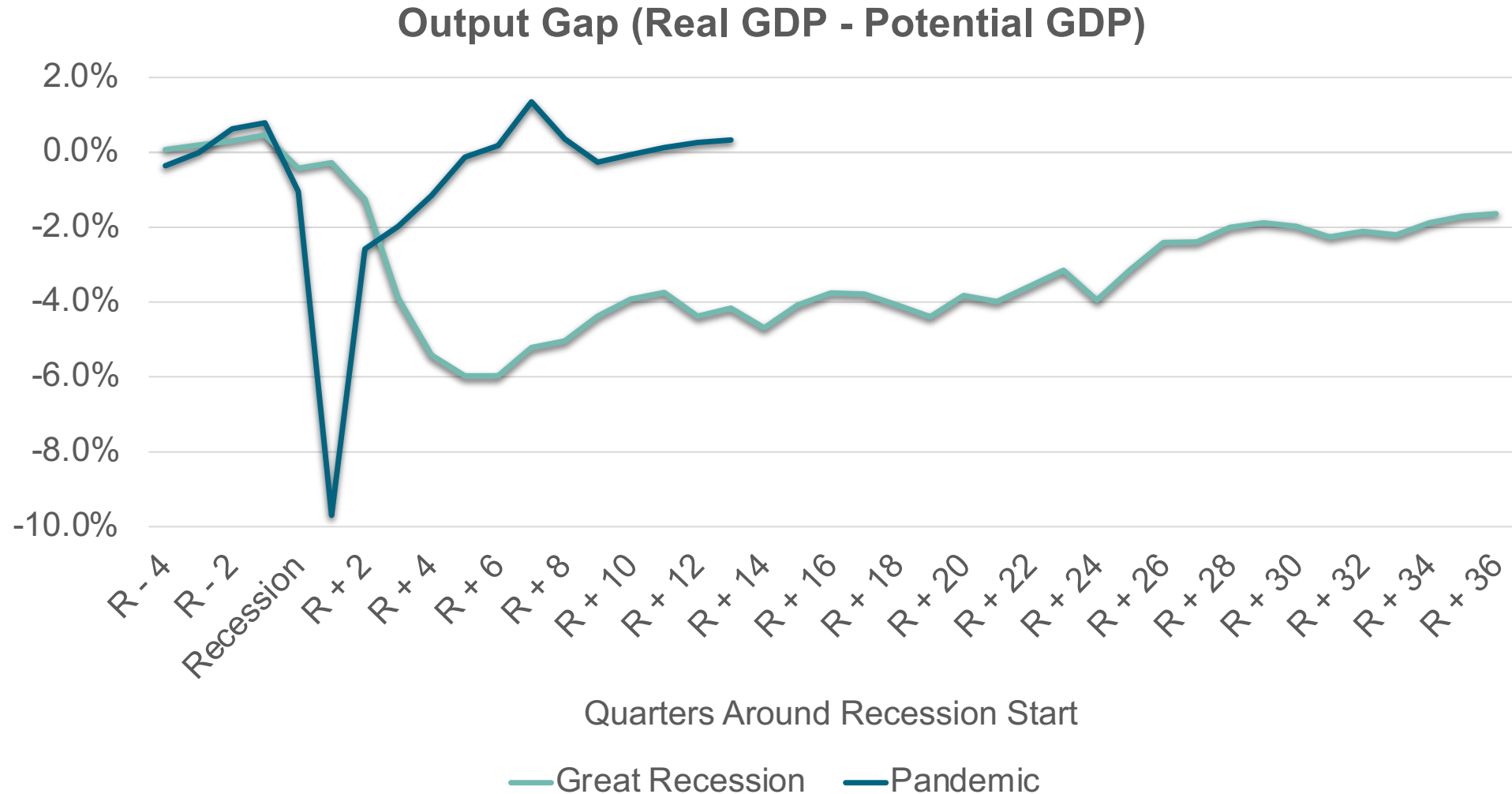


“We need to incorporate the contagion of narratives into economic theory. Otherwise, we remain blind to a very real ... mechanism for economic change..”

—R. Shiller, *Narrative Economics*

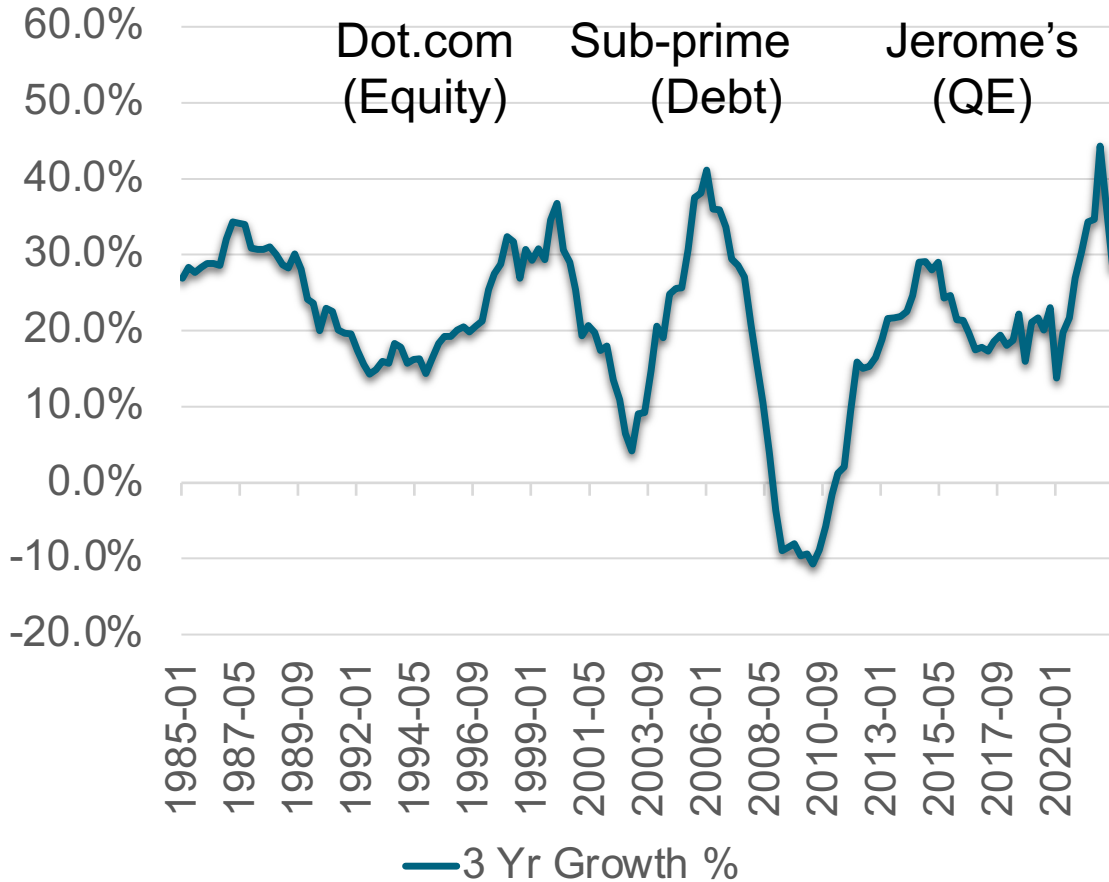


# The Pandemic Over-reaction



# The Bubble Economy

US Household Net Worth grew by \$30 trillion from 2020-2022



Real Median Net Worth for US Households in 2022 (\$thousands) and Growth Rate 2013-2022

<u>Percentile of income</u>		
Less 20	17	119%
20–39.9	55	94%
40–59.9	171	118%
60–79.9	299	48%
80–89.9	793	107%
90–100	2651	84%





<b>Nominal Spending by Category</b>	<b>2024</b>	<b>4 Yr</b>
	Q1	Growth%
Personal consumption exp	\$19,143	32.3%
Air transportation	\$208	113.4%
Foreign travel by U.S. residents	\$228	69.5%
Sporting equipment, guns	\$128	62.1%
Recreational items	\$318	54.4%
Restaurants	\$1,208	50.9%
New motor vehicles	\$371	43.2%
Electricity and gas	\$316	38.9%
Housing	\$2,966	30.2%
Pharmaceuticals	\$651	25.2%
Food for Home Consumption	\$1,239	24.7%
Education services	\$345	14.2%



# Excess Money + Demand = Inflation

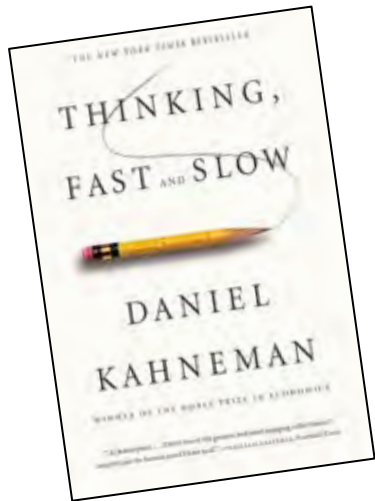
## Money and Prices



— GDP Price Growth — M2 Growth



# How do narratives go astray?



“System 1” is fast, instinctive and emotional; “System 2” is slower, more deliberative, and more logical.” *“System 1 is gullible and biased to believe, System 2 is in charge of doubting and unbelieving, but System 2 is sometimes busy, and often lazy”*

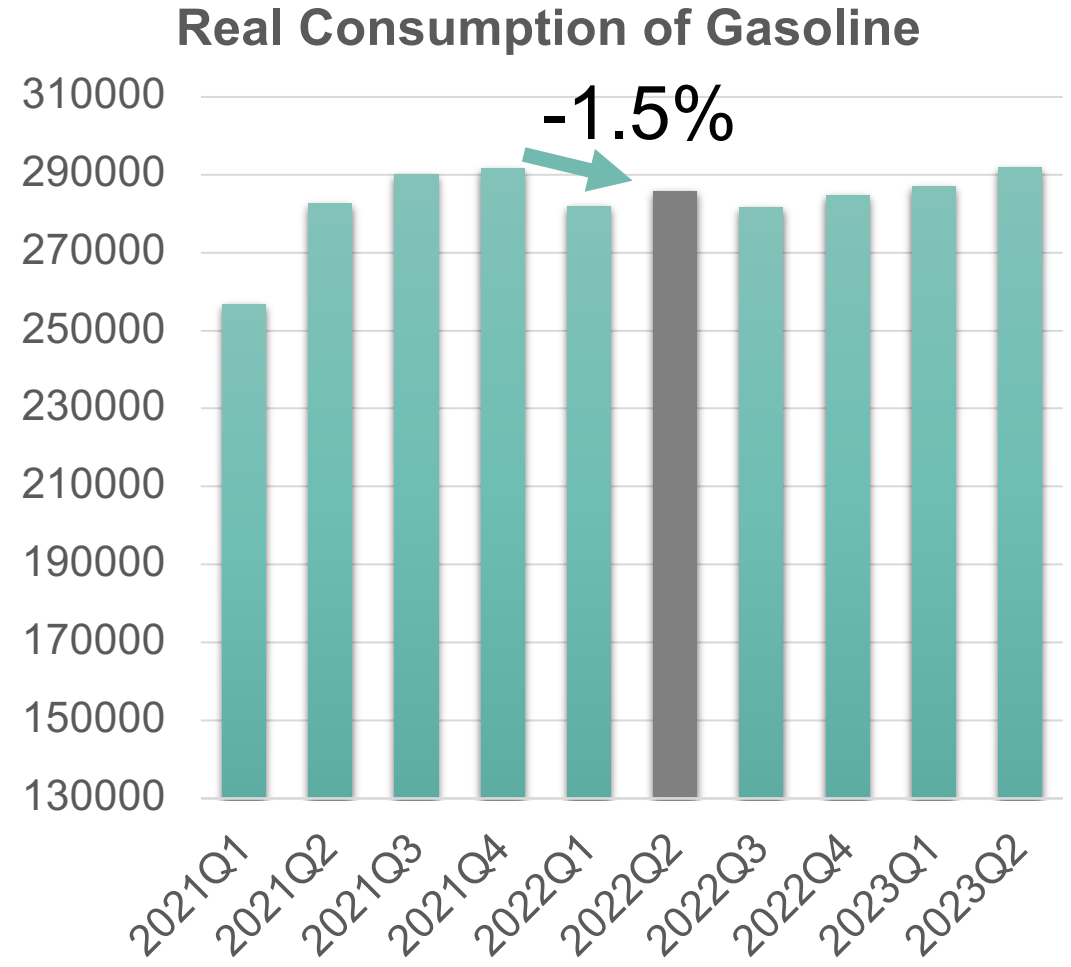
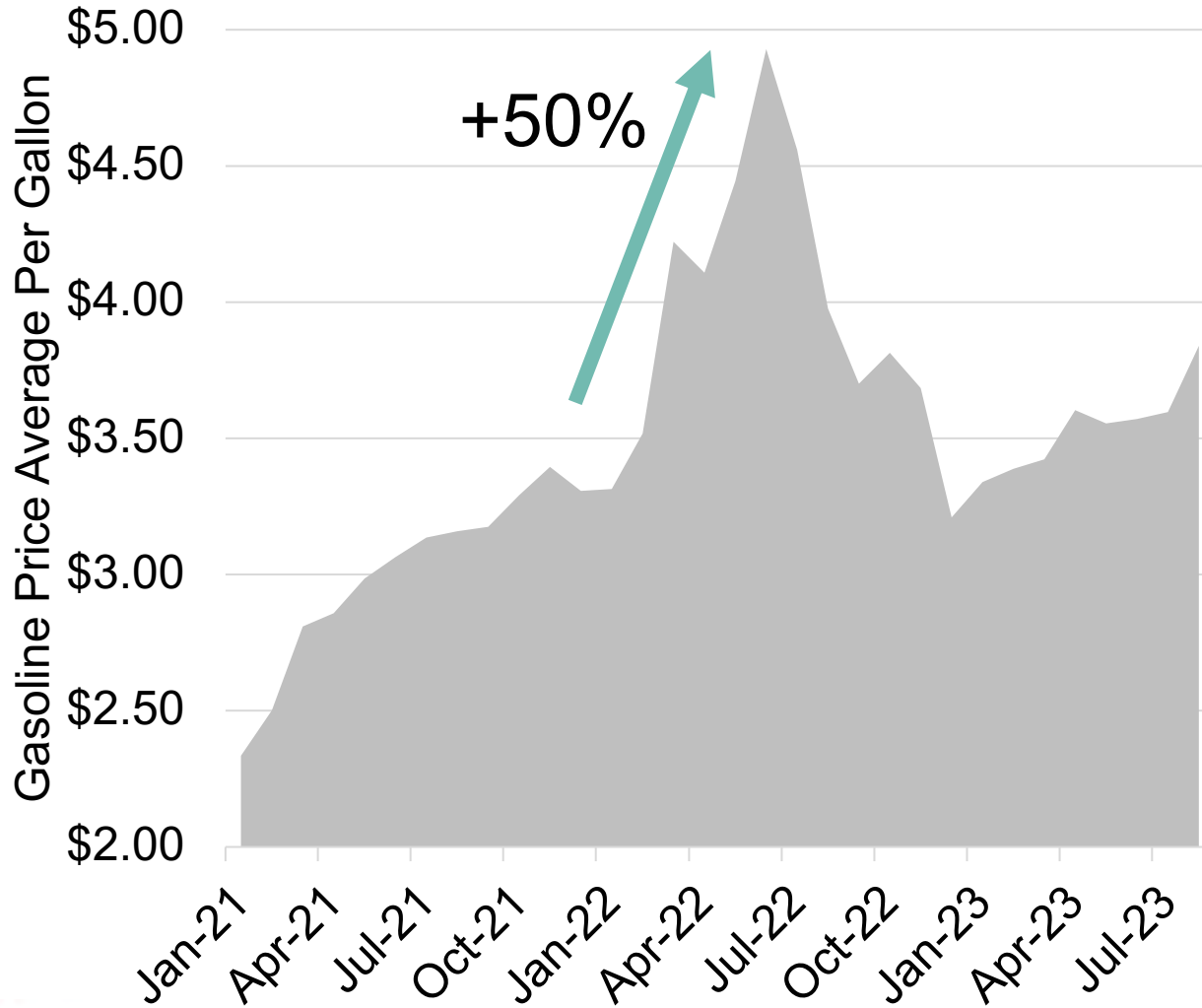
## Some Examples of Cognitive Biases

- Anchoring bias
- Apophenia
- Availability heuristic
- Cognitive dissonance
- Confirmation bias
- Egocentric bias
- Extension neglect
- False priors
- Framing effect
- Logical fallacy
- Prospect theory
- Self-assessment
- Truth judgment

*Are the horizontal lines parallel?*

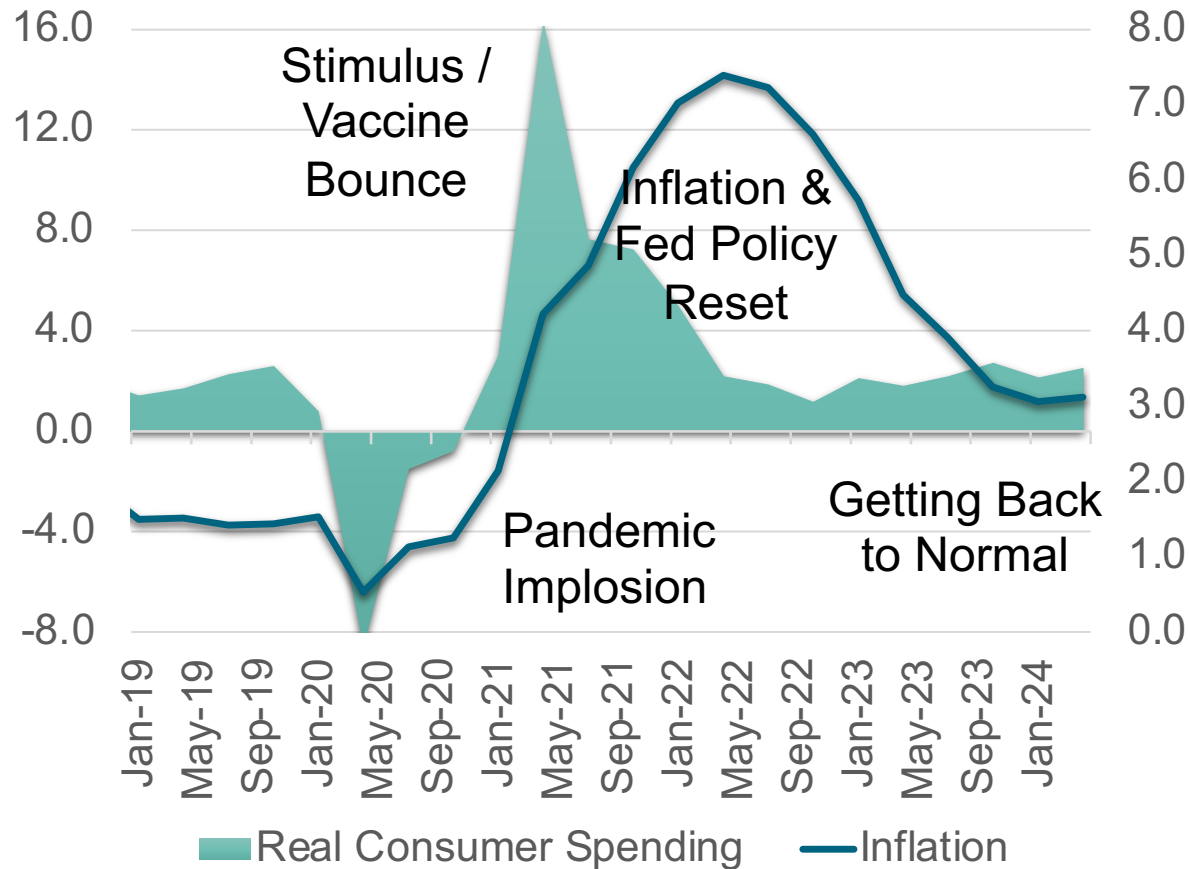


# Reality: Inflation is caused by demand



# Stages of the Consumer Surge

YOY Changes in Real Consumer Spending and Price Changes (%)



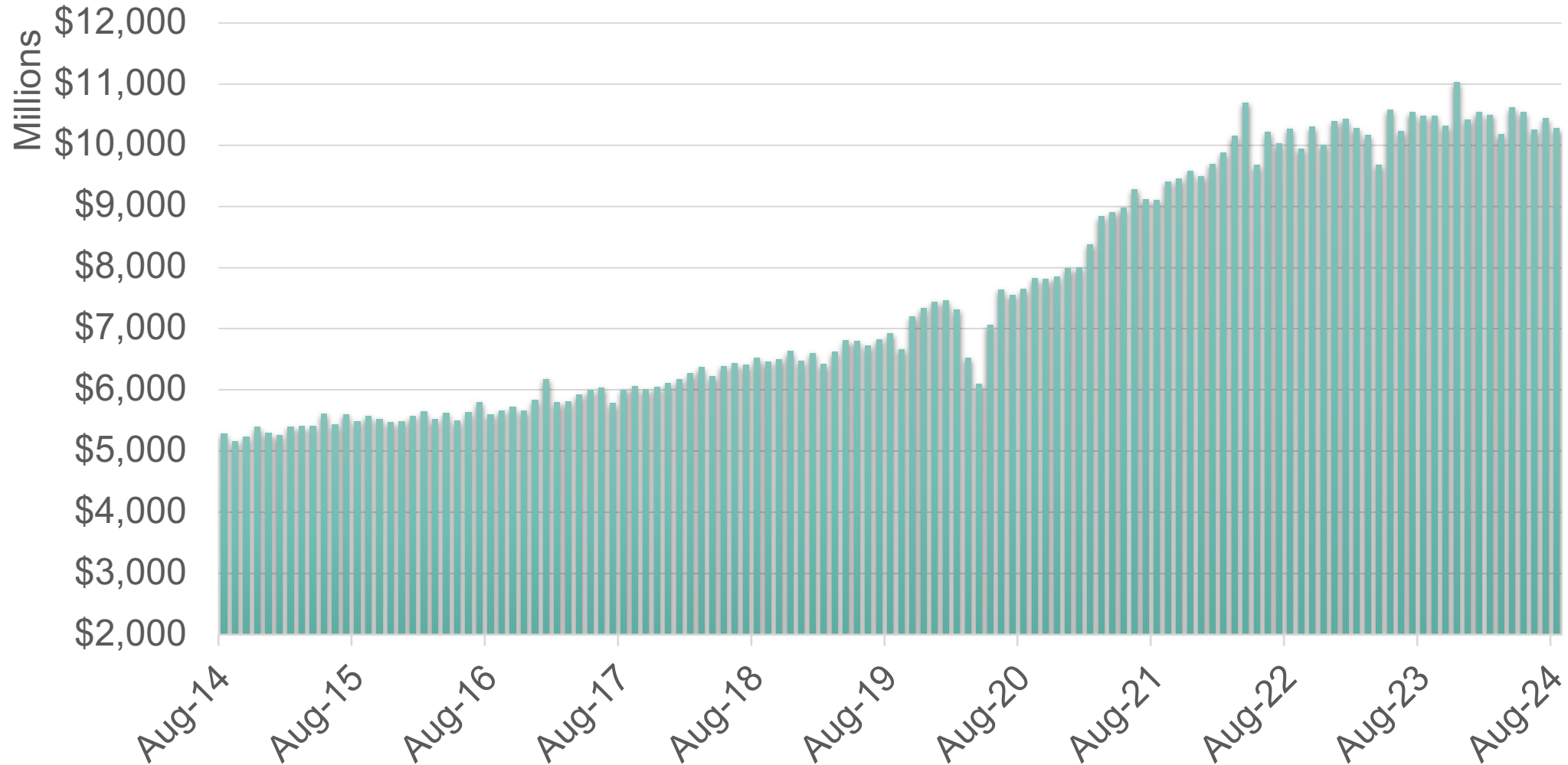
Contributions to Nominal Spending Growth

	21-22	23-24
Housing and utilities	10.2%	23.2%
Financial serv insurance	2.2%	10.9%
Food services accom.	13.6%	9.3%
Recreation services	7.3%	5.1%
Food and beverages	5.9%	4.1%
Transportation services	8.7%	3.9%
Recreational goods veh	3.9%	3.3%
Clothing and footwear	3.0%	1.2%
Furnishings	1.8%	-0.4%
Gasoline energy goods	9.4%	-1.2%
Motor vehicles and parts	3.5%	-4.4%



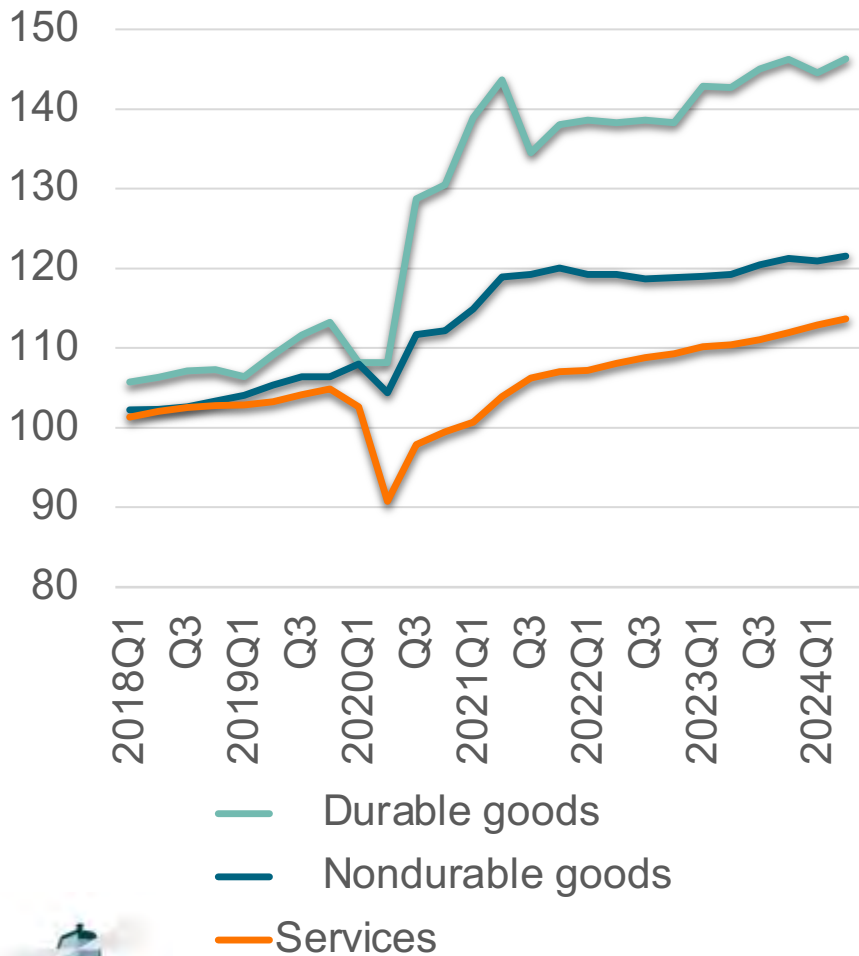
# Taxable Sales

## Phoenix MSA Taxable Sales

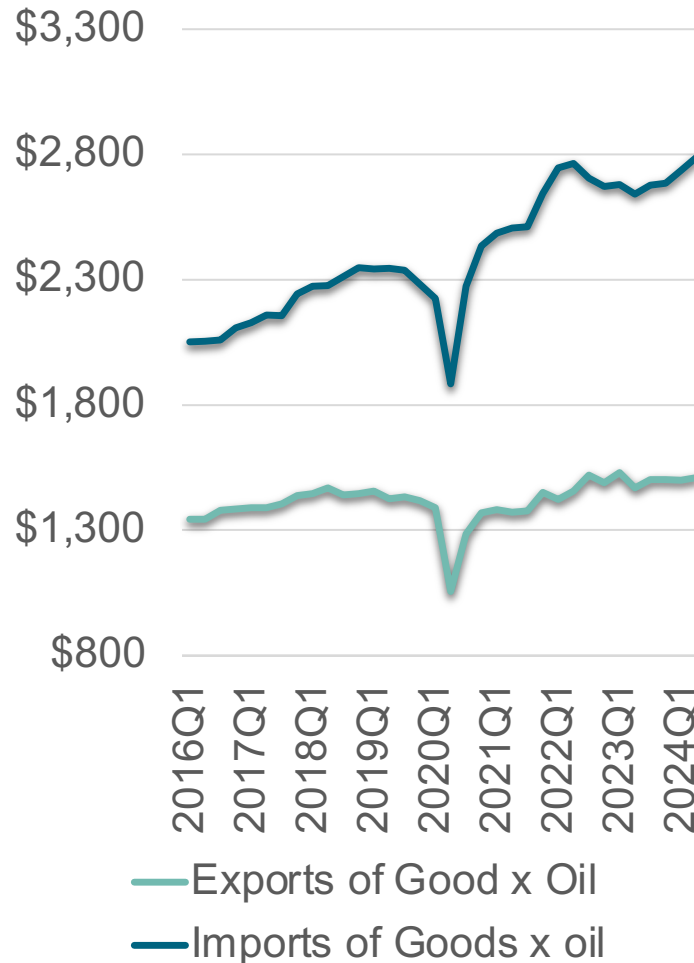


# Where is logistics?

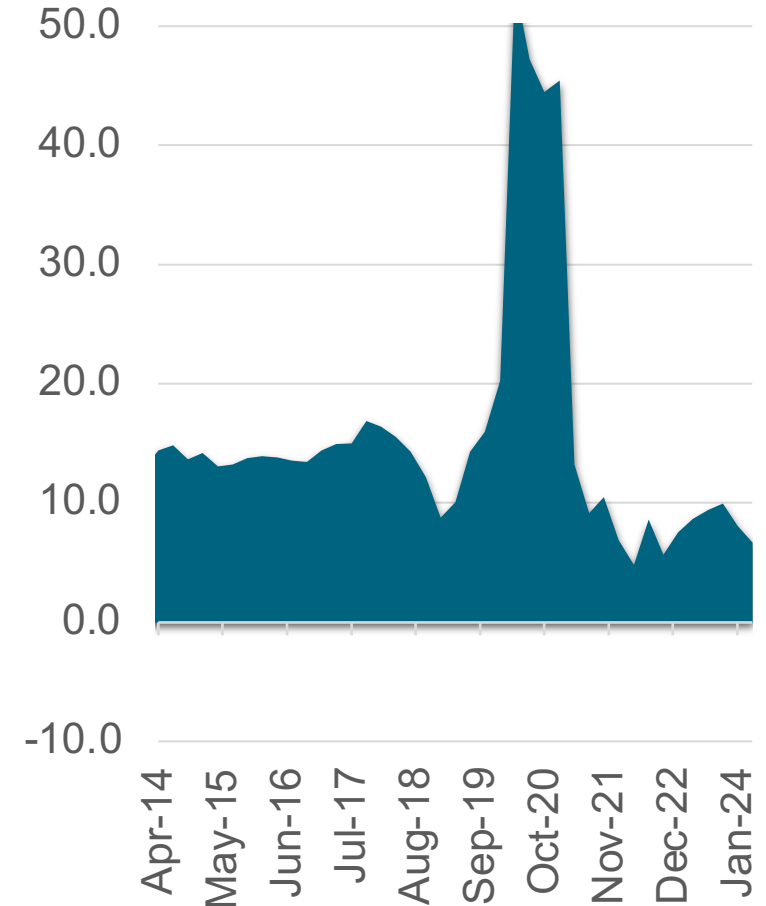
## Indexes of Real Consumer Spending



## Real Trade Flows

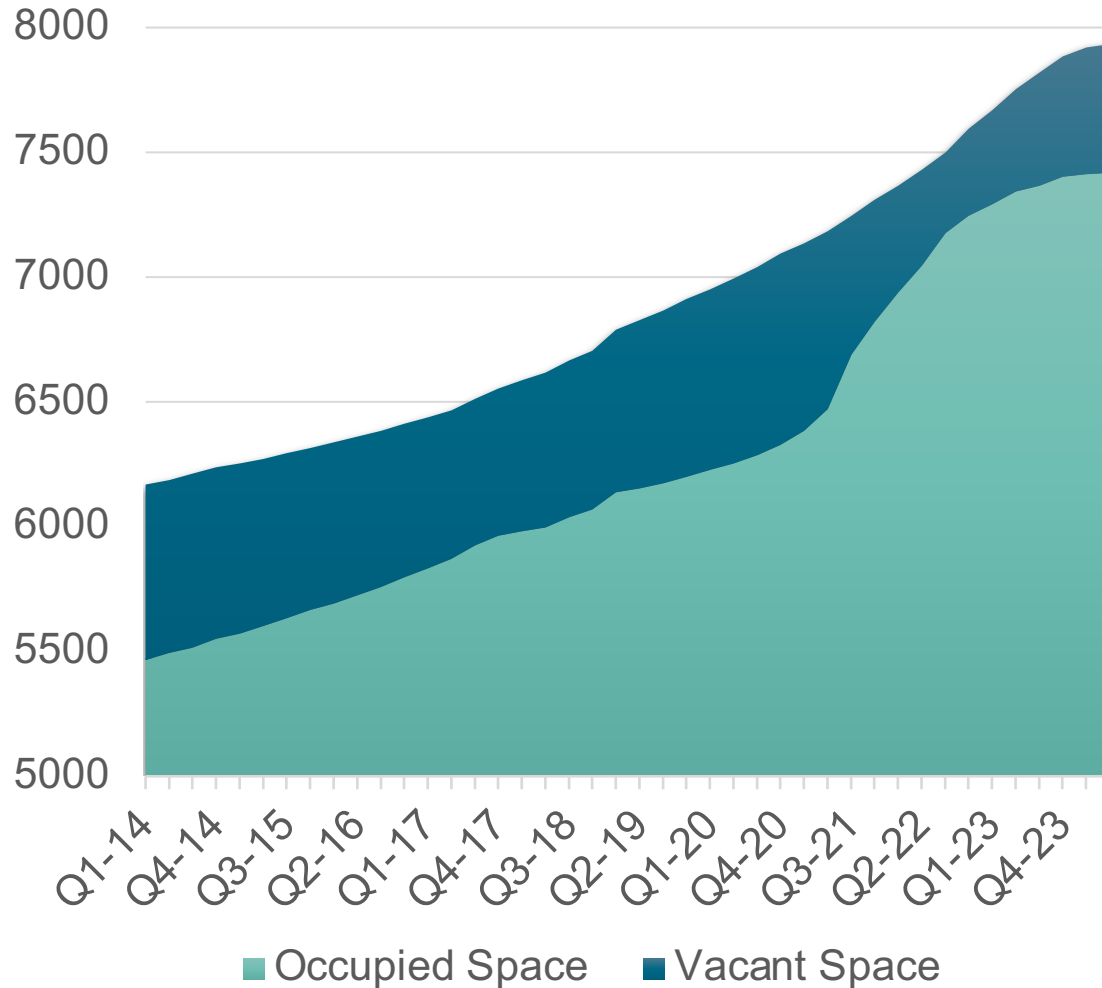


## Year over Year Growth E-Commerce Sales

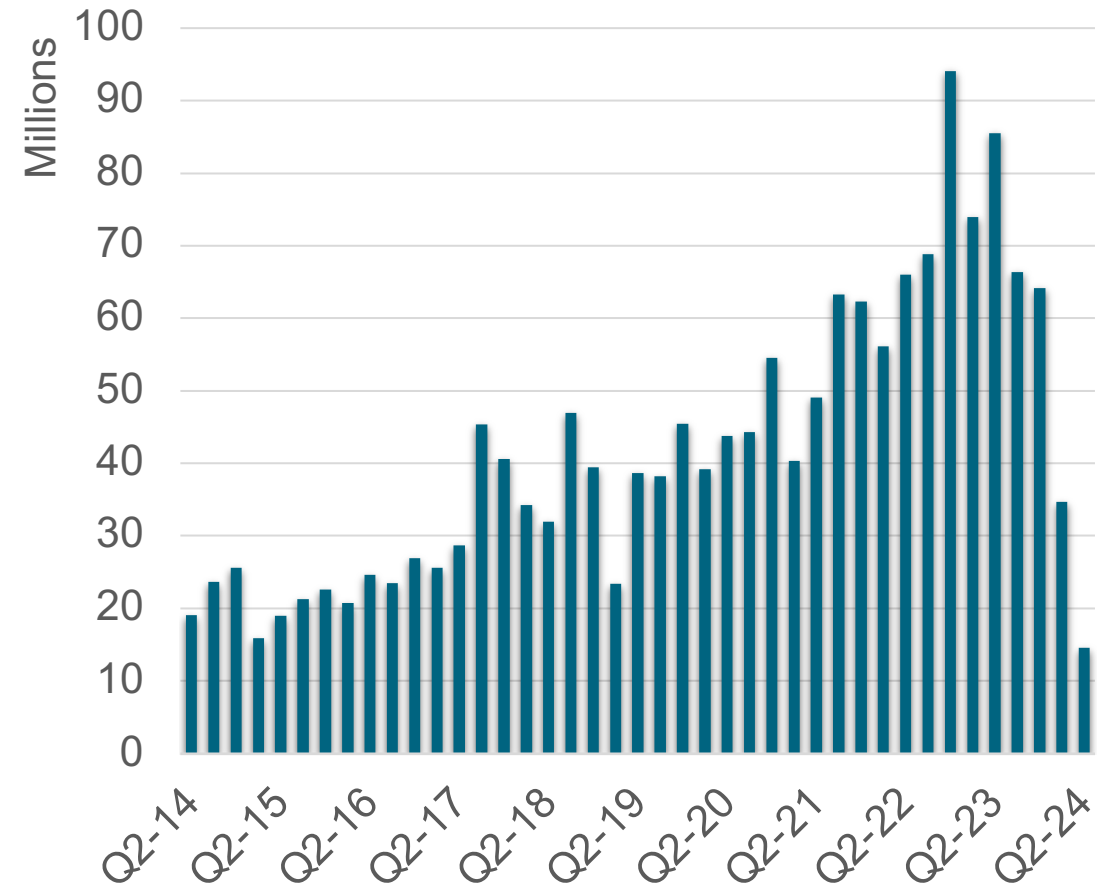


# The Industrial Overshoot...

## US Warehouse Space



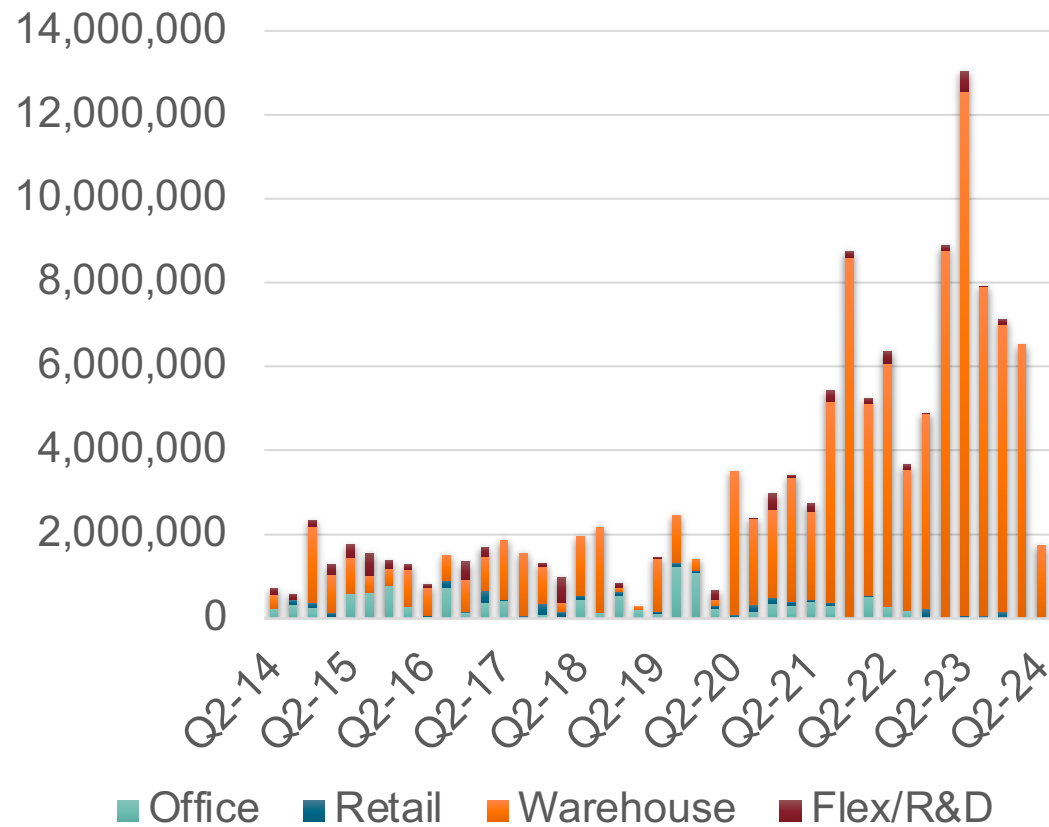
## U.S. Warehouse Completions





# Completions and Net Absorptions

Phoenix Non-Residential Completions



Phoenix	Q2-24 Occ. Stock (sq ft. 000s)	1-Year Net Abs. (sq ft. 000s)	5-Year Net Abs. (sq ft. 000s)
Flex/R&D	31,704	-58	4,347
Office	62,322	-2,150	1,740
Retail	66,033	232	1,793
Warehouse	210,671	11,677	79,387

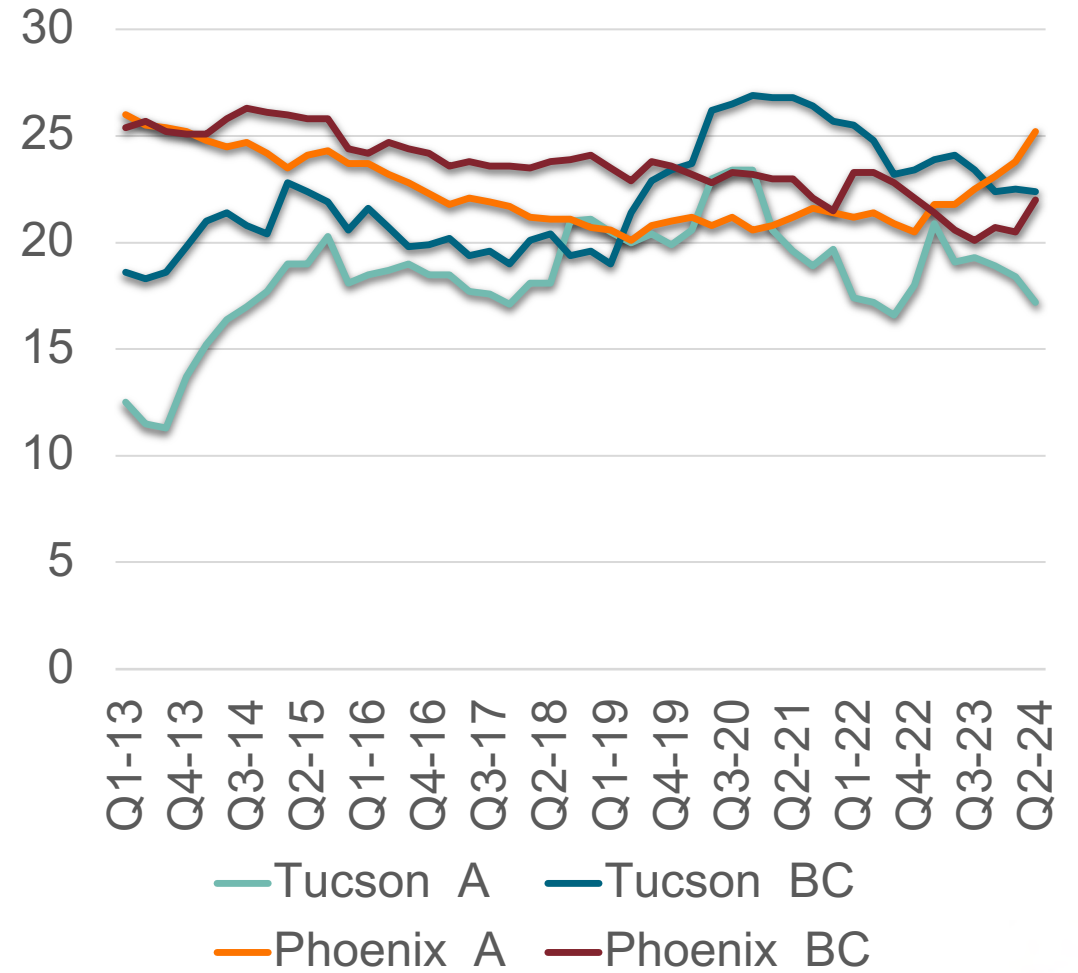


# Industrial and Office

## Industrial Vacancy Rate

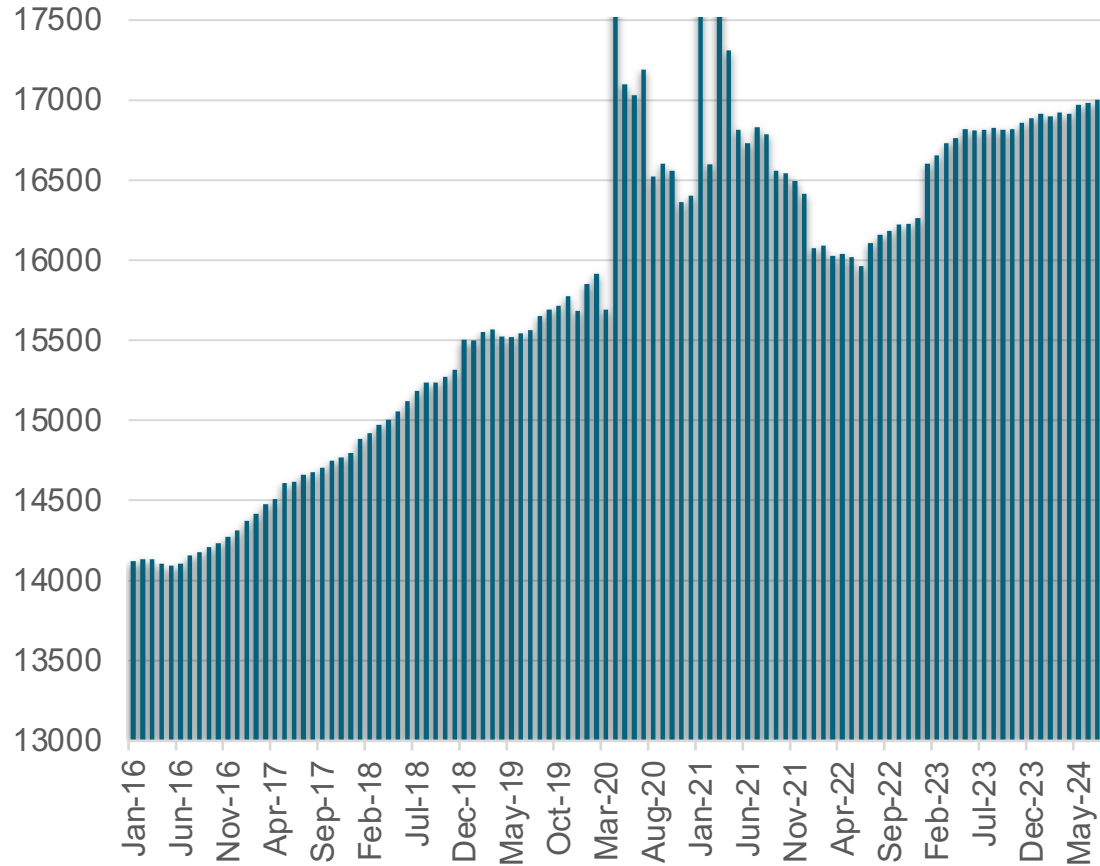


## Office Vacancies by Class

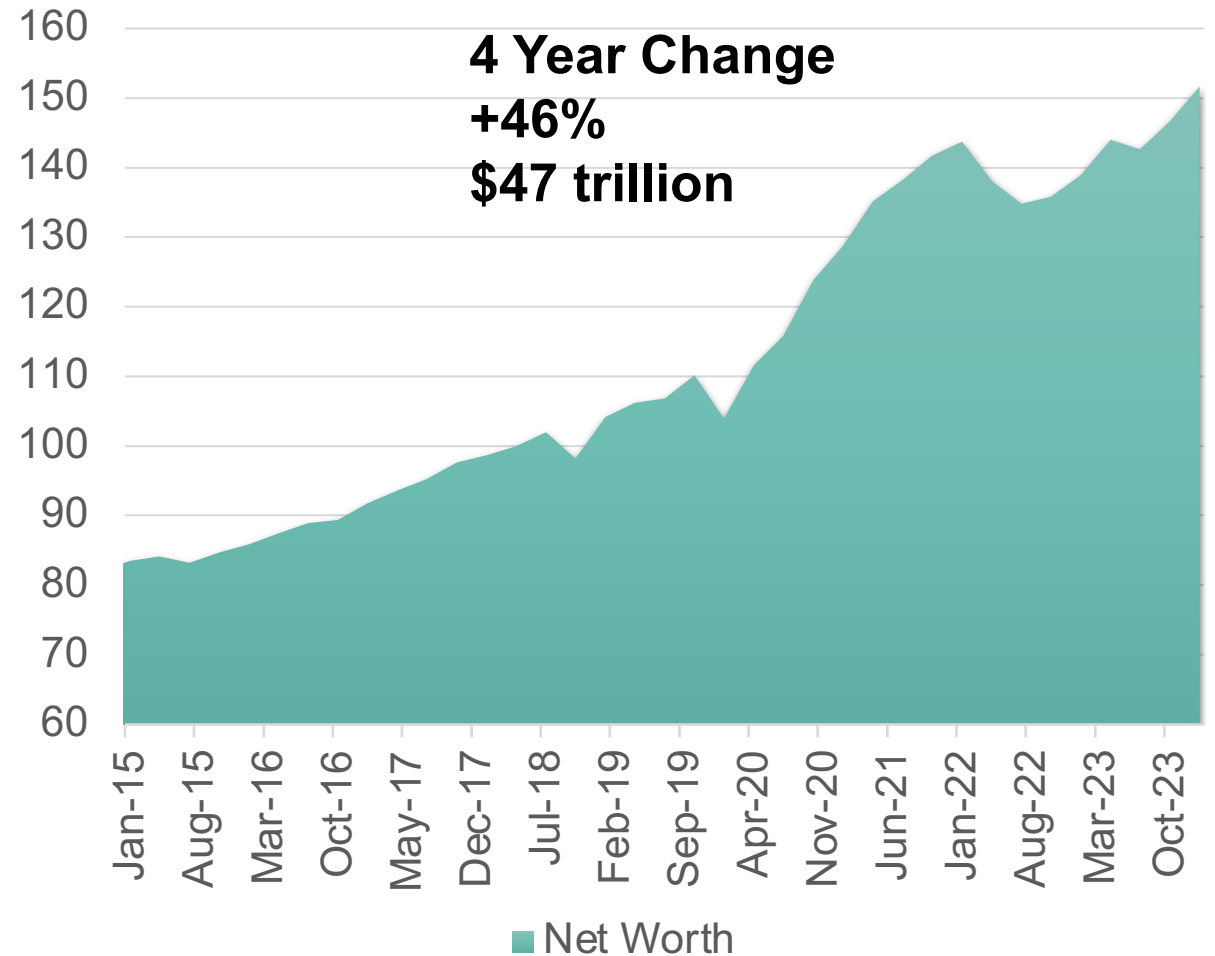


# SR Outlook for Consumers: Still Good

## Household Real Disposable Income

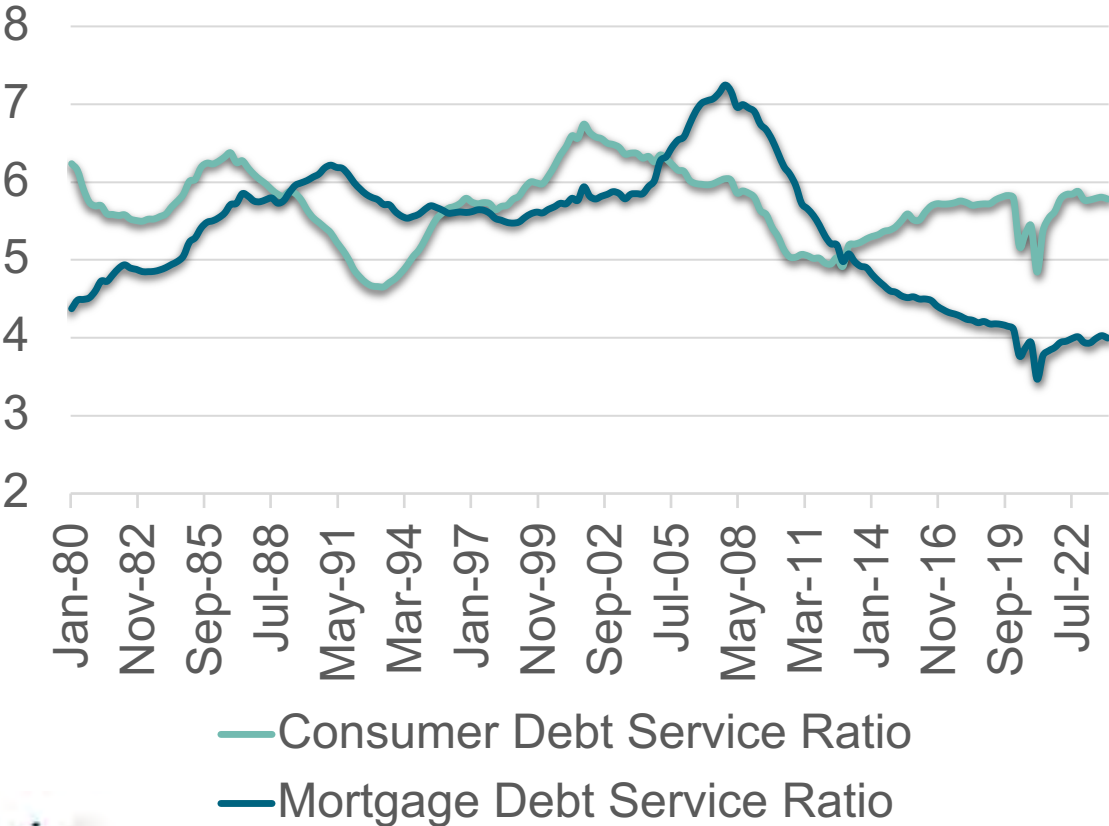


## US Household Net Worth (Trillions)

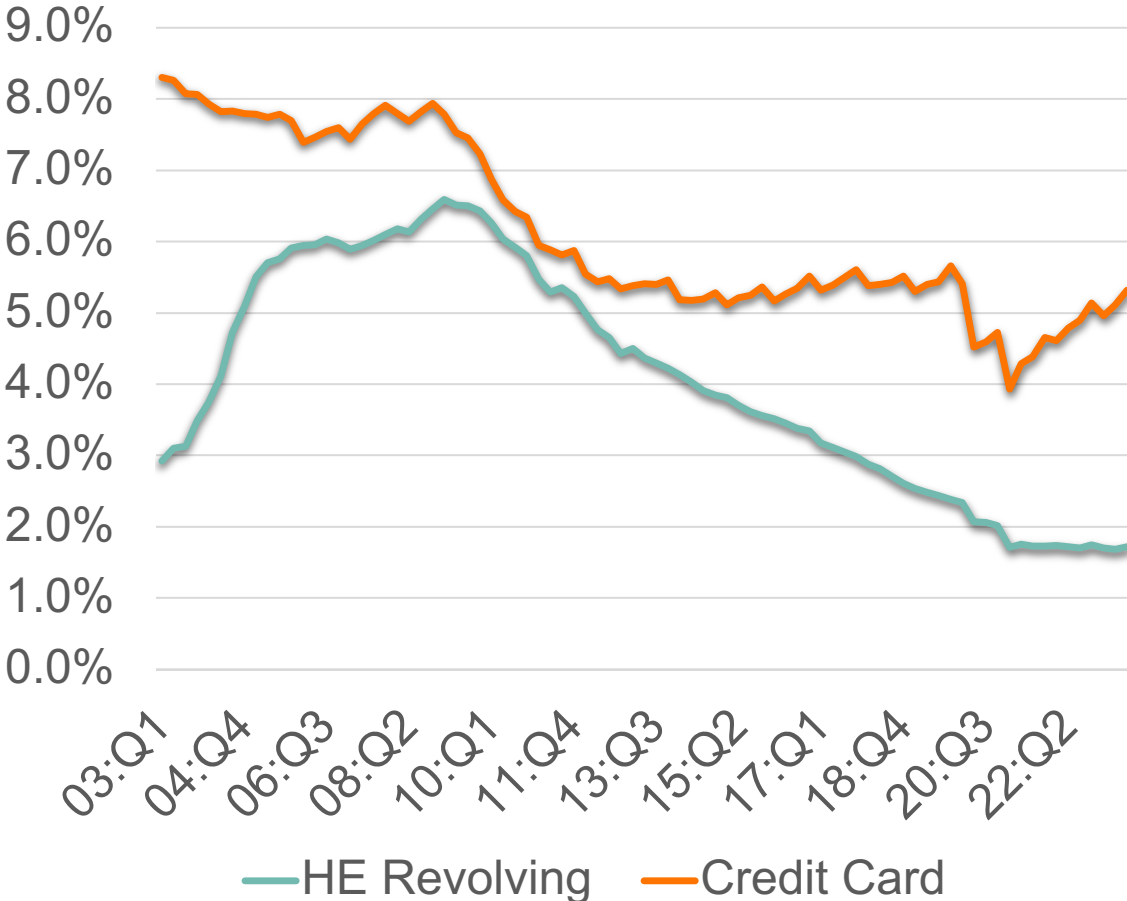


# Consumer Debt Levels: Not a problem... not yet at least

Debt Servicing as Share of Disposable Income (%)



Consumer Debt as % of DPI



# How About Gen-Z?

**NO MERCY/NO MALICE**

## War on the Young



Scott Galloway @profgalloway

Published on April 19, 2024



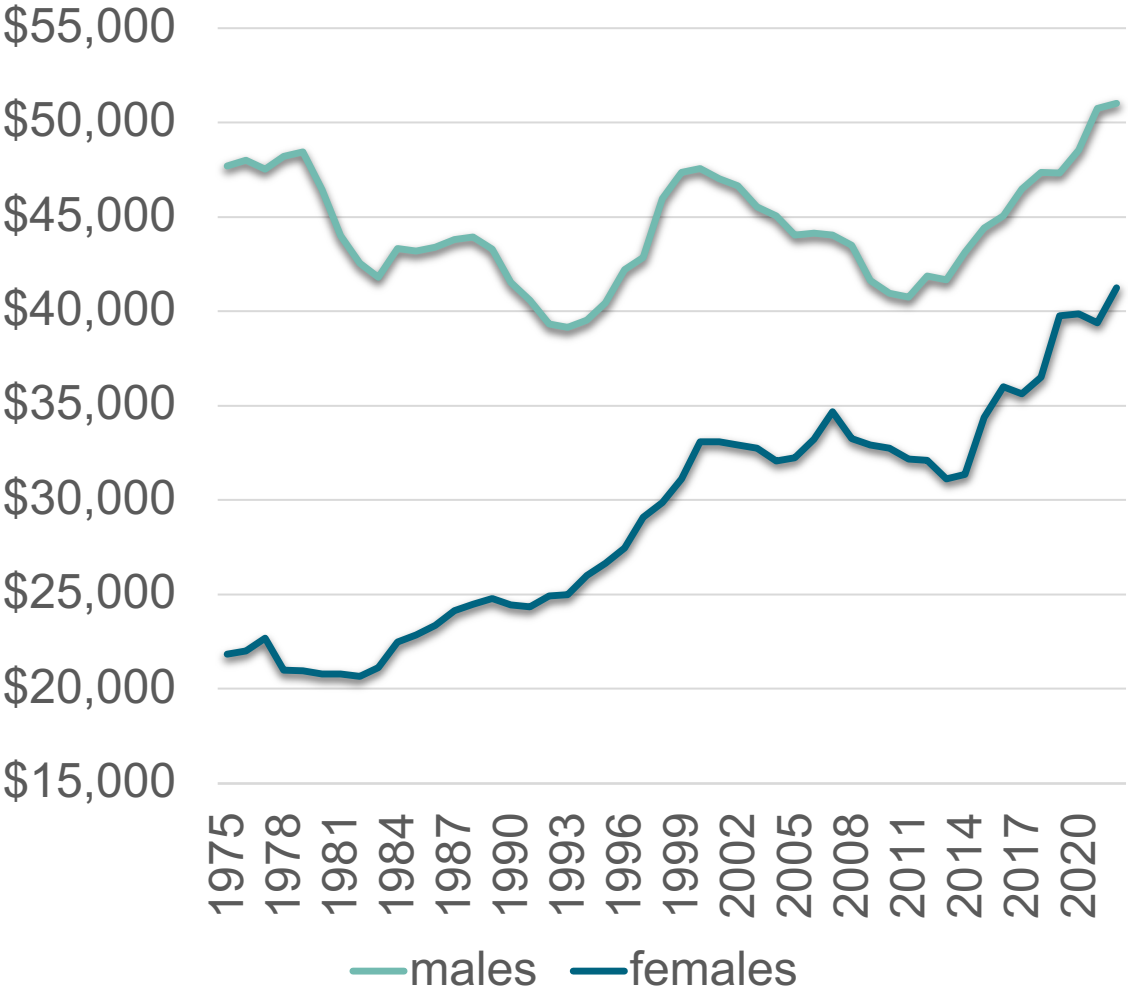
## Why the “social contract” has been broken:

- Today’s 25-year-olds make less than their parents and grandparents did at the same age
- They carry student debt loads unimaginable to earlier generations
- Housing costs have outpaced them

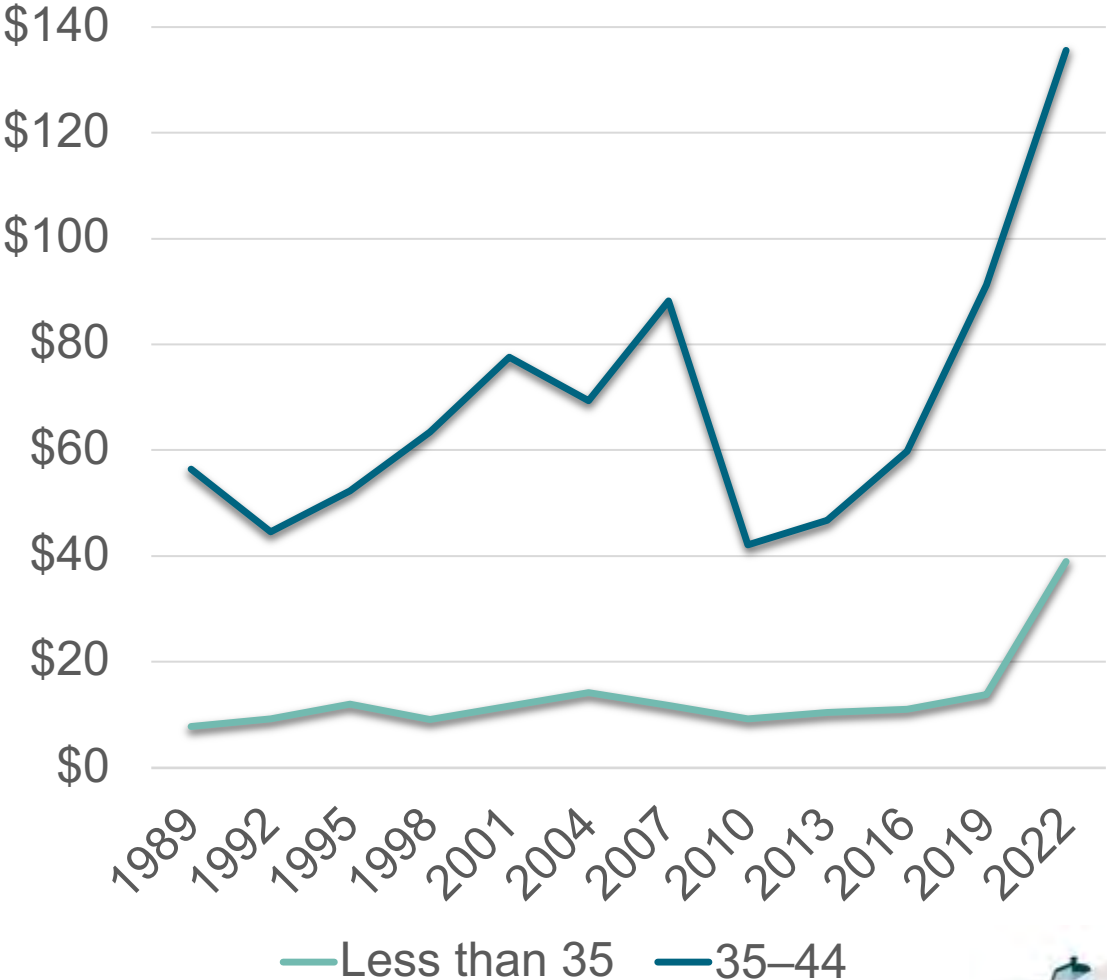


# What about Gen Z's income & wealth?

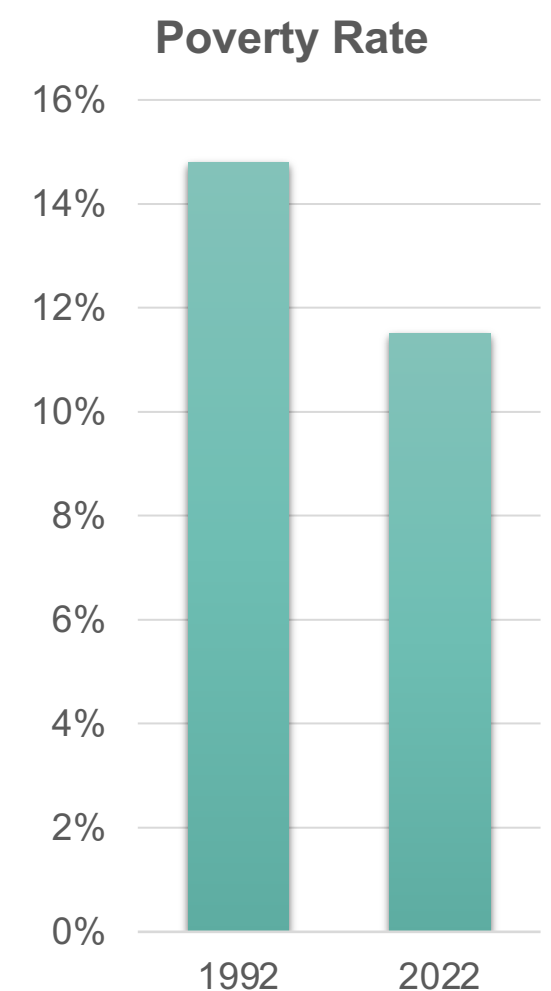
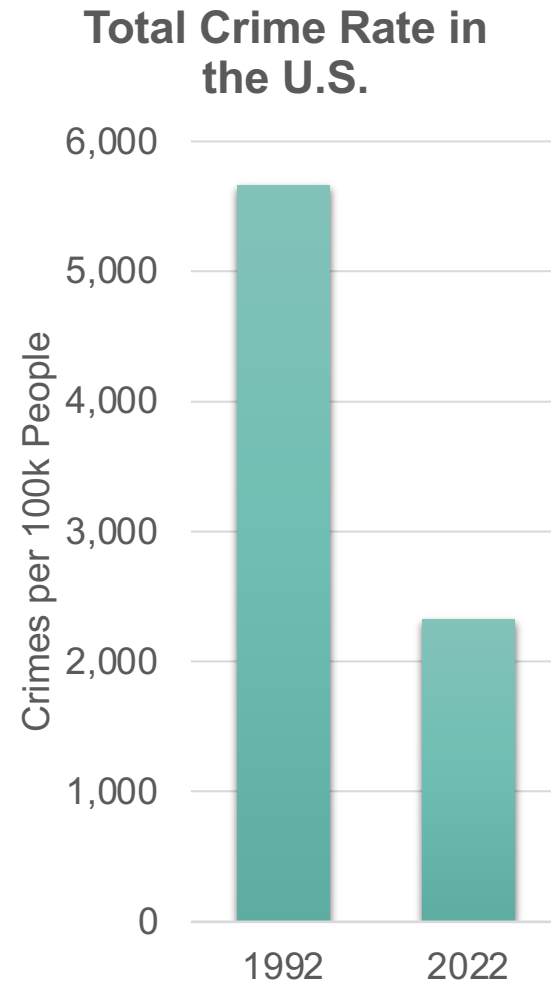
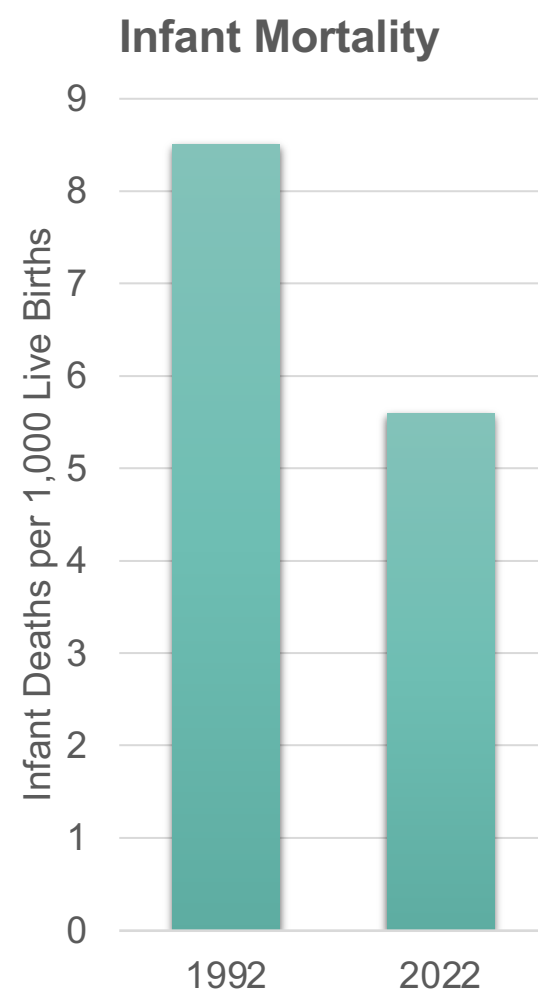
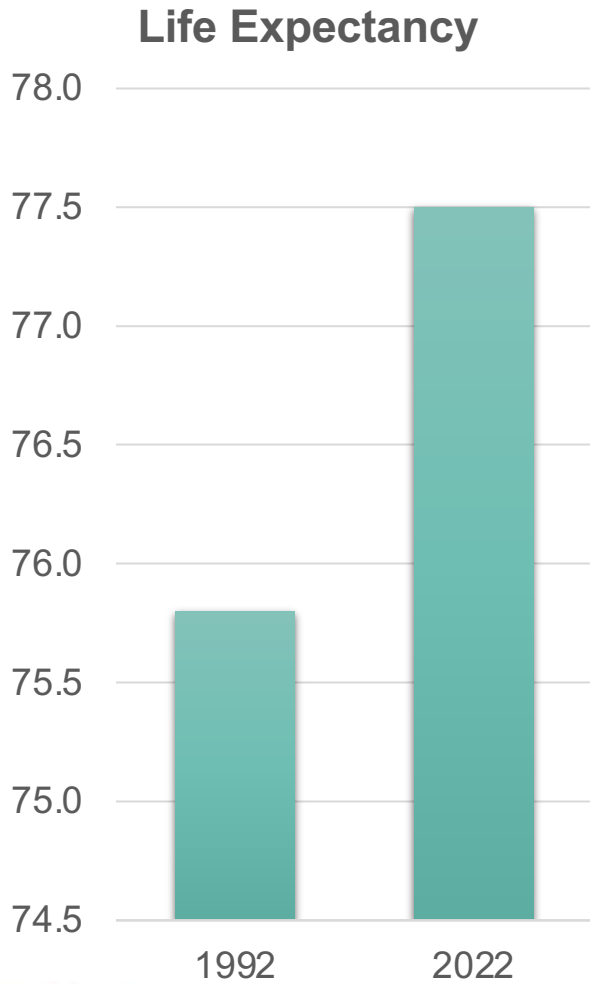
Real Median Income 25-34 Years

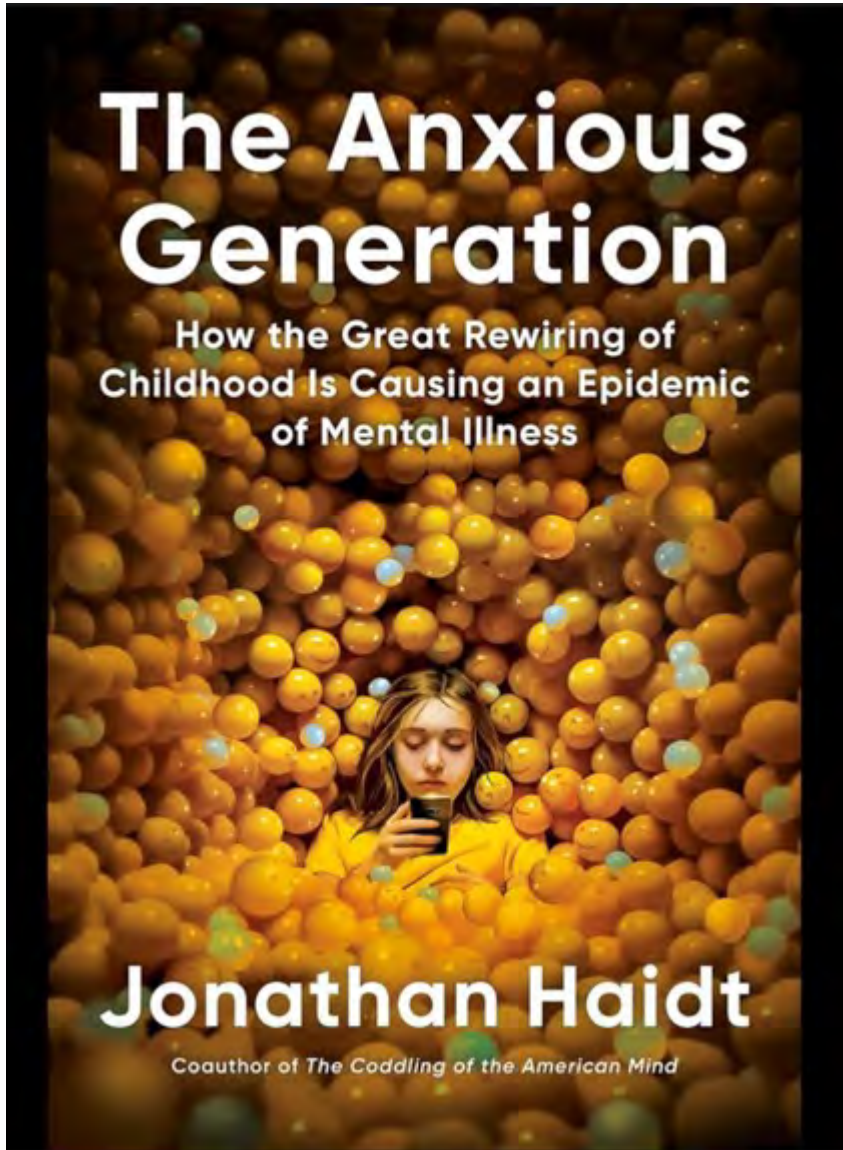


Real Median Net Worth \$000's

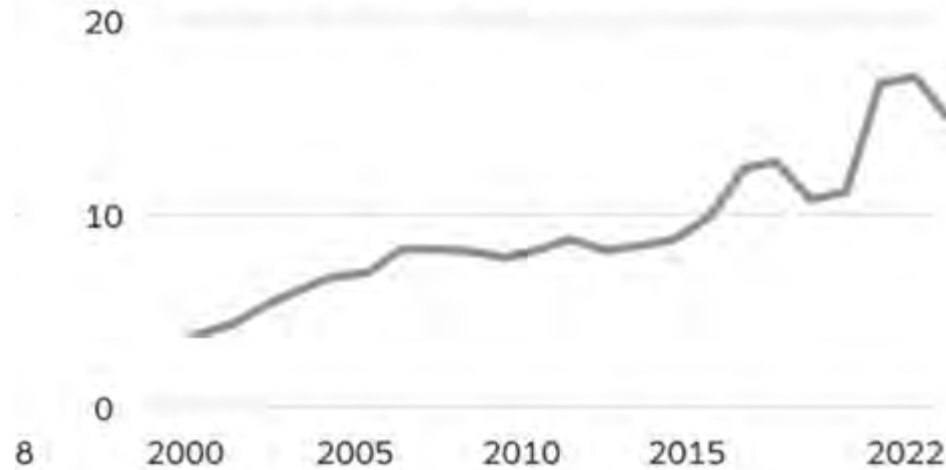


# Other Quality of Life Metrics

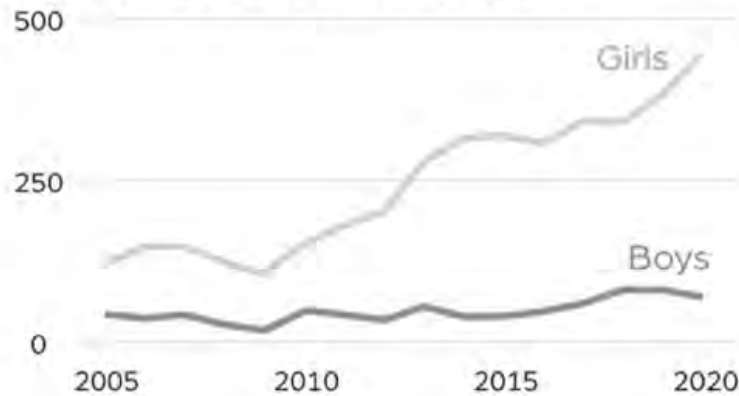




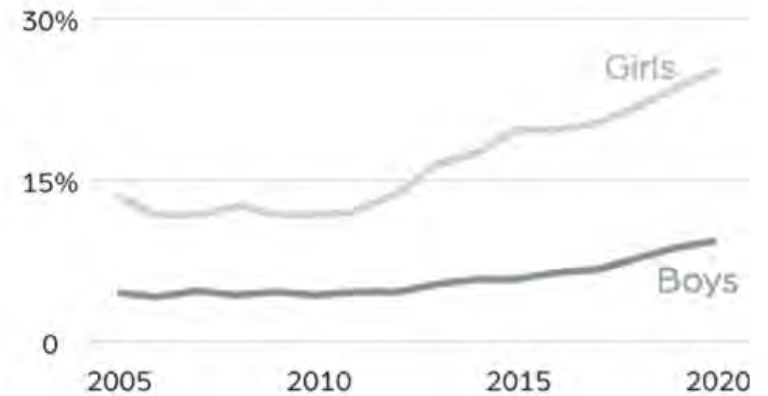
Overdose Deaths  
Ages 15-24, Per 100K population



Self-Harm Rates  
Ages 10-14, Per 100K population

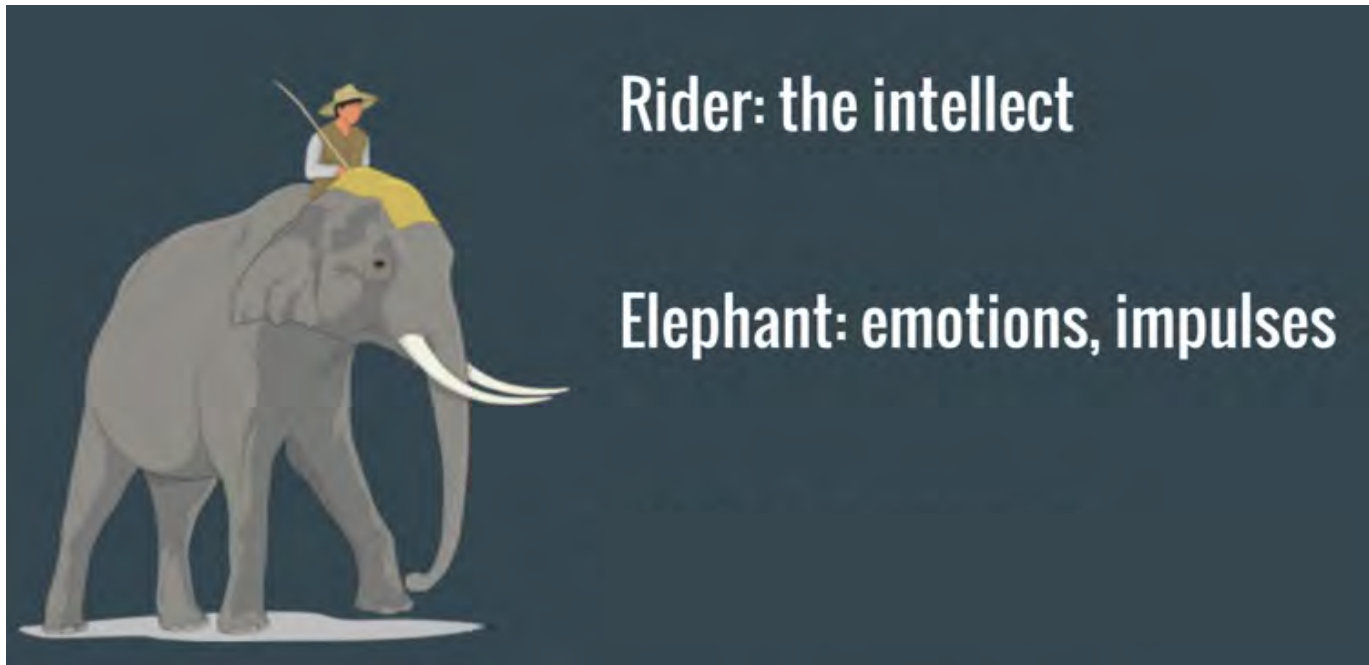


Teens with Depression



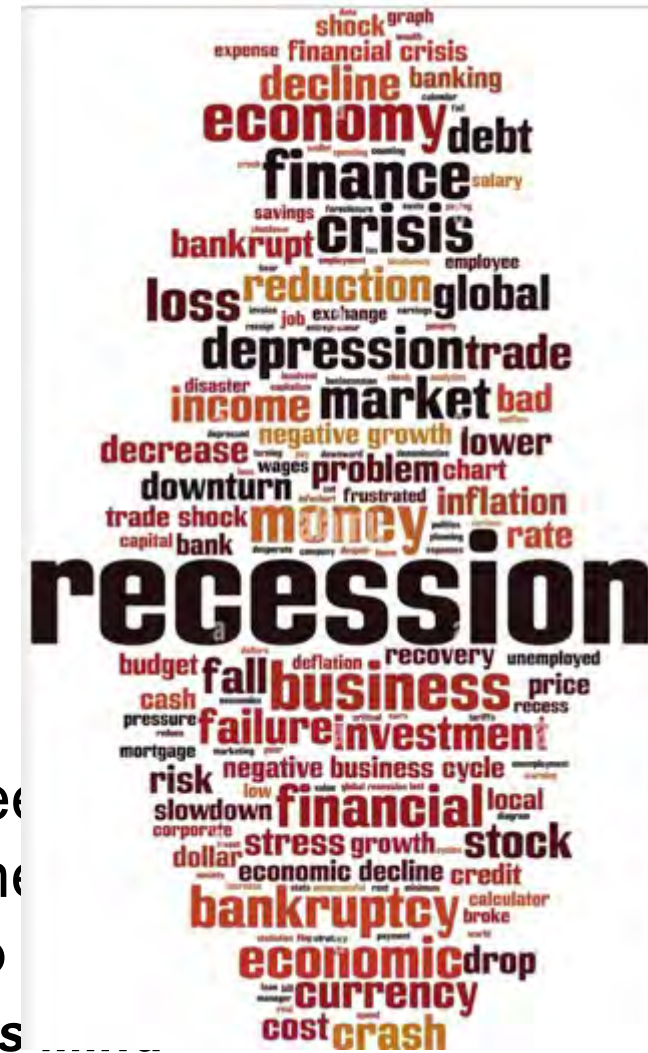


# The Elephant and the Rider



Rider: the intellect

Elephant: emotions, impulses



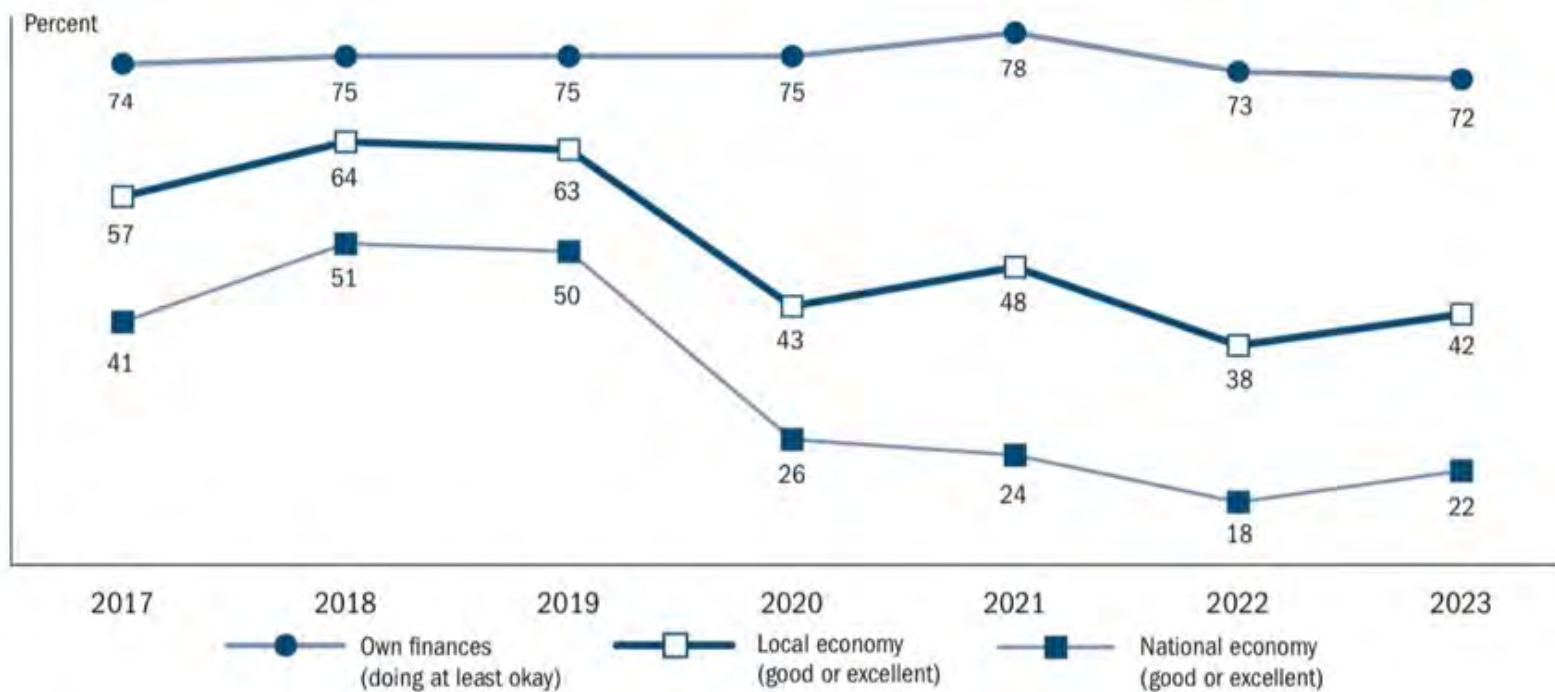
“The rider evolved to serve the elephant. You can see the elephant when people are morally dumbfounded. They don’t know about what is right and wrong, and **they struggle to come up with justifications for those feelings.**” J. Haidt *Righteous*

ings





**Figure 7. Assessment of own financial well-being, local economy, and national economy (by year)**



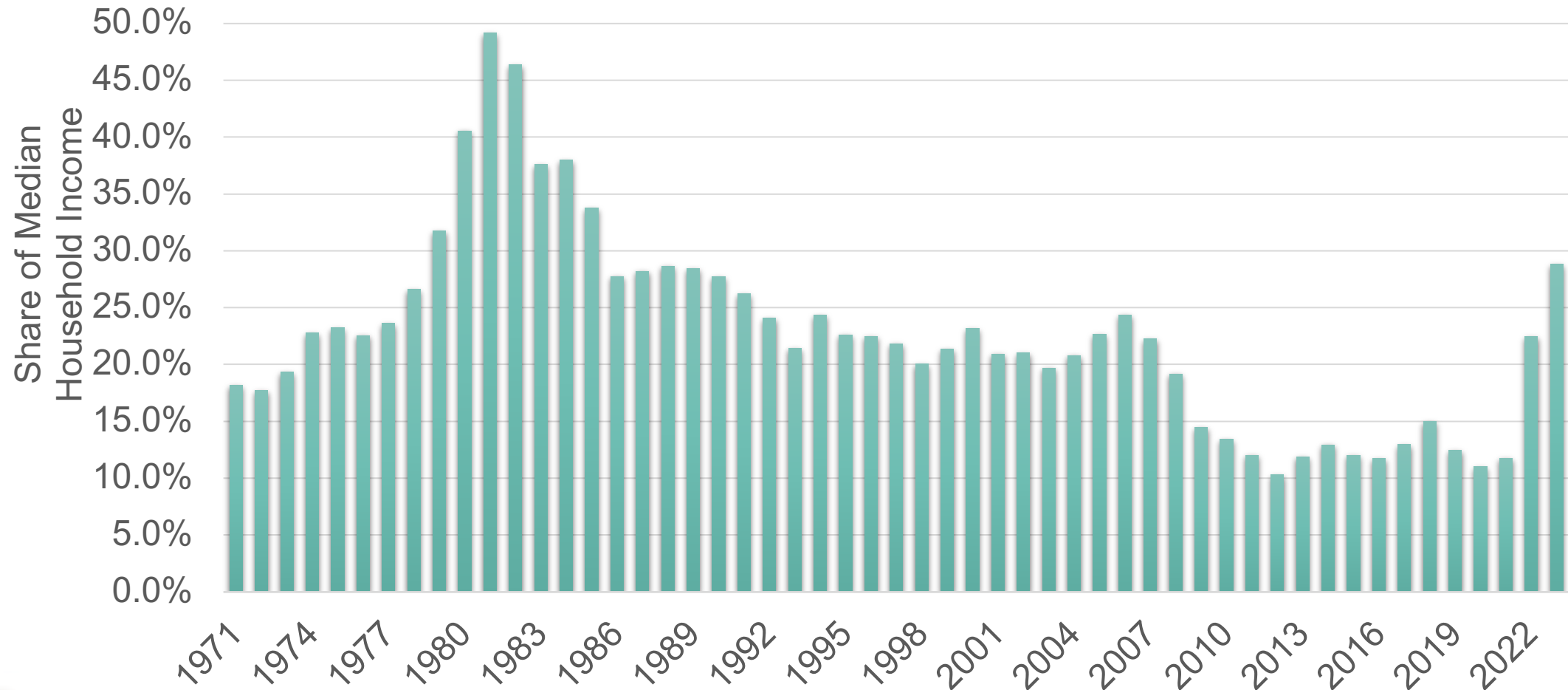
Note: Among all adults.



# Okay- but we can NEVER afford a house...

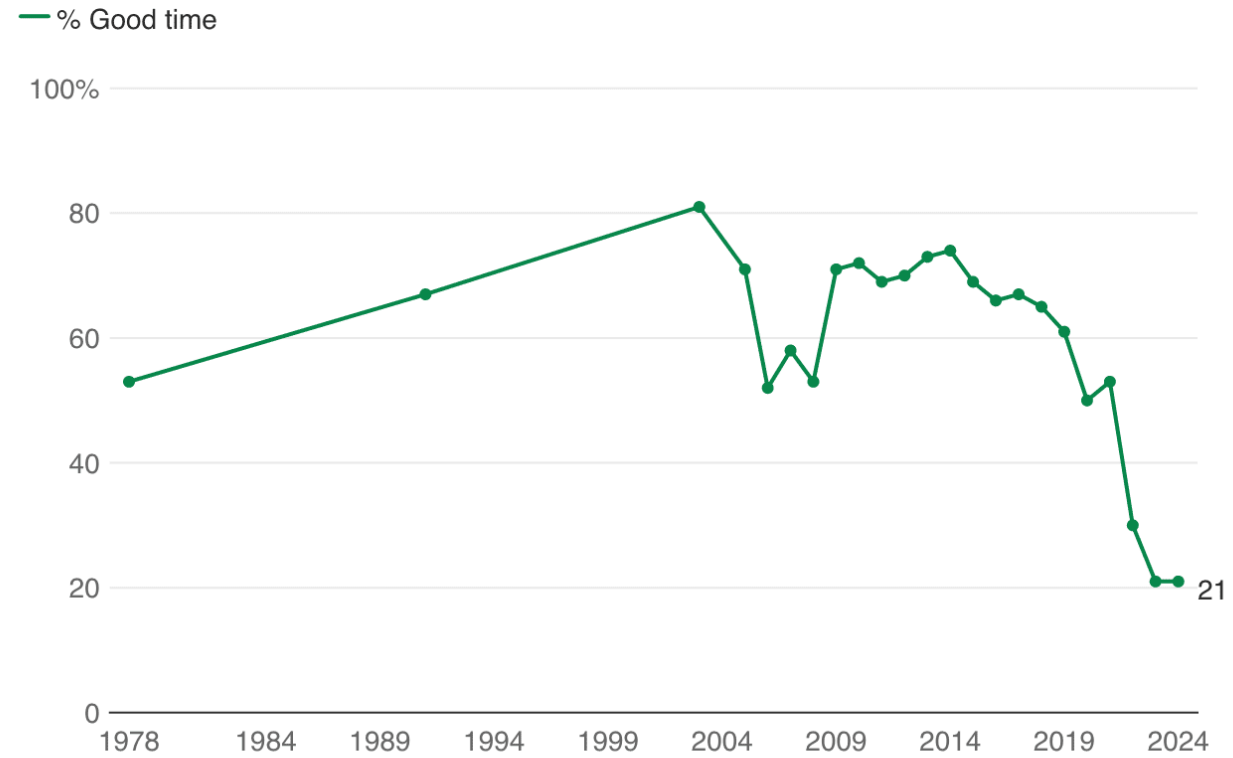
## Existing Home Affordability

Interest Payment on Median Priced Home at Current Mortgage Rates



## Americans' Positive View of U.S. Housing Market Remains at Record Low

*For people in general, do you think that now is a GOOD time or a BAD time to buy a house?*



GALLUP®



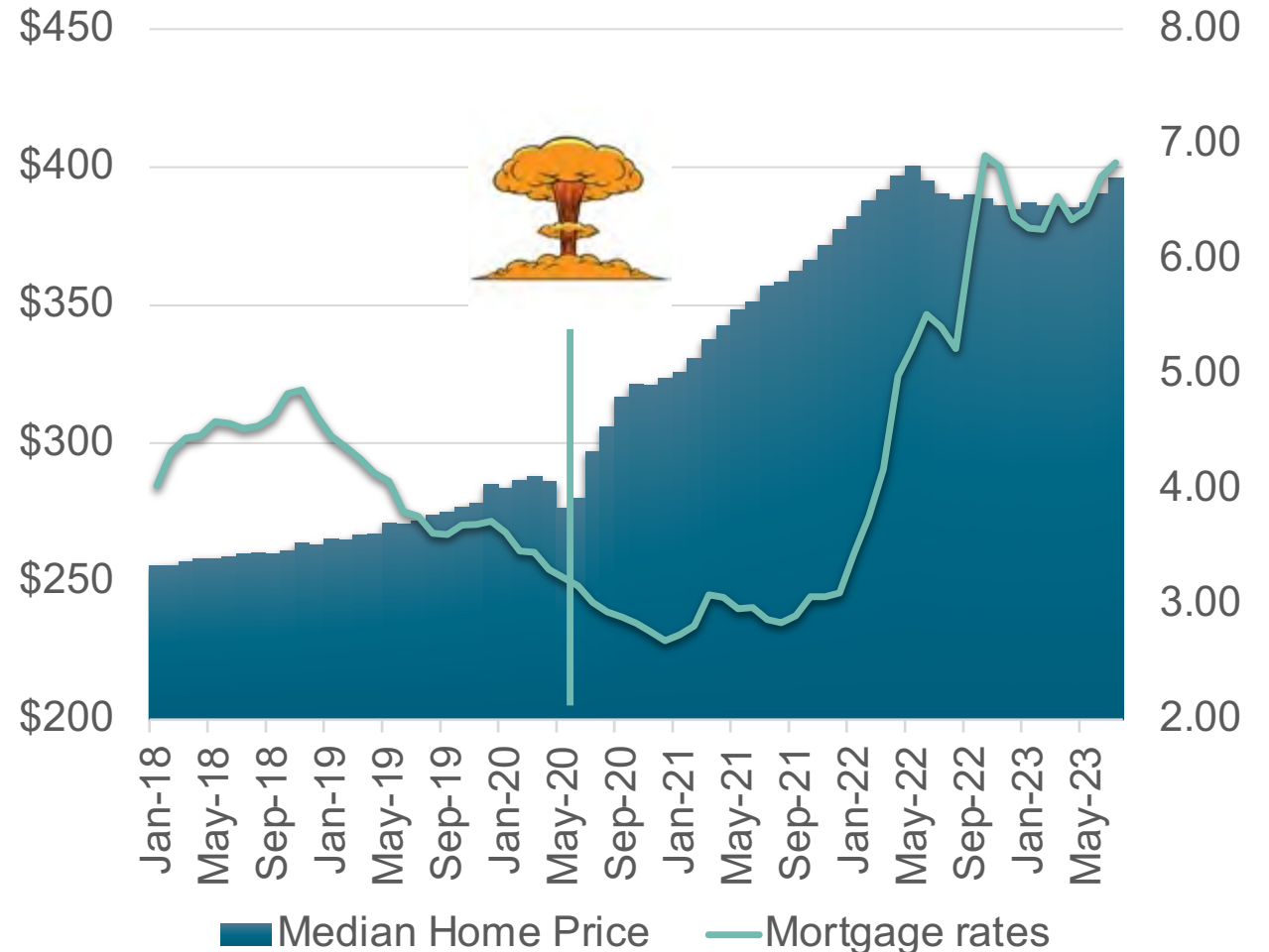
# Housing: A Rate Whiplash



Case Shiller Home Price Appreciation  
July 20 – July 22

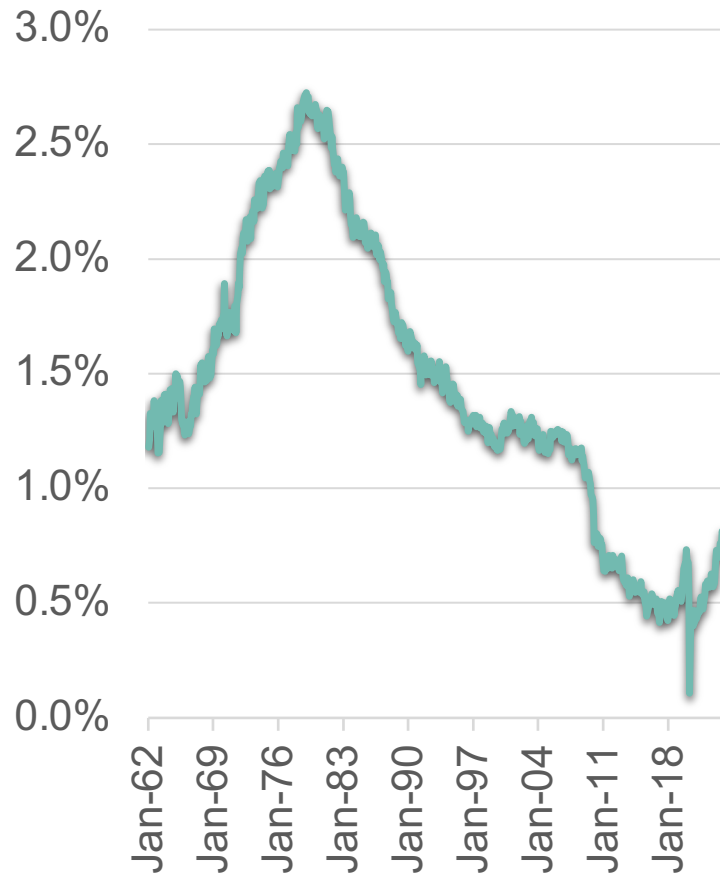
Tampa	64.0%	Los Angeles	37.9%
Phoenix	62.0%	SF	35.1%
Miami	61.4%	New York	34.9%
Dallas	54.2%	Boston	34.6%
Charlotte	49.5%	Portland	33.6%
LV	49.2%	Cleveland	30.9%
SD	49.1%	Detroit	29.4%
Atlanta	45.8%	Chicago	27.4%
Seattle	43.9%	DC	26.0%
Denver	40.3%	Minneapolis	24.6%

Existing Home Market

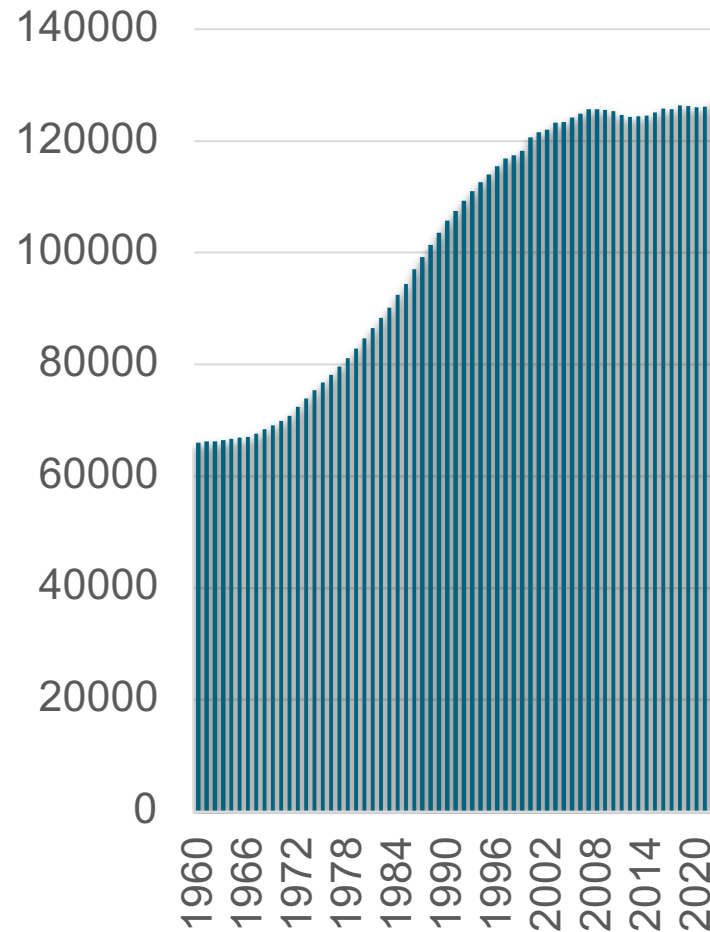


# Long Run Issue: Labor Supply

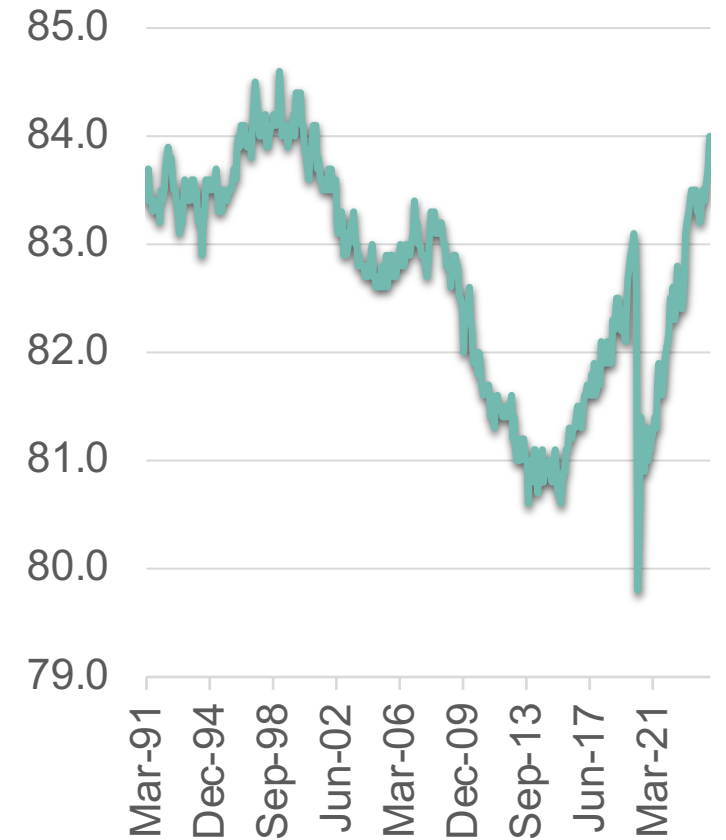
## 10 Year Average Labor Force Growth rate



## US Population 25-54



## Participation Rate 25-54 Year Olds (%)

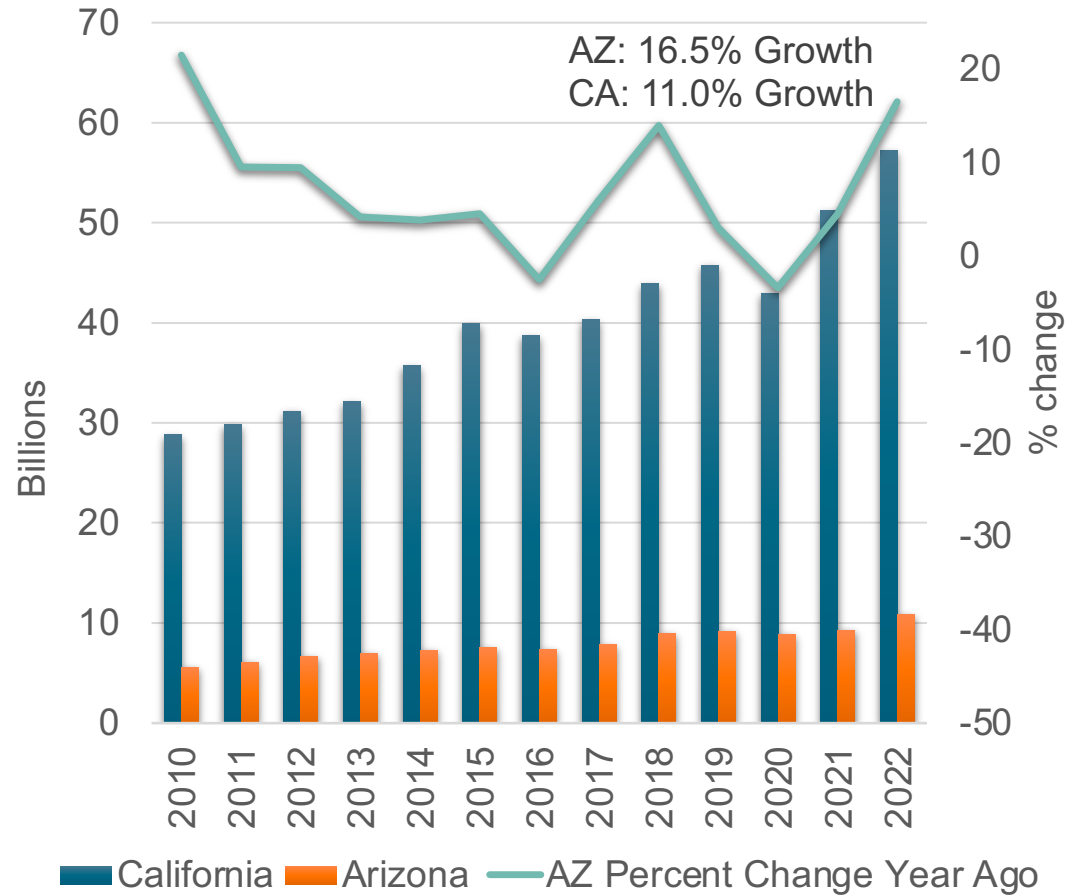


# Deepening Relationship Between the United States and Mexico

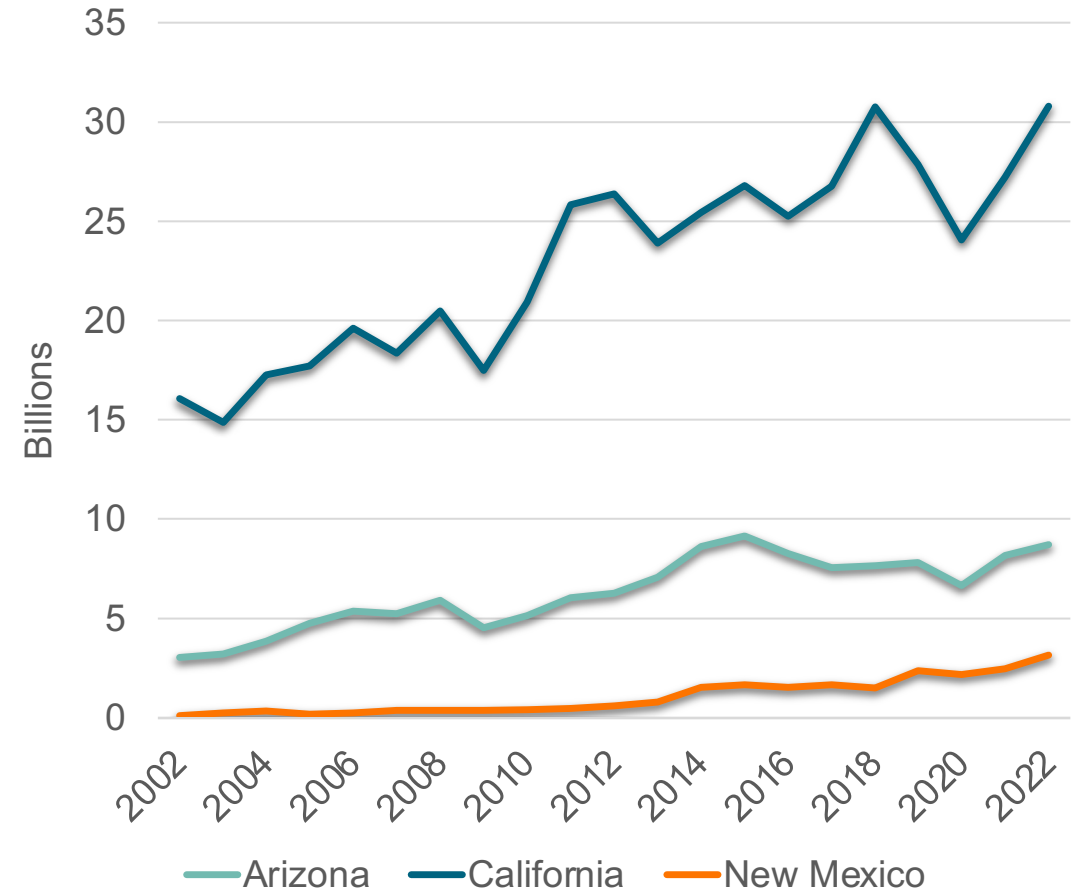


# Southern Border States

## Total Imports from Mexico



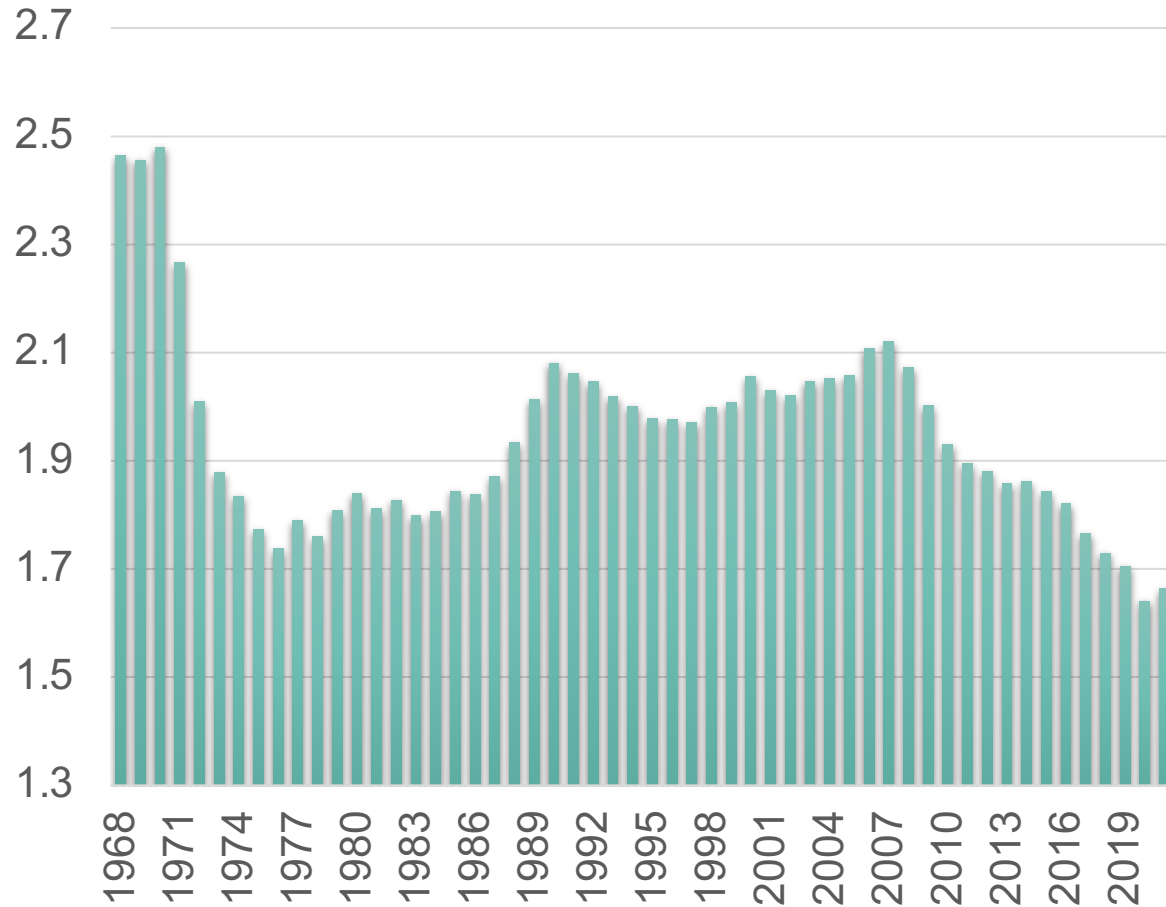
## Total Exports to Mexico



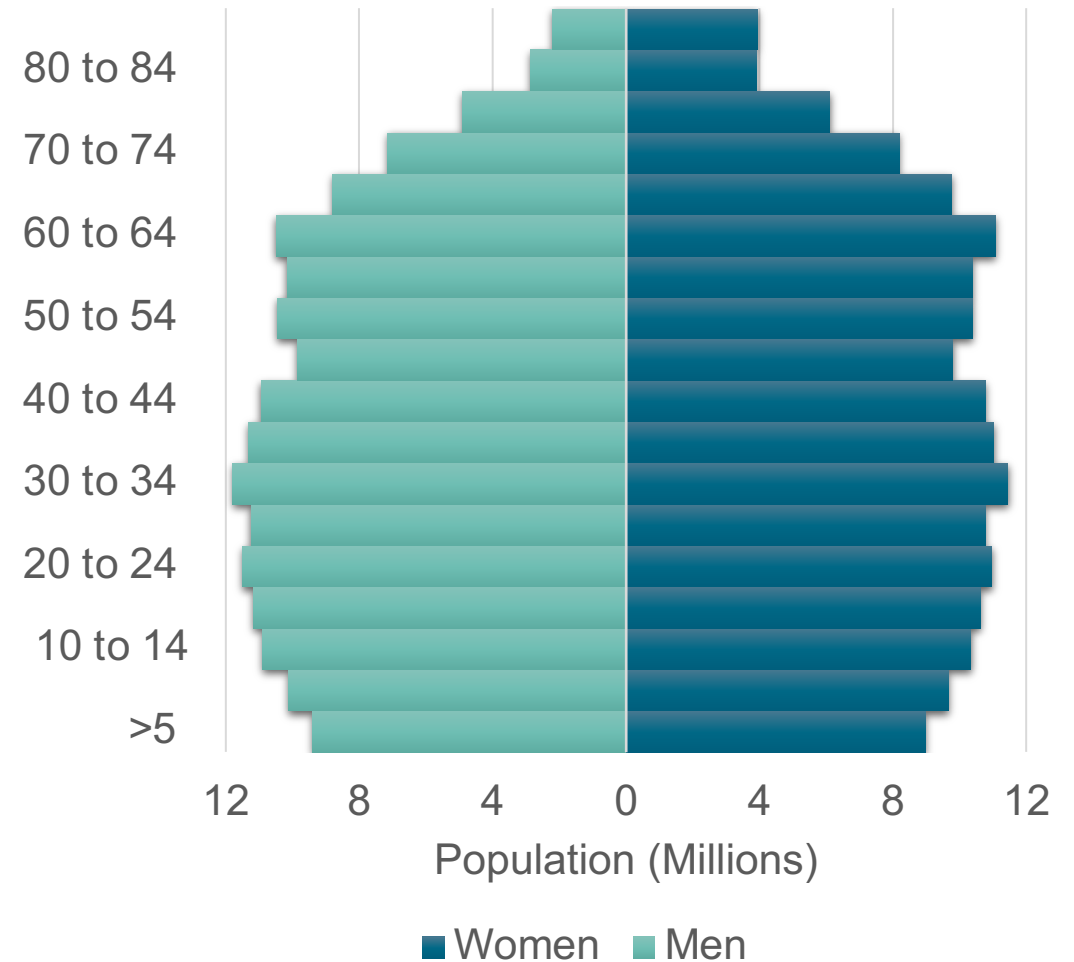


# Labor Supply Issues

## US Birth Rate



## 2022 US Population by Sex and Age



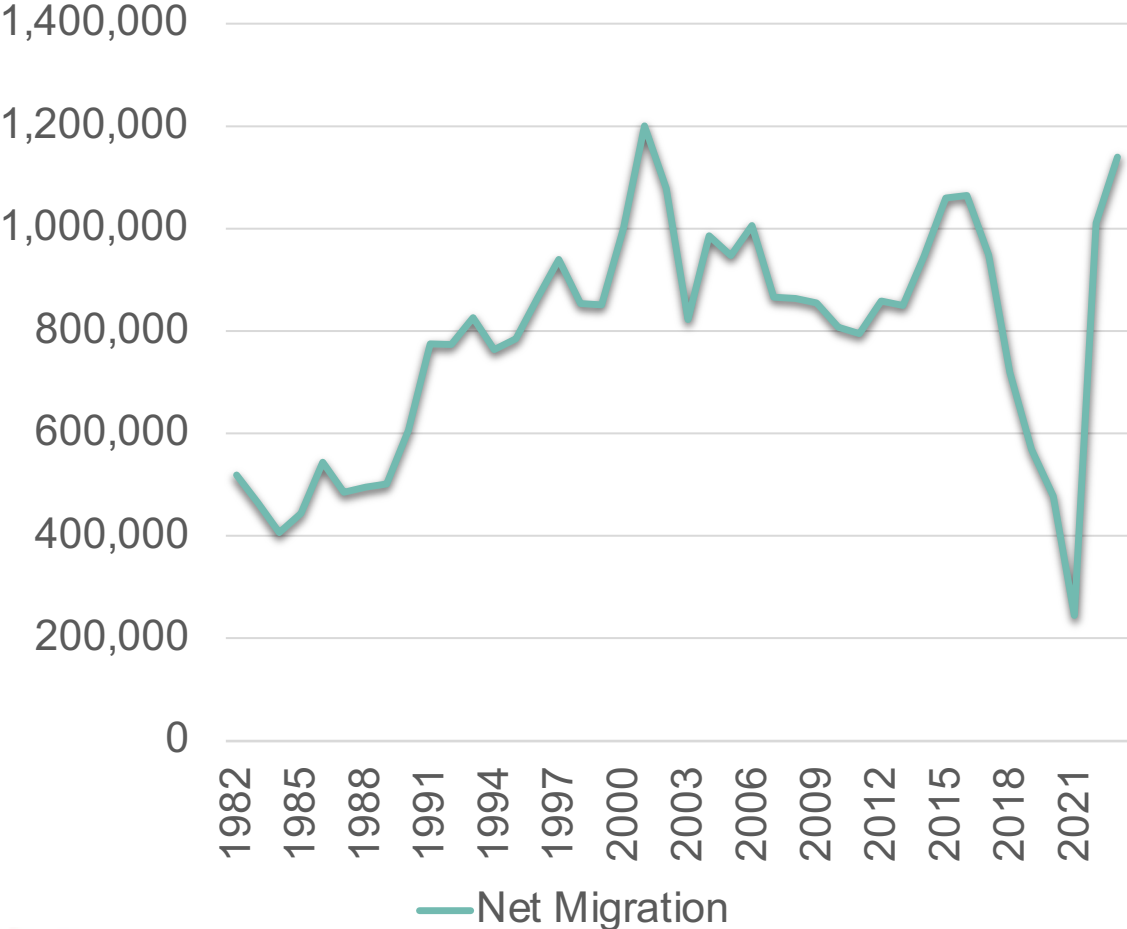
**Figure 8: Increase in Average Annual Growth Rate With Estimated Policy Shifts**

Policy Change	Boost in Annual Growth Rate	Estimated By
Enact immigration reform to increase number of workers	0.3%	<a href="#">CBO</a>
Reform the income tax code	0.05% - 0.3%	<a href="#">JCT, Treasury</a>
Increase the Social Security retirement ages by two years	0.15%	<a href="#">CBO</a>
Reduce deficits by \$4 trillion over ten years	0.1%	<a href="#">CBO</a>
Expand energy production at level of shale boom*	0.09%	<a href="#">CBO</a>
Repeal the Affordable Care Act ("Obamacare")	0.08%	<a href="#">CBO</a>
Ratify the Trans-Pacific Partnership	0.01%	<a href="#">U.S. ITC</a>
Increase public investment in infrastructure, education, and research by \$400 billion	0 - 0.01%	<a href="#">CBO</a>

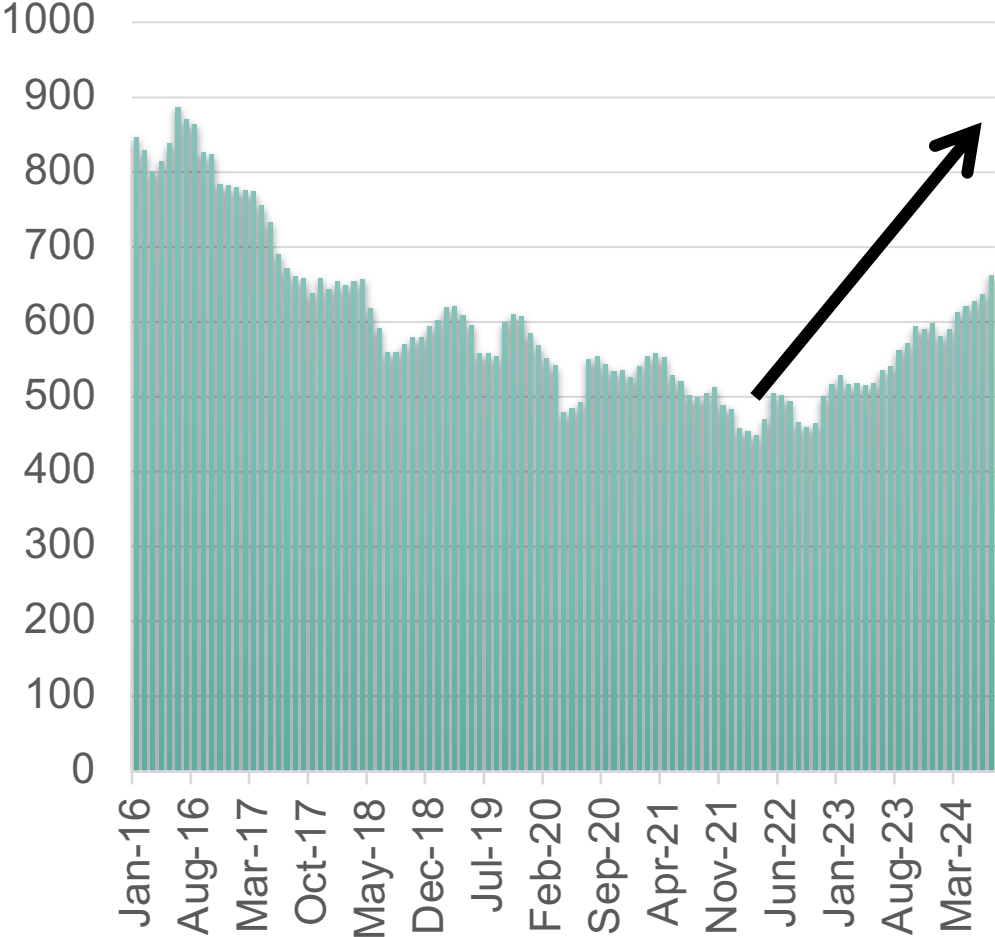


# Migration

### Sources of Population Growth

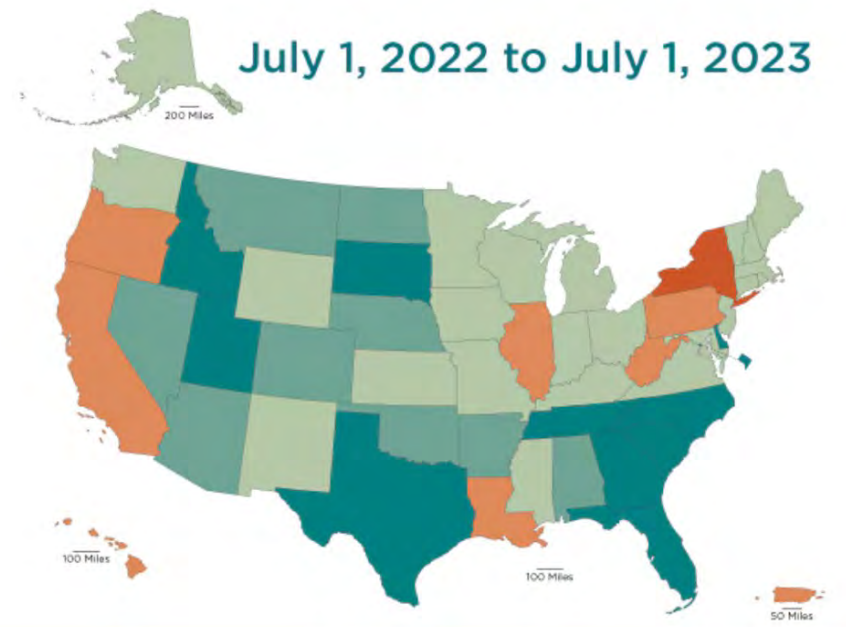
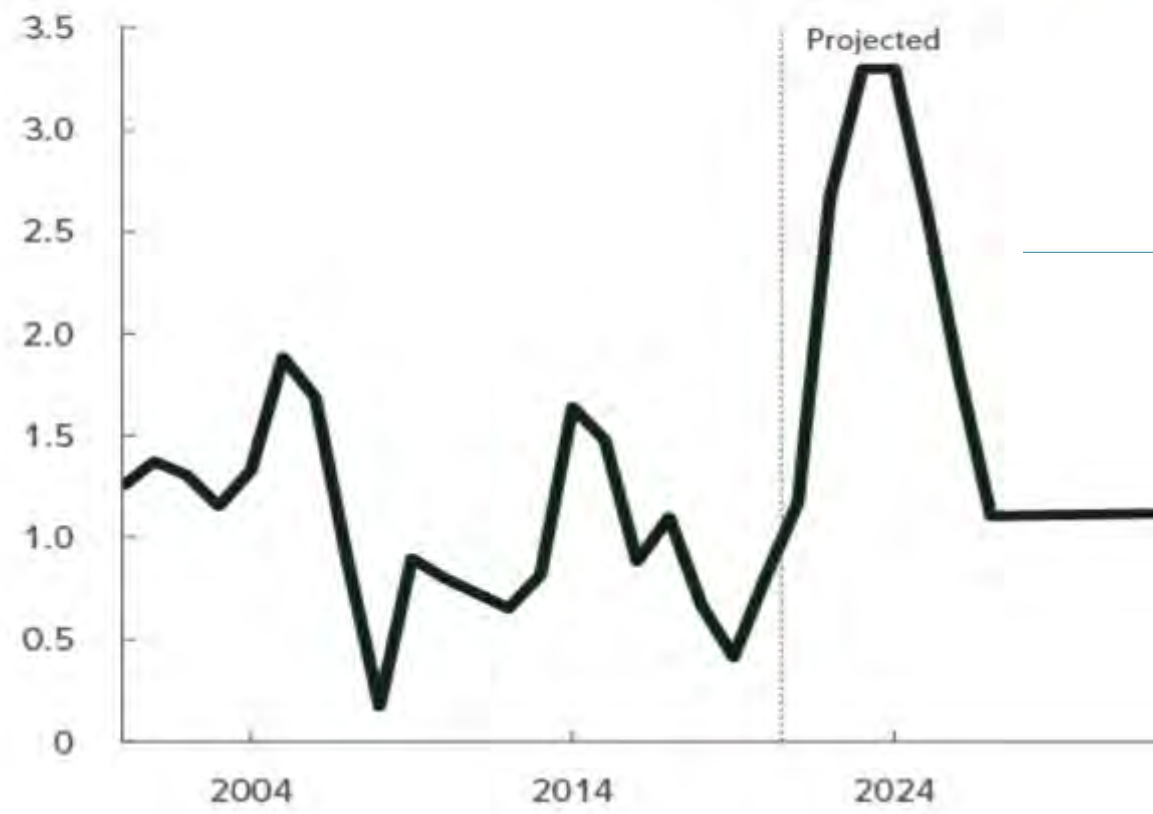
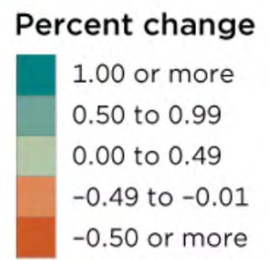


### Unemployment: New Entrants

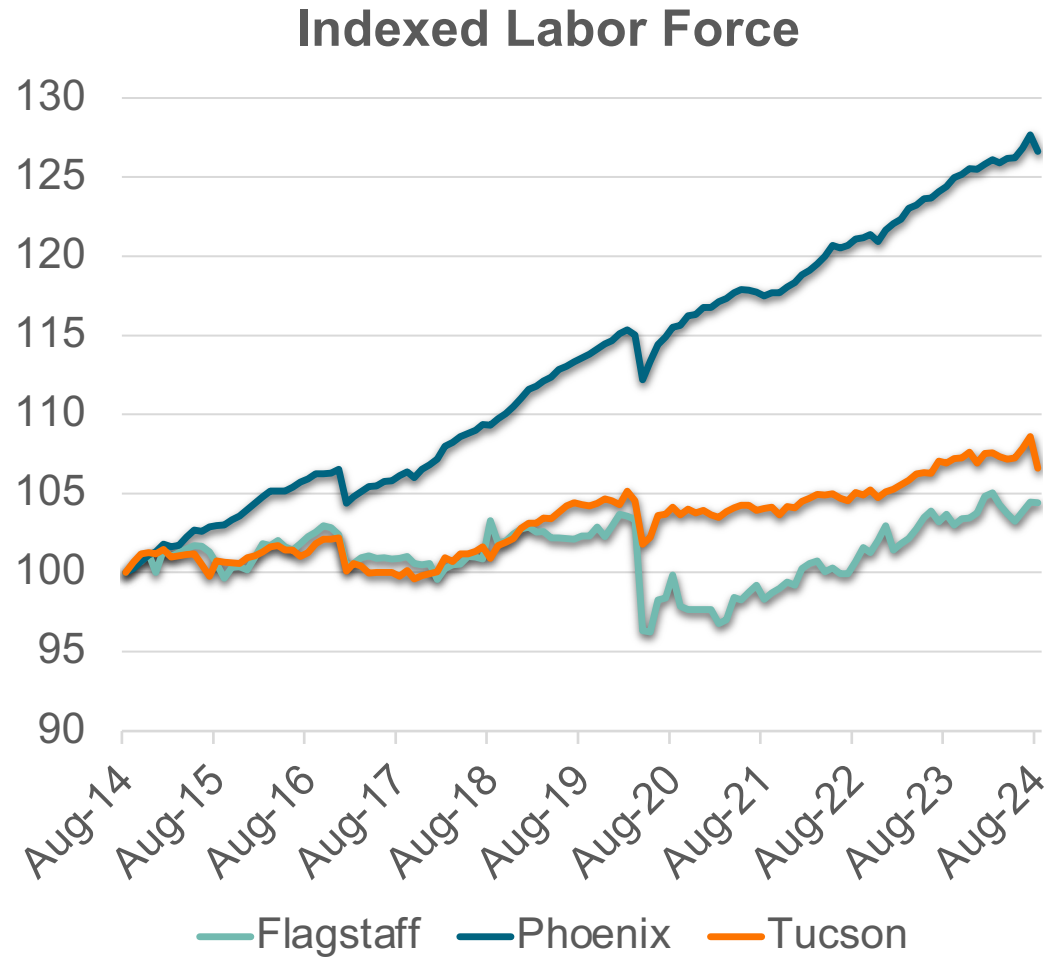


# Net Immigration

Millions of people



# Labor Force

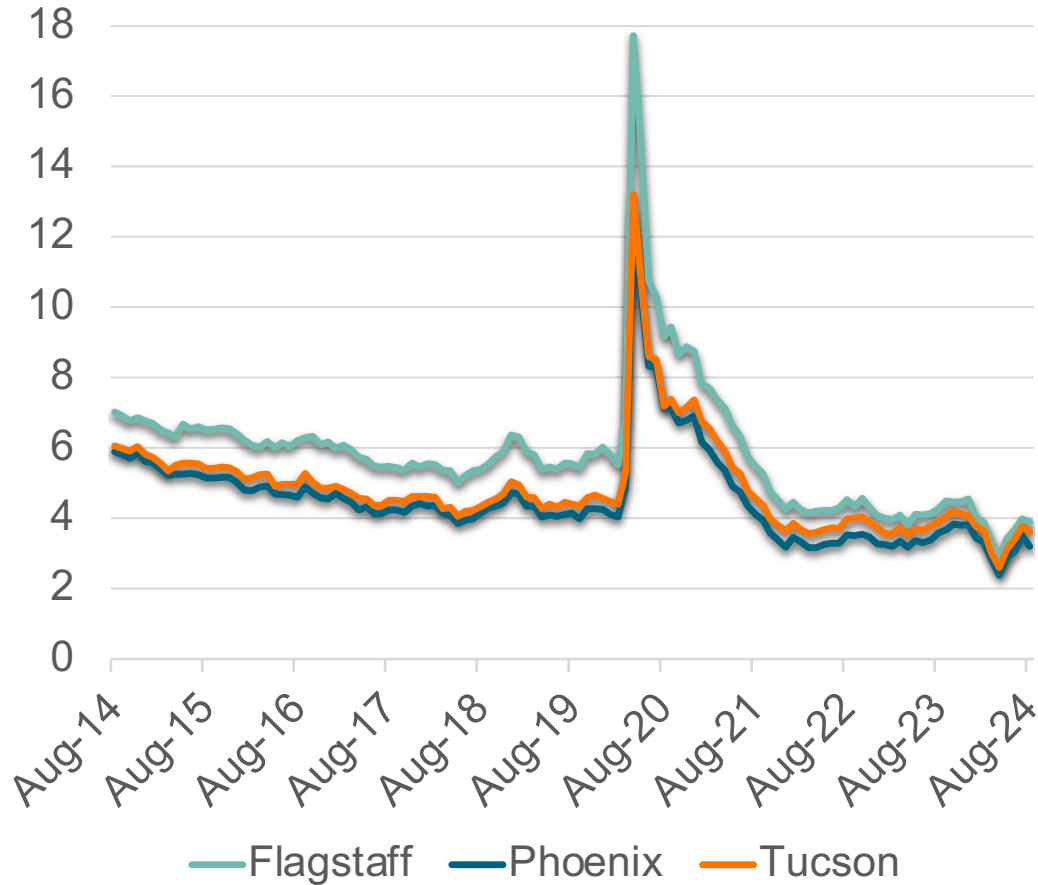


Location	Aug-24 LF (000s)	1-Year Chg. (%)	Chg. since Feb-20 (%)
United States	168,549.0	0.4	2.5
Phoenix	2,702.1	1.8	9.1
Salt Lake City	733.1	-0.4	6.6
Inland Empire	2,198.1	0.9	4.5
Denver	1,744.1	-0.3	4.0
Las Vegas	1,196.3	0.9	3.5
Tucson	494.6	-0.3	1.3
Flagstaff	76.2	0.7	0.8

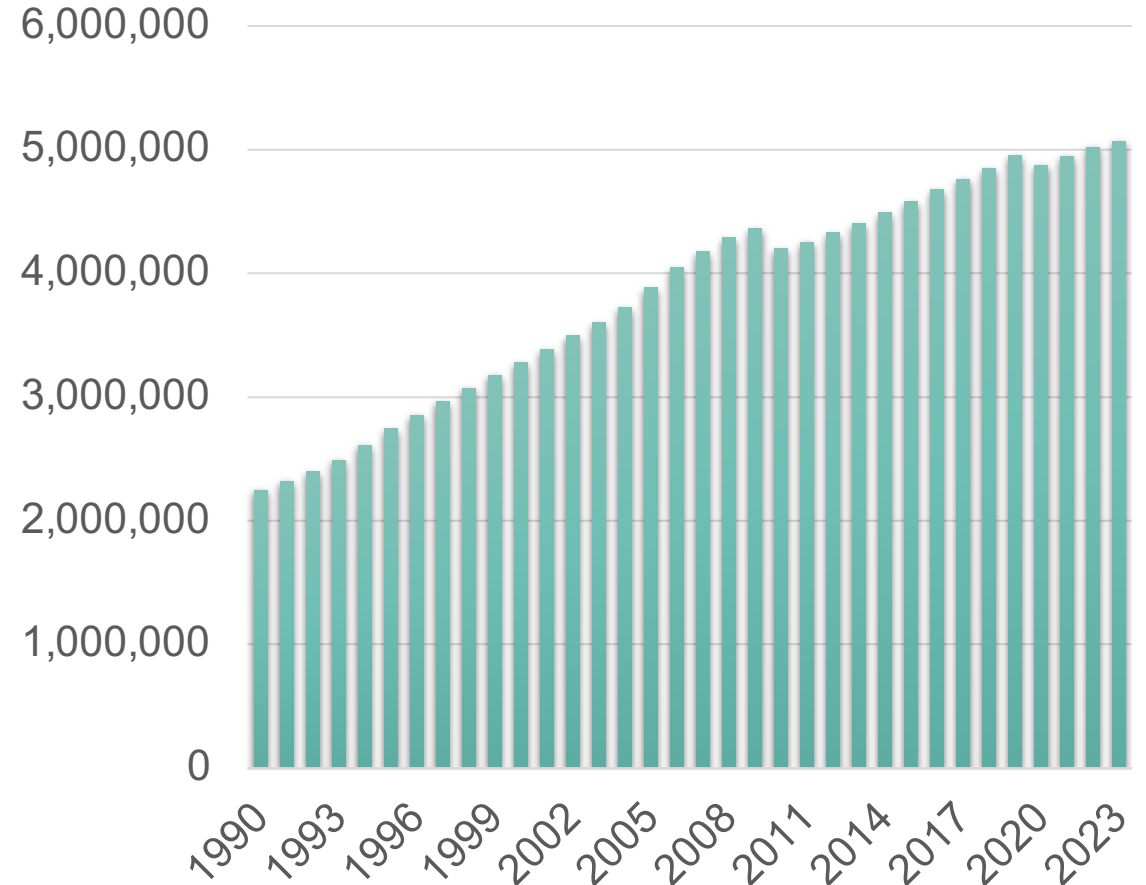


# Unemployment & Population Growth

## Unemployment Rate

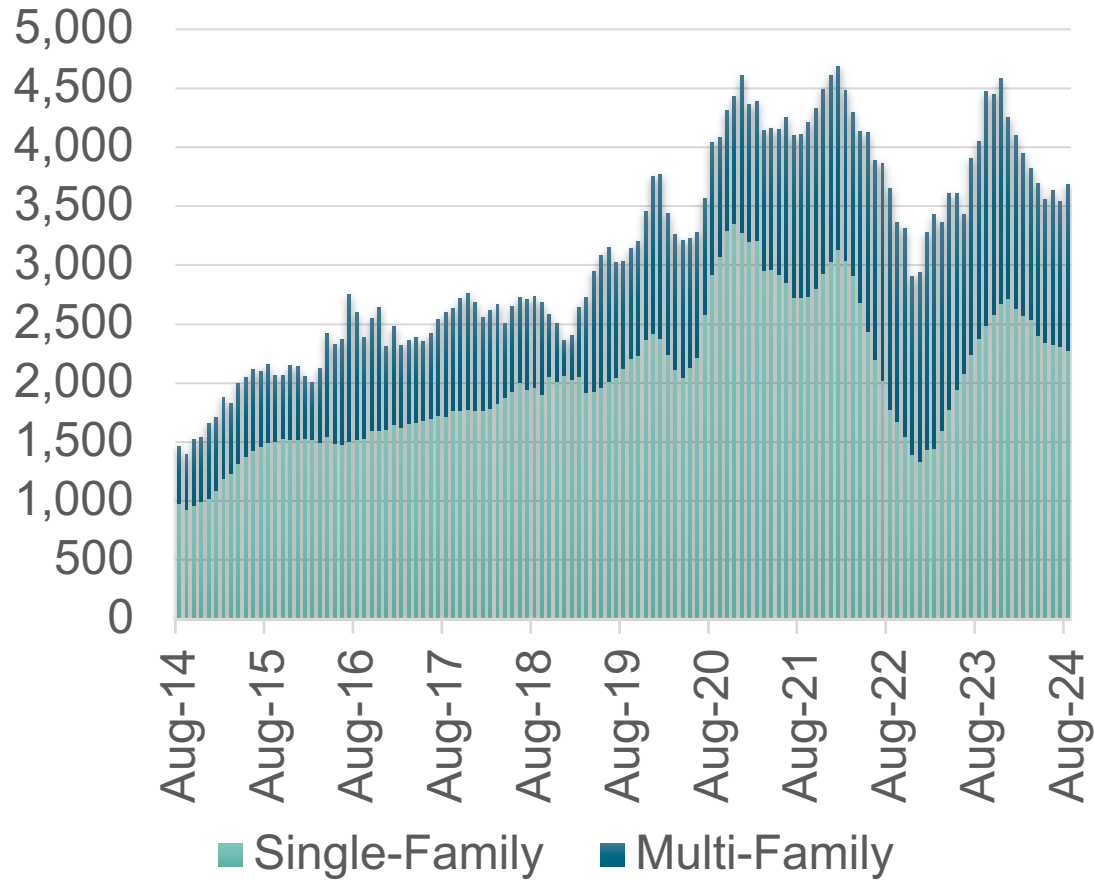


## Phoenix MSA Population

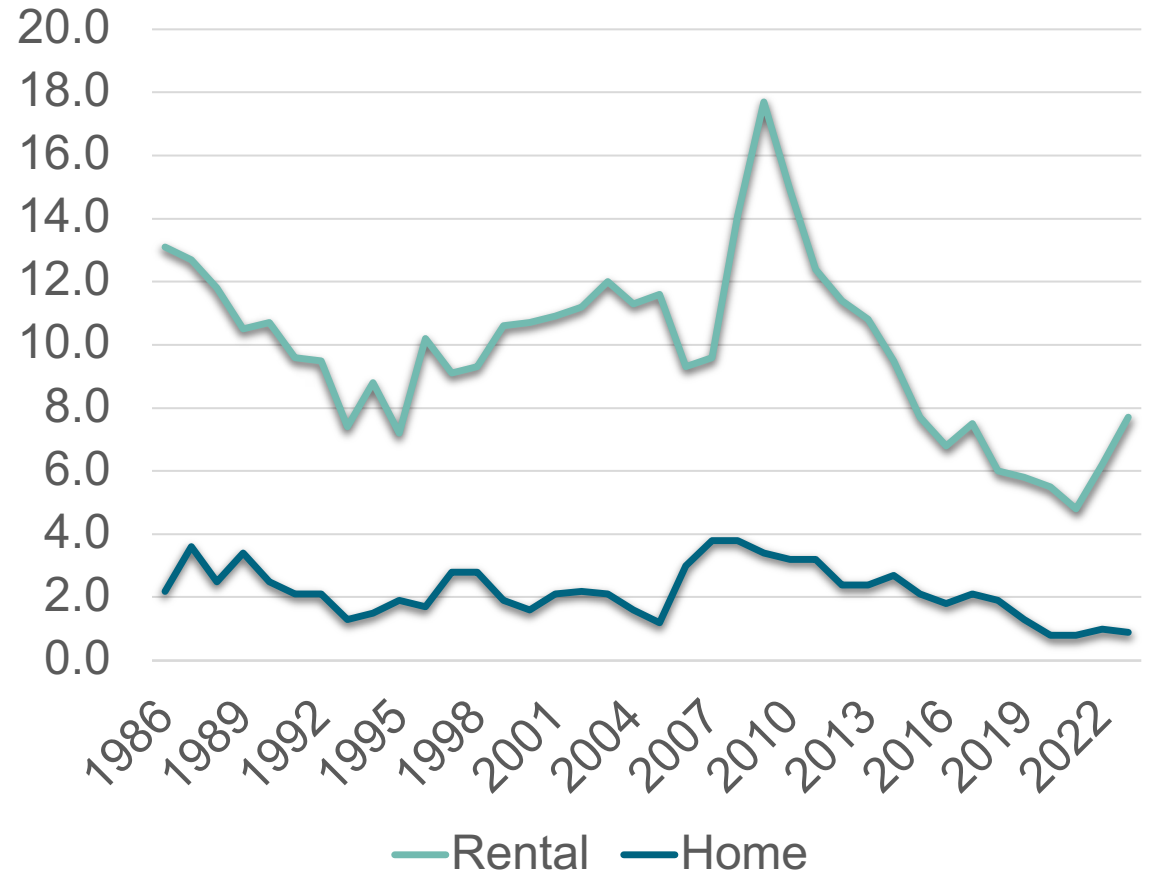


# Permits and Affordability

## Phoenix Residential Permits



## Arizona Housing Vacancy Rates



# Narratives of Fed Policy?

## The Federal Reserve Narrative

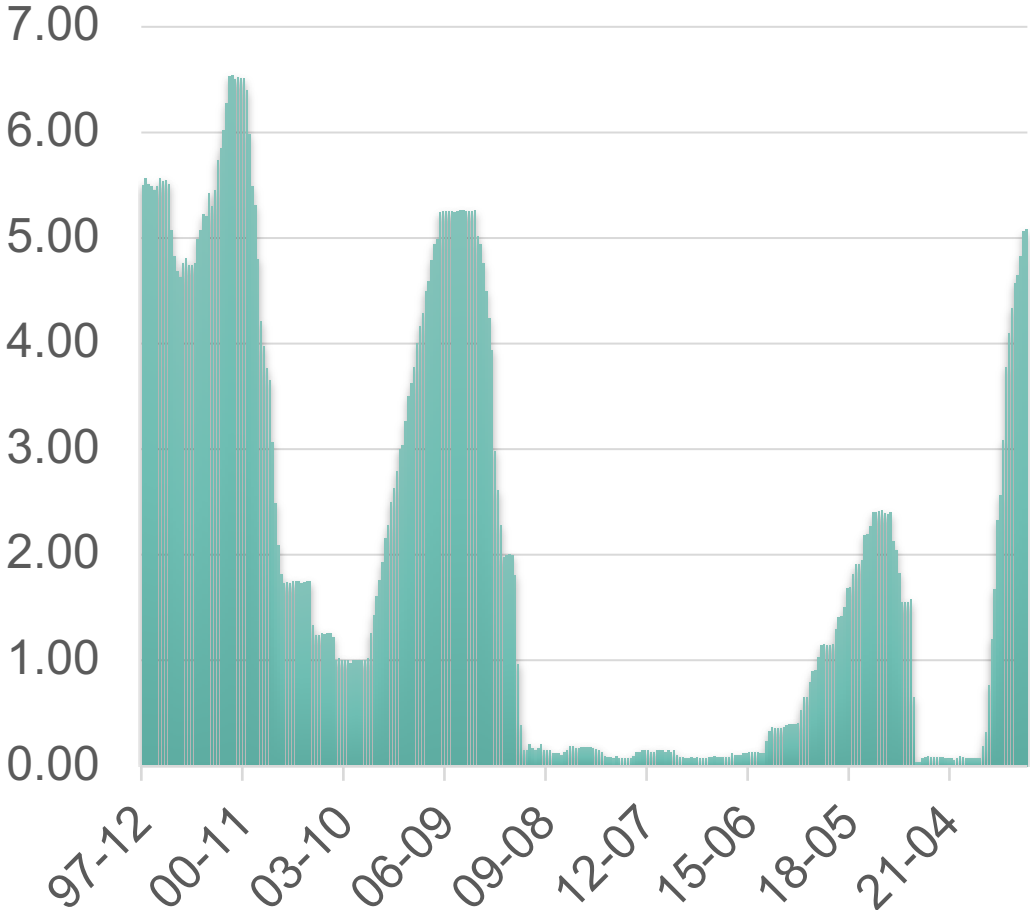
- US inflation due to some exogenous shock
- Inflation is now being driven by inflation expectations
- Inflation is causing substantial harm to American households
- The Fed must fight inflation and it is worth the loss of some jobs / higher unemployment



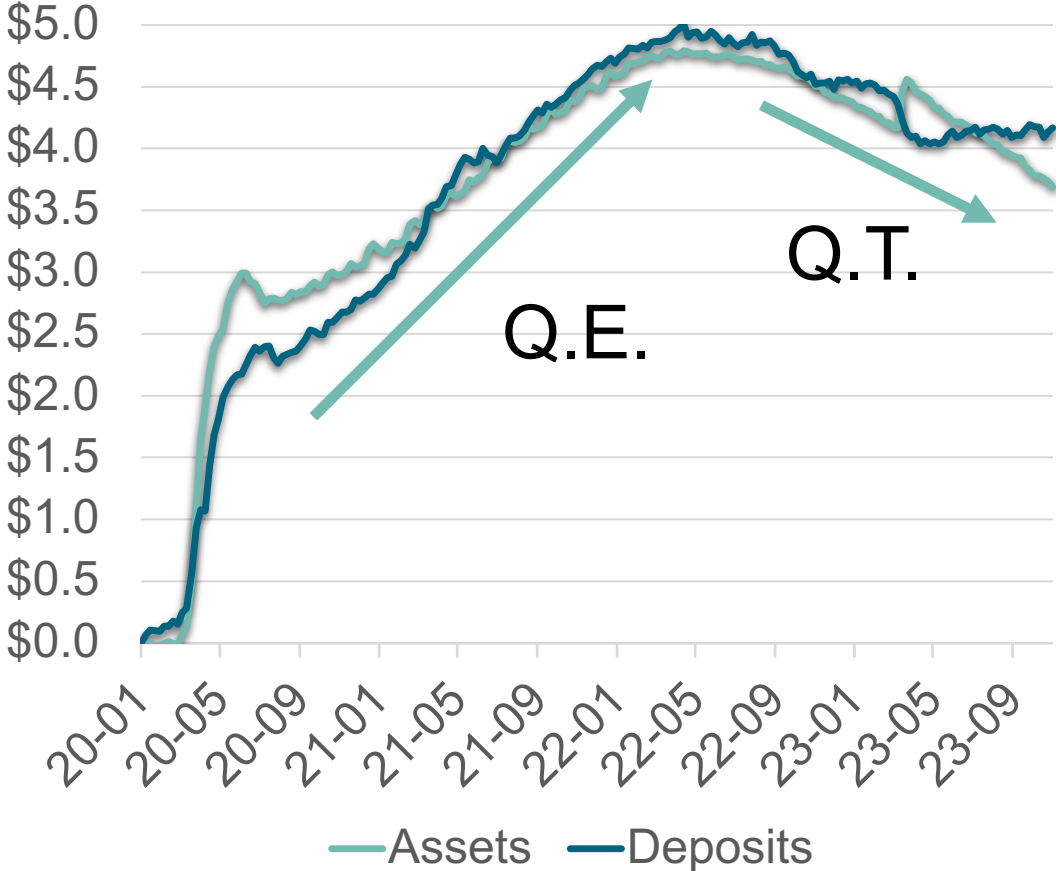


# The Fed Response

### Stage 1: Federal Funds Rate

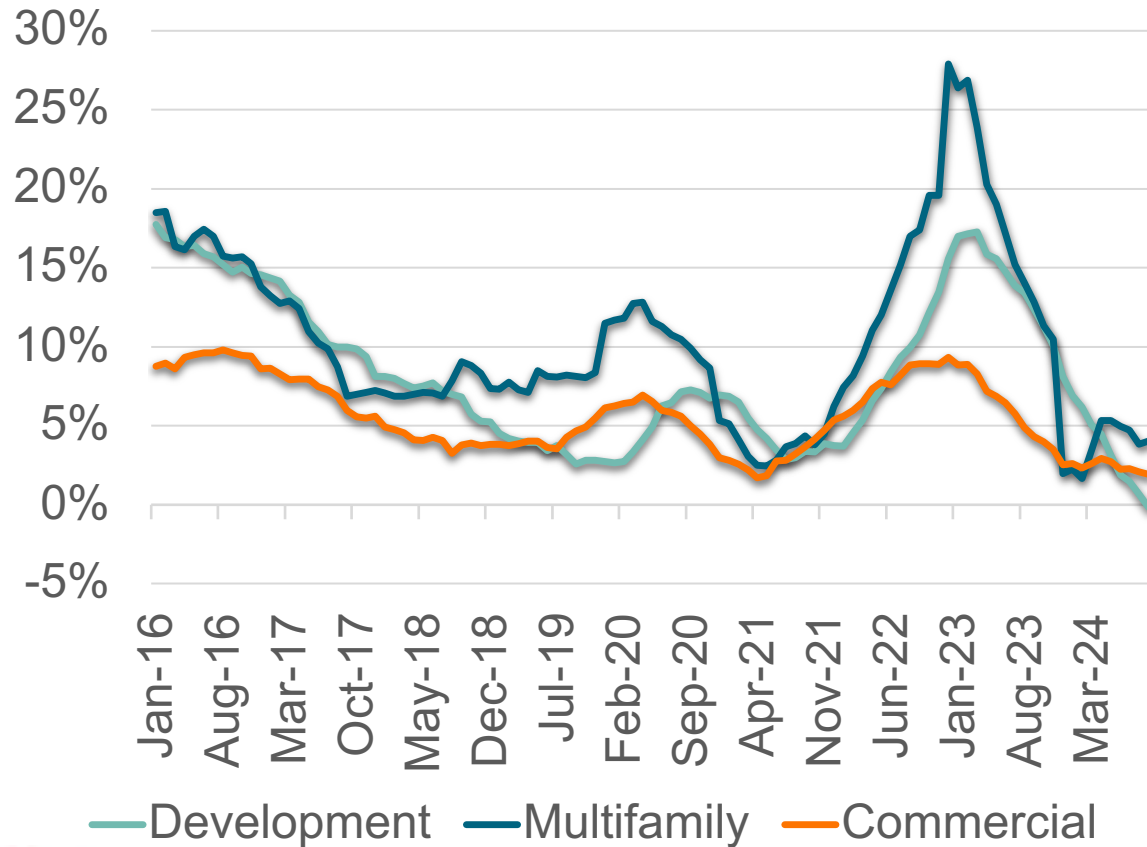


### Stage 2: Quantitative Tightening (Cumulative Trillions)

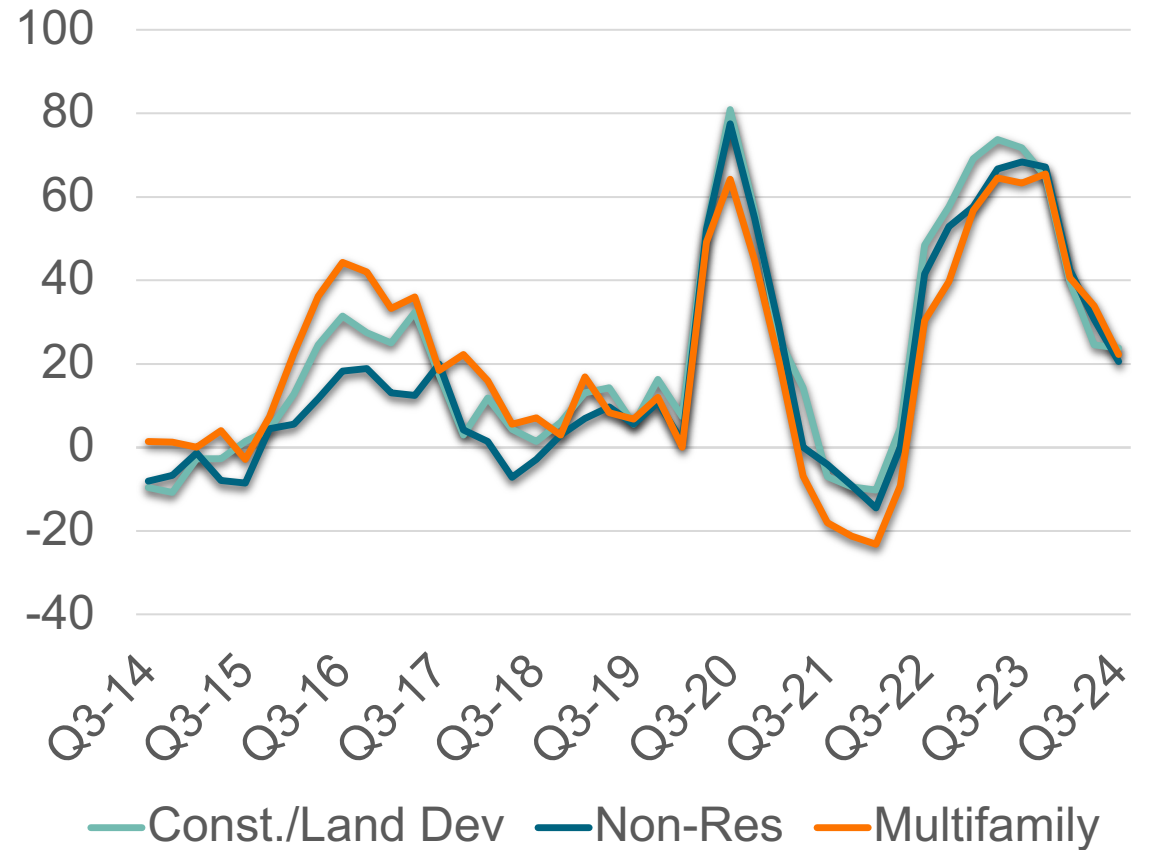


# Lending

## YoY Change Commercial Bank Loans Outstanding

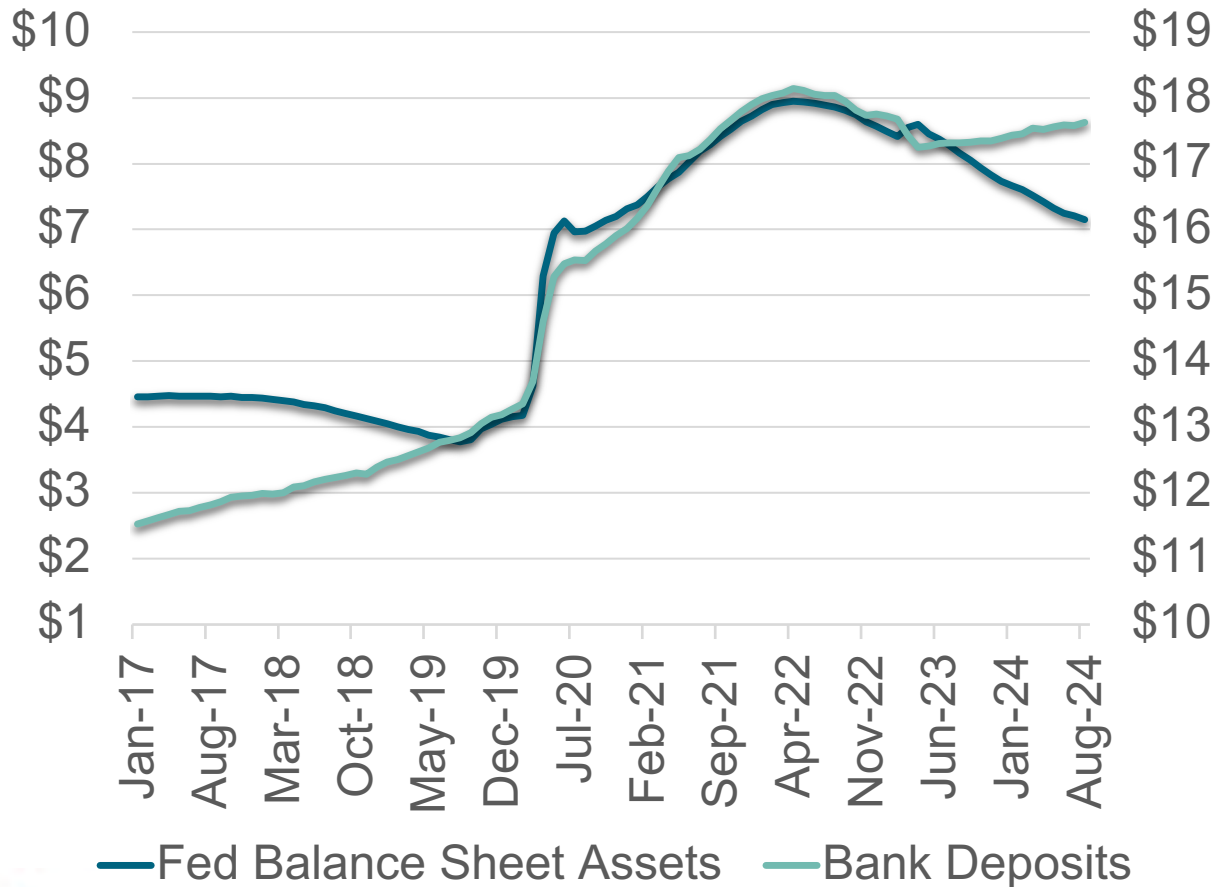


## Net % Tightening Standards for CRE Loans



# Credit Crunch: Quantity, Not Quality

## Deposits and the Fed Balance Sheet \$Trillions



Arizona Headquartered Banks	Deposits
Western Alliance Bank	\$66,597,570
BNC National Bank	\$799,834
Southwest Heritage Bank	\$774,508
1st Bank Yuma	\$569,873
Goldwater Bank, N.A.	\$309,136
Republic Bank of Arizona	\$252,907
Mission Bank	\$172,935
Gateway Commercial Bank	\$160,913
West Valley National Bank	\$55,594
Integro Bank	\$47,917
Scottsdale Community Bank	\$39,724
Zenith Bank & Trust	\$39,466
Gainey Business Bank	\$29,029

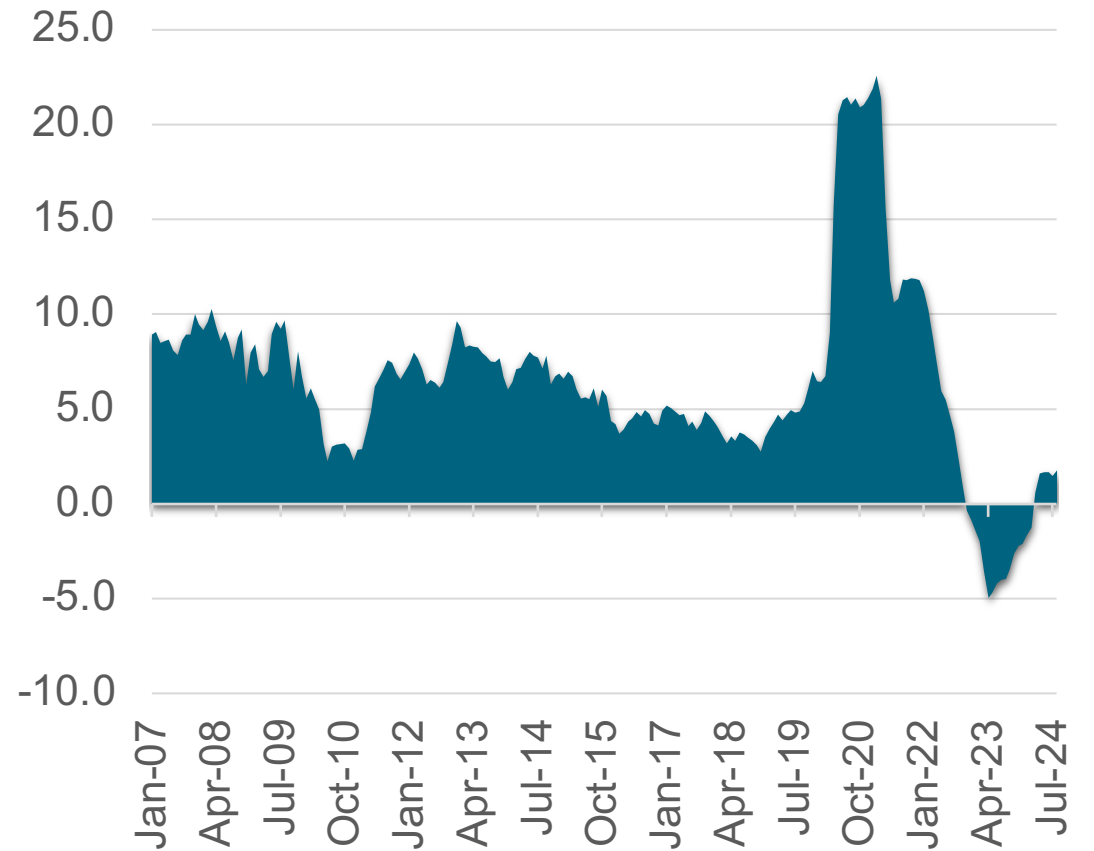


# Hold the cork...

**Need to Unwind the Yield Curve:**  
Rate on 10 Year – Rate on 3 Month



**Credit still constrained by QT**  
YoY Growth Commercial Bank Deposits (%)



# Powell's Legacy: Frothy Asset Prices

US P/E Ratio  
HH Net Worth / GDP



Shiller Cyclically Adjusted P/E Ratio

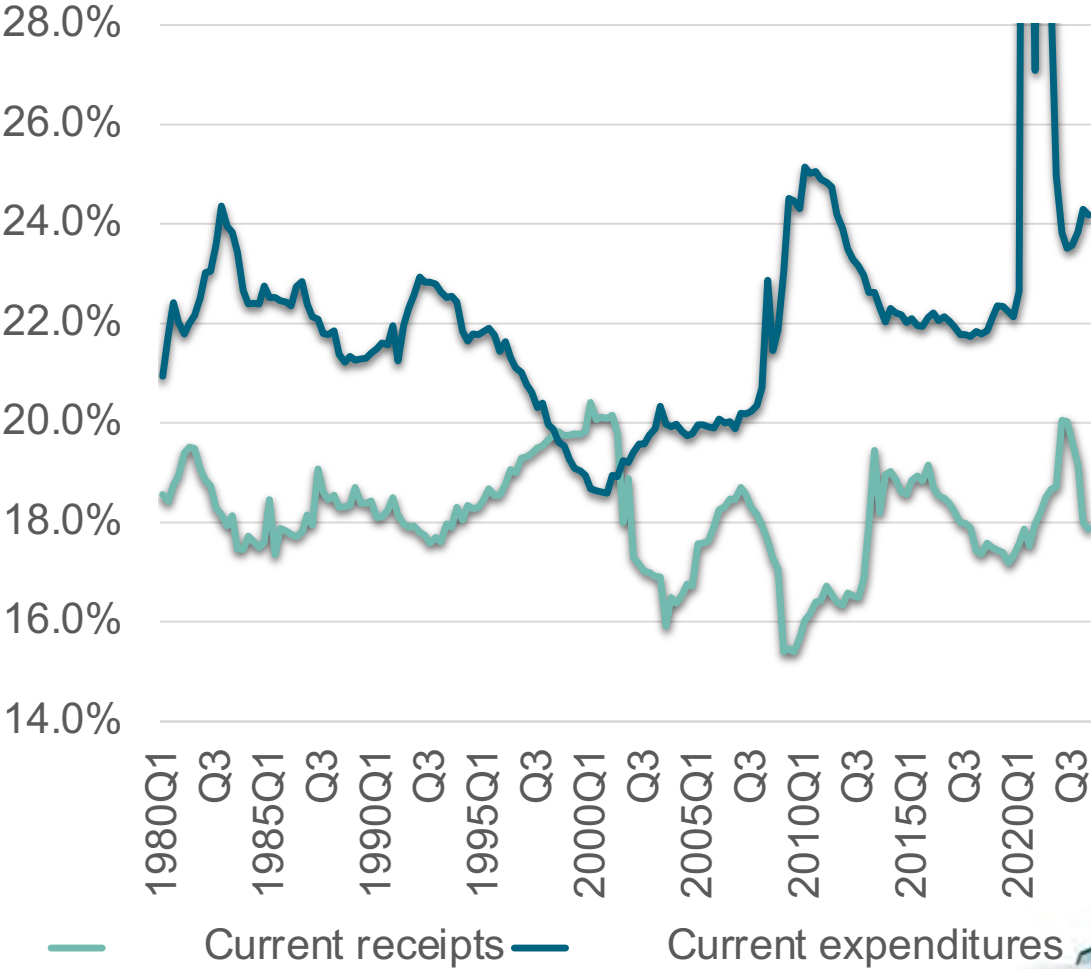


# Powell's Legacy: The Federal Deficit

### Federal Deficit, Percent of GDP



### A Spending Issue



# Growing Imbalances

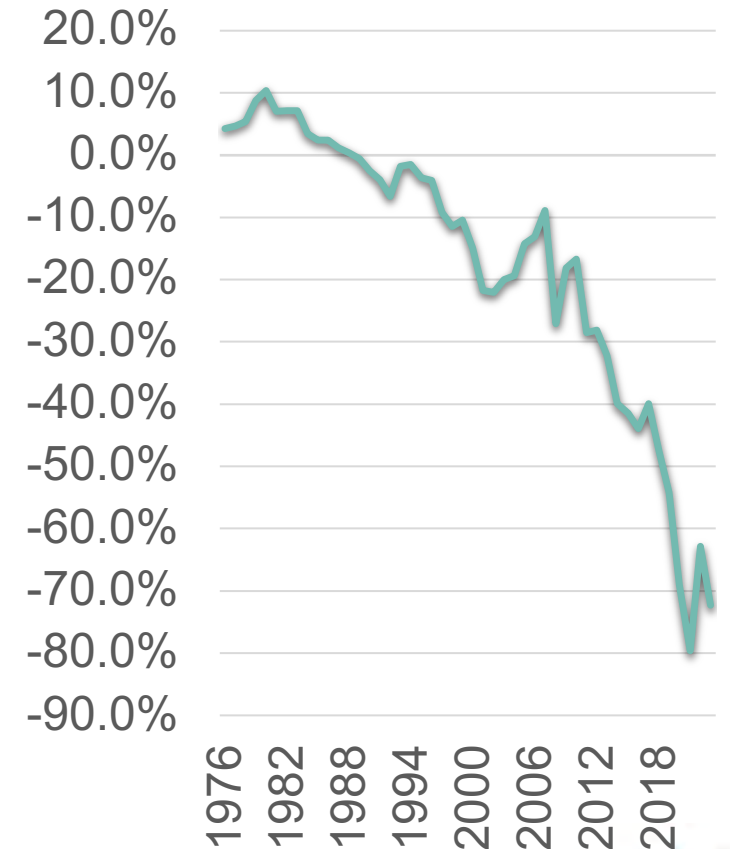
## US Household Savings Rate (%)



## US Current Account Deficit



## US Net Investment Position as % US GDP



# What about the election?



## Differences in Economic Policy

### Views on economy

- Its terrible, and its all *their* fault
- *Reality the US economy is overheated*

### Fiscal Policy

- Tax Less, Spend More
- *Reality: We need to close the deficit*

### Industry and Immigration

- Tariffs & Close Border or Subsidies & Close Border
- *Reality: Fix Immigration and the US will be able to compete*





# Out of the Woods?

*We were never in the woods.*

- Consumer demand is too strong
- Public debt / asset values driving excess spending
- Short run: the US expansion (4+ years old) will continue

## Arizona & Phoenix

- Still on forefront of national growth
- Housing Market under-supplied / constrained by rates

## Headwinds will intensify

- US Economy is overheating,
- Fed deficits and frothy asset markets, external imbalances growing
- Canary in the coalmine? \$US

## The real issues?

- The narrative is running amuck
- Political chaos in its wake leaving US policy rudderless



“People can believe pretty much whatever they want to believe about moral and political issues, as long as some other people near them believe it.

— Jonathan Haidt, *The Righteous Mind: Why Good People are Divided by Politics and Religion*

“New information platforms feed the ancient instinct people have to find information that syncs with their perspectives: people tend to seek information that aligns with their views.”

“The information environment will not improve. The problem is human nature”

— Pew Charitable Trust, *The Future of Truth and Misinformation Online*

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Or contact:  
[Kristen@beaconecon.com](mailto:Kristen@beaconecon.com)

# *Thank You!*



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- Industry and Labor Market Studies
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