

Economic & Financial Markets

Monthly Review

December 2022

Growth accelerates, but likely to be short-lived

Economic data are both
naughty and nice entering
the holiday season

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Market momentum
builds to year-end

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The case for
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4 Economic Review **Economic data are both naughty and nice entering the holiday season**

It is the time of year for making lists and checking them twice, and this month's economic review will be used for exactly that. For our purposes, economic indicators making the nice list will be those which are still driving growth (centered on consumer data), while the indicators getting a lump of coal in their stockings (including inflation and leading growth indicators) are contributing in some way to a slowdown or eventual downturn.

5 Financial Markets **Market momentum builds to year-end**

The S&P 500 index added more than five percent in November, lifting the fourth-quarter gain to more than 12 percent. Midcaps led domestic equity markets, adding roughly 16 percent since the end of September. Still, the strong performance failed to keep up with the over 18 percent increase by international developed country markets. Fixed-income investors got a break in November as the 10-year government yield fell for the first time in four months. Oil's modest retreat last month helped as inflation-wary investors hoped for some relief in 2023.

6 The Outlook **The case for disinflation**

It was one year ago that the Federal Reserve dropped the word "transitory" from its official communiques, as it was increasingly clear at the time that the price pressures that began building in early 2021 would carry well into 2022. But while this run of inflation has proven to be far from fleeting, there has also been growing evidence of late of its impermanence.

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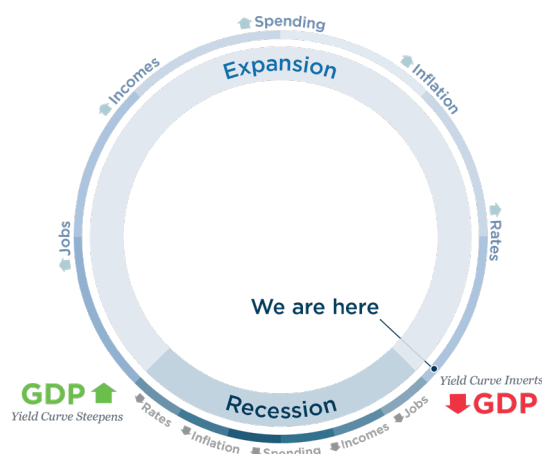
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As of December 2022



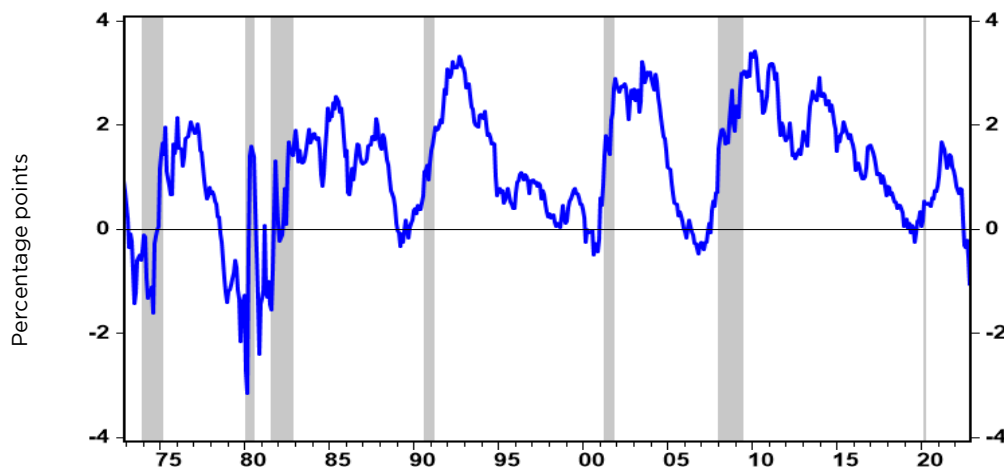
The Fed has responded to strong inflationary pressures with a significant tightening of monetary policy this year. Sharply rising inflation and interest rates, along with Fed tightening, are usually later-cycle phenomena. While trend growth has slowed, we do not expect this expansion to end soon — but the odds of a downturn later in 2023 have risen significantly.

Yield Curve

Spread between
10-year and 1-year
U.S. Treasury yields

One of the best predictors of an economic downturn is a fully inverted yield curve, when short-term interest rates are above long-term rates for a sustained period.

The inversion between the 10- and 1-year Treasury note yields deepened further over November — flashing a red warning light for 2023. Moreover, the federal funds rate moved higher than longer duration Treasuries following the Fed's 75 basis point rate hike in early November. The full inversion of the yield curve (10-year yield less the fed funds rate), although not yet sustained for a few months, adds to the recessionary signals building across the economy.



Sources: Bureau of Labor Statistics; Haver Analytics
Shaded areas depict recessionary periods

Economic data are both naughty and nice entering the holiday season

It is the time of year for making lists and checking them twice, and this month's economic review will be used for exactly that. For our purposes, economic indicators making the nice list will be those that are still driving growth, while the indicators getting a lump of coal in their stockings are contributing in some way to a slowdown or eventual downturn.

Nice list centers on consumer data

First, we'll start with the nice list, which is not as long this year as growth conditions generally slow. For starters, nearly all labor data indicate that the market for workers remains very tight. Jobs are plentiful, as evidenced by resilient job growth, an extremely low unemployment rate, and total job openings which, although down sharply from March's record high, remain far higher than any other time on record prior to the current expansion. Additionally, wage growth continues to be very strong. The 12-month change in average hourly earnings of 5.1 percent in November, while still being outpaced by inflation, is lifting household income and supporting spending activity.

Retail spending in October was strong — even on inflation-adjusted terms — and the momentum for the consumer side should boost economic growth during the fourth quarter. Continued spending growth in November is likely given the solid payroll numbers and higher wage income mentioned above. Consumers in October bucked the trend of shifting expenditures from goods to services; while it was a solid month for services, they were outpaced by goods, which was led by the best month for durable goods expenditures since January. This jibes with October's durable goods orders, which were strong despite a high interest rate environment, which typically drives down demand for big-ticket items.

All the indicators on the nice list, although good for economic growth in the short run, also add to inflationary pressures. In the

current economic environment where the Fed has promised to do what is necessary to bring about price stability, the strength of the "nice" data raise the odds of further interest rate hikes in 2023 and a higher terminal rate for the fed funds rate.

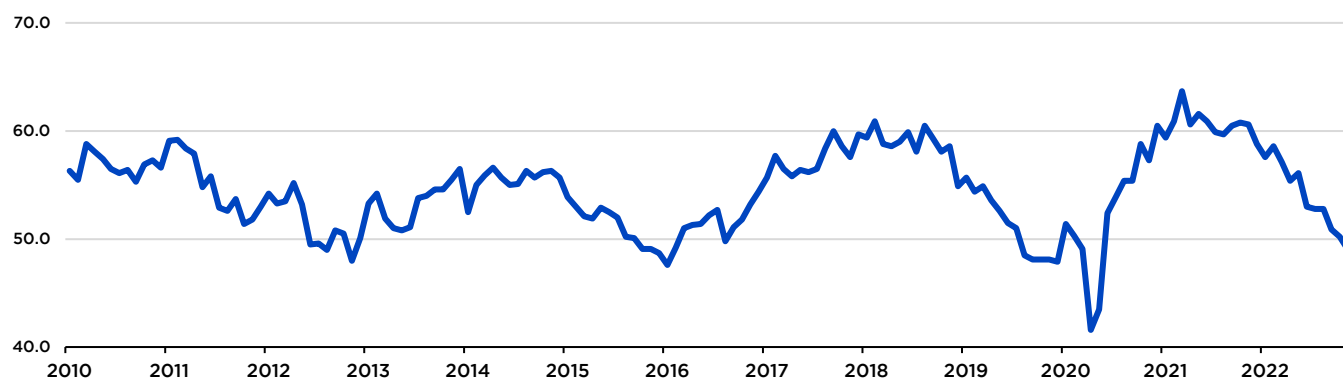
Inflation and leading indicators get lumps of coal

Kicking off the naughty list for 2022 is the only indicator which would have been on this list a year ago: inflation. The 12-month trend rate for the CPI fell in October to its lowest level since January, but at 7.7 percent is still very elevated. The core rate (the overall rate less food and energy) fell modestly to 6.3 percent, a pace far above the Fed's two percent target.

As the sector most sensitive to interest rates, housing market activity has plummeted this year. Total home sales fell to their lowest level since May 2020, and since 2012 when excluding the Covid lockdowns. The fall in sales corresponds to a spike in rates, with the 30-year fixed mortgage rate topping 7.0 percent for a period. Sales are expected to drop further with borrowing costs likely to remain elevated through 2023 due to restrictive monetary policy. This should also mean a further cooling of house prices with some local markets expected to show outright declines.

Finally, most leading indicators are suggesting an economic recession is on the horizon over the next year. The most recent example is the ISM manufacturing index, which fell into contraction in November. Over the last few decades, a contracting manufacturing sector has not always meant a recession was coming, but all downturns have seen a similar pattern from the ISM index. Moreover, the 12-month change in the index of leading economic indicators (LEI) has never fallen as low as its October reading without a recession following. The further deterioration of growth next year increases the odds that the naughty list for 2023 likely will be much longer.

ISM manufacturing index



Source: Institute for Supply Management

Market momentum builds to year-end

The S&P 500 index added more than five percent in November, lifting the fourth-quarter gain to more than 12 percent. Midcaps led domestic equity markets, adding roughly 16 percent since the end of September. Still, the strong performance failed to keep up with the over 18 percent increase by international developed country markets. Fixed-income investors got a break in November as the 10-year government yield fell for the first time in four months. Oil's modest retreat last month helped as inflation-wary investors hoped for some relief in 2023.

Mid-caps rule

Outsized gains in precious metals lifted the S&P 400 index to its highest level since August. In November, both copper and platinum posted double-digit increases. Not surprisingly, the material sector of the mid-cap index added more than 10 percent, roughly twice the index's rally. However, consumer-centric groups continue to lag, with discretionary, technology, and telecom down nearly 20 percent or more, double the index's retreat.

The mid-cap rally in the second half of 2022 underscores the market's renewed focus on valuation. Higher rates and fear of a recession have taken the steam out of large-cap discretionary and technology names as growth seems fleeting. In contrast, the focus on mid-cap names has been profitable, rewarded by a 14 percent rise in the second half of 2022. Given that the three major indexes (large-cap, mid-cap, and small-cap) fell by similar amounts in the first six months of 2022, the outsized rally means mid-cap has fought the hardest against this year's decline.

The tightening cycle continues to challenge equity markets. In early December, the S&P 500 was down roughly six percent from the close the day the Fed announced its first rate hike in March. That March message continues to ring out strongly today as investors expect even higher short-term rates and worry that earnings growth may further wane.

The turmoil in the cryptocurrency sector is having little impact on the equity market. In mid-November, FTX, a cryptocurrency trading exchange, filed for bankruptcy. Several additional cryptocurrency firms with billions of dollars in assets soon followed. Nonetheless, the equity market durability was notable as there has been no evident drag on the stocks or the returns of financial firms.

A rally in the 10-year Treasury

The yield of the U.S. Treasury 10-year dropped significantly in November as the market embraced a 2023 recession and signs of disinflation. The reversal ended a four-month run of higher yields that saw the benchmark security yield climb from 2.50 to over 4.00 percent. The dramatic rise caused long treasuries performance to fall about 17 percent. Even though the recent rally is a bright spot in a dark year, the year-over-year decline of nearly 30 percent showed the meaningful impact of the sharp rise in longer duration Treasuries.

Fed hawkishness kept short-term rates at elevated levels with the yield curve inversion deepening. The market expects the terminal rate for the tightening cycle to be near five percent, with a 50-basis point hike in December. Better inflation prints point to a modest deceleration in cost pressures next year. Still, the inflation genie will be hard to put back in the bottle, and the prospects for a decrease in the fed funds rate before 2024 seems fleeting.

The negative yield curve spread widened significantly in November, adding to recession signals for 2023. The yield difference between the 10-year U.S. Treasury note and the 2-year note yield fell to a negative 80 basis points. The last time the spread was this negative was in early 1980s. That time of high inflation underscores the importance of limiting the damage of elevated inflation on the economy.

The dollar is roughly six percent off its late-September peak. Foreign currencies have mostly rallied as central banks have taken and promised strong action to fight the dramatic rise in global inflation. A beneficiary of these actions is international equities. These gains are rare as international equity shares have dramatically underperformed their U.S. counterparts over the pandemic.

The markets are closely watching the Fed, the oil market, and geopolitical tensions as the holiday season proceeds. Next year offers no easy solutions with the Fed likely to tighten further and the economy expected to slow. Still, consumers' balance sheets and job prospects are healthy, providing some hope that should a downturn occur, it won't be severe.

Asset Class Performance

Total returns represented as of 11/30/22

	1-month	6-months	12-months
S&P Composite 500 Index	5.59%	-0.40%	-9.21%
S&P Midcap 400 Index	6.12%	3.39%	-3.29%
S&P Smallcap 600 Index	4.17%	1.47%	-5.99%
EAFE¹	11.09%	-4.60%	-12.58%
U.S. Dollar Index²	-5.00%	4.13%	10.37%
CRB Commodity Index³	2.05%	-11.62%	27.63%
Intermediate Treasuries⁴	1.72%	-2.58%	-7.79%
Long Treasuries⁵	7.07%	-9.95%	-29.05%
Investment-grade Corporate Bonds⁶	5.18%	-3.94%	-15.46%

¹ Index measuring equity performance of developed markets outside of the U.S. and Canada

² Federal Reserve trade-weighted broad currency index

³ Commodity Research Bureau; CRB spot index

⁴ Index of 1-year to 10-year Treasury notes

⁵ Index of 10-year and longer Treasury notes and bonds

⁶ Index of U.S. investment-grade corporate bonds

Sources: Bloomberg

The case for disinflation

It was one year ago that the Federal Reserve dropped the word “transitory” from its official communiques, as it was increasingly clear at the time that the price pressures that began building in early 2021 would carry well into 2022. But while this run of inflation has proven to be far from fleeting, there has also been growing evidence of late of its impermanence.

Pandemic-driven price spikes have eased

Most conspicuously, some of the categories that led the inflation rate higher last year have already started to reverse course. The used car component of the consumer price index, for example, soared by nearly 60 percent between mid-2020 and early 2022 as supply chain issues limited the supply of new vehicles, but has since fallen by 5.0 percent as logistical dislocations have eased. Along these same lines, airline fares have slumped by 13.9 percent since May after shooting higher by 66.0 percent over the prior seven months, when pent-up demand fueled a surge in travel. These deflationary trends in certain goods categories heavily affected by the pandemic will for time amplify the broader disinflation that has in fits and starts taken hold in recent months.

Rent increases set to slow

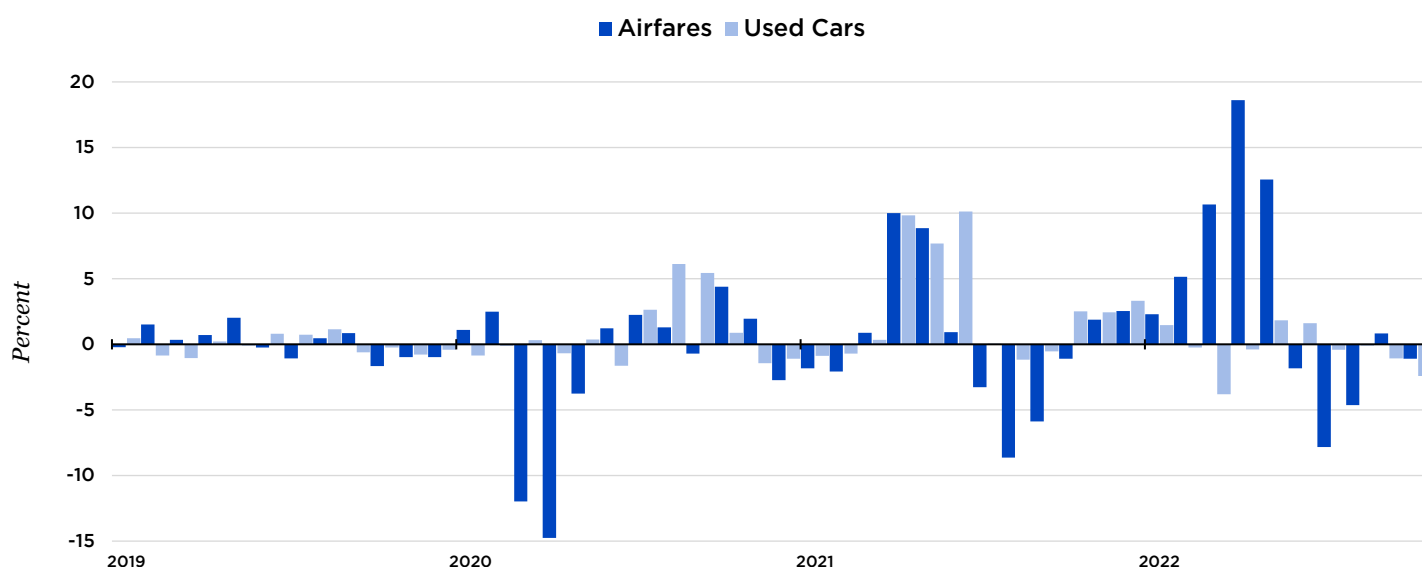
Even owners’ equivalent rent, the largest single line item within the CPI and among the stickiest components historically, could be

poised for a decelerating trend before long. While OER itself has been rising strongly in recent months, market rents have slowed noticeably. OER lagged the market rent data on the upside and is likely to eventually reflect those numbers on the downside as well.

The idiosyncratic versus the cyclical

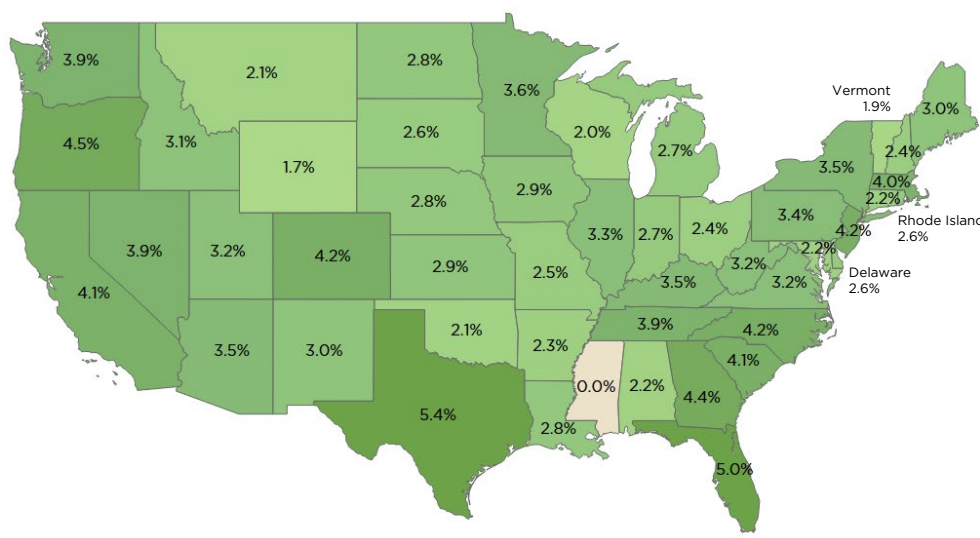
The upshot is that a significant portion of the jump in inflation across much of the last two years increasingly appears to have been idiosyncratic. And like the rapid price increases occasioned by World War II, the Korean War, and the two energy shocks in the 1970s, these appear poised to unwind swiftly. At the same time, however, there is an element of this inflation run that is cyclical in nature and likely to prove more enduring. This expansion is still less than three years old, but has already produced an extremely tight labor market and an elevated pace of wage growth. Some of this is idiosyncratic, too — note the depressed labor force participation rate — but it is in large part of a function of an economy that bounced back swiftly from the recession in 2020. As long as the expansion remains intact, the broader, more cyclical pressures can be expected to build even as the pandemic-driven categories continue their nascent turnarounds. A disinflationary trend is already underway, but, just like the upswing of 2021-22, it is a good bet to play out jaggedly and unevenly.

Monthly Changes in the CPI Airline Fare and Used Car Indices



Source: Bureau of Labor Statistics

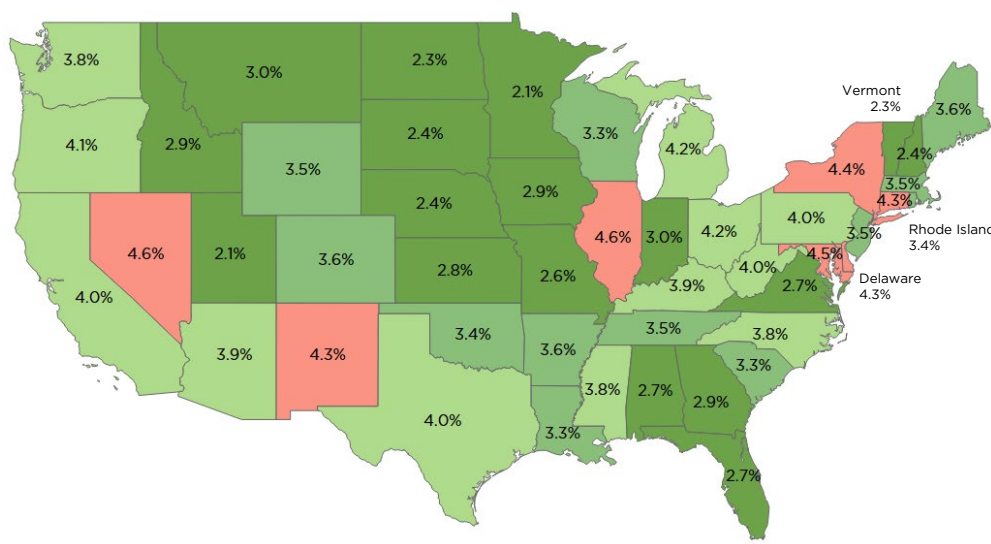
Job growth gradually slowing in most states



Sources: Bureau of Labor Statistics; Haver Analytics
Twelve-month growth rate in nonfarm payroll employment, October 2022

- Annual job growth as of October had slowed in 32 states relative to six months prior as hiring trends in many industries have decelerated over 2022.
- But the pace of job gains remain solid even if slower, with about half of states showing at least a 3.0 percent increase — led by Texas, Florida, and Oregon.

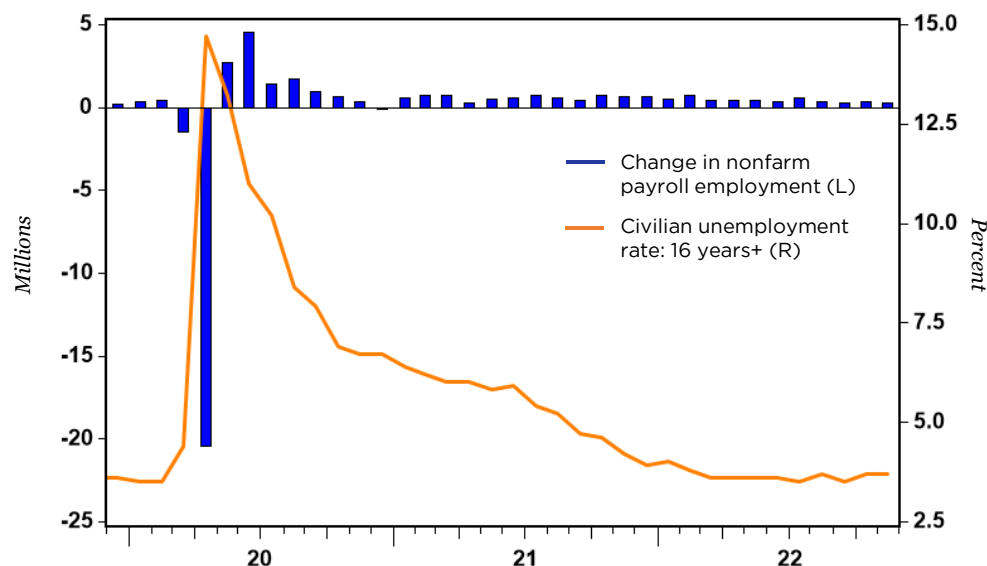
State labor markets remain very tight



Sources: Bureau of Labor Statistics; Haver Analytics
Civilian unemployment rate, October 2022

- The unemployment rates in 17 states were at-or below 3.0 percent in October — a very low level which is placing further upward pressure on wages as employers compete for workers.
- 11 states (including Alaska, not shown) have unemployment rates higher than 4.0 percent, but most are only slightly above that level as labor markets remain tight across the country.

Little slowdown for hiring in November

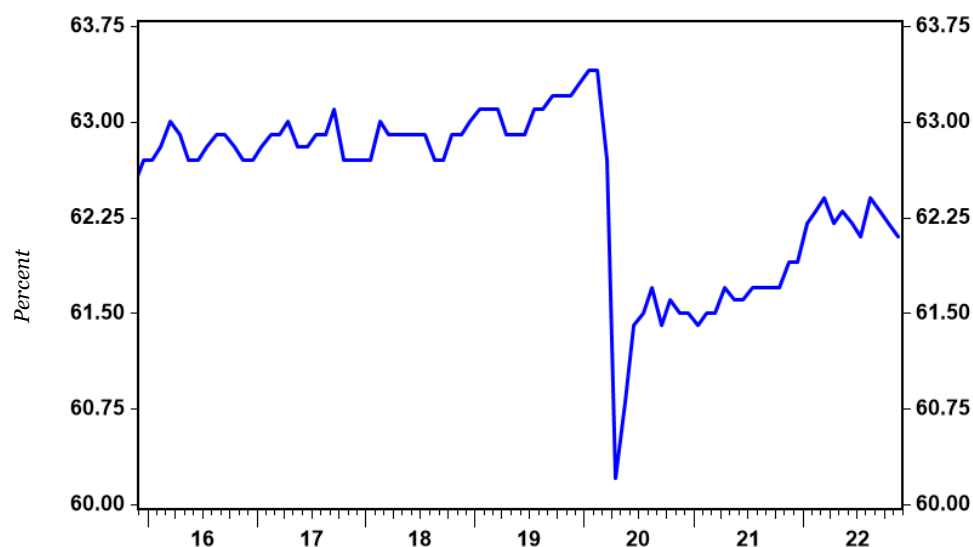


Sources: Bureau of Labor Statistics; Haver Analytics

Monthly change in nonfarm payroll employment; level of the civilian U-3 unemployment rate, November 2022

- Nonfarm payrolls rose by 263,000 in November with a continued solid pace of hiring across many sectors. The economy is on pace to add around 4.5 million jobs in 2022.
- The U-3 unemployment rate was steady at a low 3.7 percent. The broader U-6 measure, which includes underemployed workers, matched its all-time low of 6.7 percent in November.

Labor supply remains highly constrained

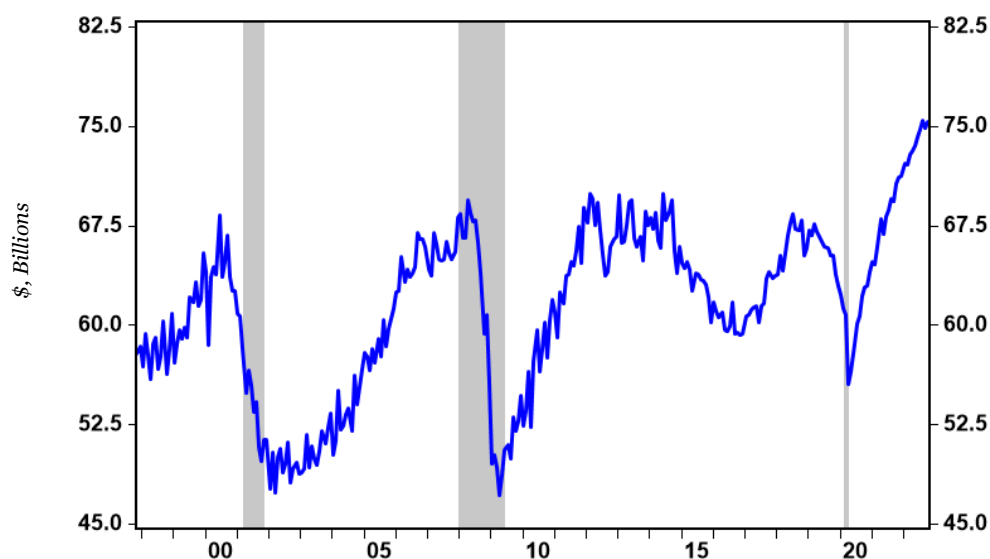


Sources: Bureau of Labor Statistics; Haver Analytics

Labor force participation rate, November 2022

- The labor force participation rate matched a year-low of 62.1 percent in November and remains far lower than pre-pandemic averages — indicative of continued labor supply limitations across the economy.
- While demand for workers is expected to wane over the next year, it may be some time before the labor market will be considered loose given the sharp imbalance at present. This will continue to underpin buoyant wage gains.

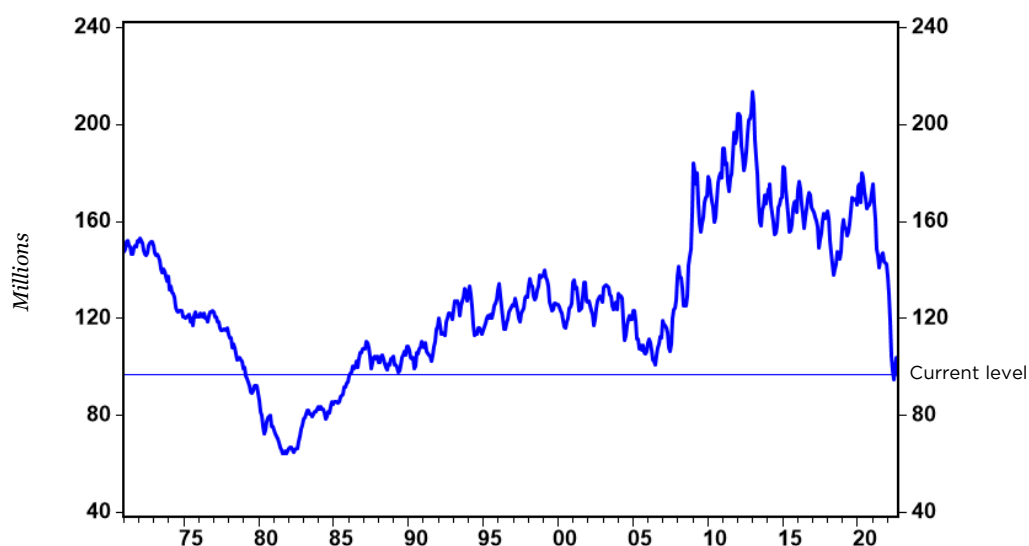
No downturn in goods orders yet



Sources: Census Bureau; Haver Analytics; Shaded areas depict recessionary periods
Nondefense capital goods orders ex aircraft, October 2022

- Core capital goods orders (excluding aircraft) rose 0.7 percent in October and have remained steady despite building signs that consumers are moving away from goods expenditures due to higher costs.
- The positive start to the fourth quarter for goods orders adds to the tailwinds for real GDP to end 2022, with latest estimates projecting around 3.0-4.0 percent growth over the period.

Back to the 1980s for housing affordability



Sources: National Association of Realtors; Haver Analytics
Fixed rate mortgage housing affordability index, September 2022

- In response to the largest jump in mortgage rates in decades, the housing affordability index has dropped to its lowest levels since the mid-1980s.
- With many potential home buyers now priced out of single-family homes, demand within the rental market has picked up — shifting new construction to multifamily units.

As of December 2022	Actual		Estimate	Forecast			
	2020	2021	2022	2023	2024	2025	2026
Real GDP ¹	-3.4%	5.7%	2.1%	0.3%	0.5%	2.1%	1.7%
Unemployment Rate ^{2,7}	8.1%	5.4%	3.7%	4.6%	5.3%	4.6%	4.2%
Inflation (CPI) ⁵	1.2%	6.7%	7.6%	3.8%	2.6%	2.3%	2.0%
Total Home Sales ^{3,7}	6.47	6.89	5.75	4.85	5.15	5.50	6.00
S&P/Case-Shiller Home Price Index ⁹	10.3%	18.8%	6.2%	0.0%	2.5%	3.0%	3.5%
Light Vehicle Sales ^{3,7}	14.5	14.9	13.9	14.8	15.5	16.2	16.5
Federal Funds Rate ^{2,4,6}	0.00%	0.00%	4.25%	5.00%	3.50%	2.50%	2.00%
5-Year Treasury Note ^{2,4}	0.36%	1.26%	3.95%	4.25%	3.30%	2.90%	2.75%
10-Year Treasury Note ^{2,4}	0.93%	1.52%	3.75%	3.90%	3.20%	3.10%	2.90%
30-Year Fixed-Rate Mortgage ^{2,4}	2.67%	3.11%	6.70%	6.00%	4.85%	4.40%	4.10%
Money Market Funds ^{2,8}	0.47%	0.14%	2.27%	5.03%	4.09%	2.90%	2.09%

Major forecast changes from last month

- The economy is projected to end 2022 on a higher note than previously thought, with annualized real GDP growth of between 3.0-4.0 percent likely in the fourth quarter. Further momentum from the labor market in early 2023 is expected to push off recessionary conditions until later in 2023 or early 2024 — lifting our estimate for 2023 growth while also lowering 2024. The projected moderate magnitude of the recession is unchanged, purely a shift in the timing of the downturn.
- Long-term interest rates have receded from recent highs in response to signs of peaking inflation and slightly lower expectations for Fed rate hikes in 2023. Still, we expect the Fed to stick with its tightening cycle through at least the first quarter of 2023, lifting the fed funds rate to the 5.00-5.25 percent range. This should cause longer duration Treasuries to climb again (but not as high as projected last month), likely peaking in early 2023 before falling off over the rest of the year.

¹ Percent change year-to-year

² Percent

³ Million units

⁴ Year end

⁵ Percent change Q4-to-Q4

⁶ Target rate, lower limit

⁷ Year average

⁸ Annual return

⁹ Percent change Dec-to-Dec

Sources: Haver Analytics (actuals); Nationwide Economics (estimates and forecasts); except Money Market Funds (all data from Nationwide Economics)



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