July 2022

NATIONAL ECONOMIC OUTLOOK

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Executive Summary

Strong June Job Growth, But Very High Inflation as Well; GDP Fell in Second Quarter

- The labor market remains very strong, with the U.S. economy adding 372,000 jobs in June, according to a survey of employers from the Bureau of Labor Statistics. Over the past three months job growth has averaged 375,000. Although this is below the pace of better than 500,000 per month in the first three months of 2022, it is well above the pace of around 200,000 per month before the pandemic came to the U.S. Employment in June was about 500,000, or 0.3%, its pre-pandemic peak in February 2020. Employment should reach a new peak in the next few months, a remarkable achievement given that the economy lost 22 million jobs in March and April of 2020. The unemployment rate held steady at 3.6% for the fourth straight month in June, just 0.1 percentage point above its pre-pandemic level, and near the lowest unemployment rate in more than 5 decades.

- The consumer price index increased 1.3% in June from May. A 7.5% increase in energy prices, including a more than 11% jump in gasoline prices, pushed the overall CPI higher for the month. But the core CPI index, which excludes volatile food and energy prices, rose a large 0.7% in June, indicating that inflationary pressures are broad-based throughout the economy. On a year-ago basis the overall CPI was up 9.1% in July, an acceleration from 8.6% in May and the strongest inflation since 1981. Core inflation slowed somewhat on a year-ago basis in June to 5.9%, from 6.0% in May, but remains very elevated. Monthly inflation will be much lower in July as falling gasoline prices provide some relief to consumers. In response to high inflation, in late July the Federal Open Market Committee raised its short-term policy rate, the fed funds rate, by 75 basis points, to a range of 2.25% to 2.50%. This is up from 0% at the beginning of the year.

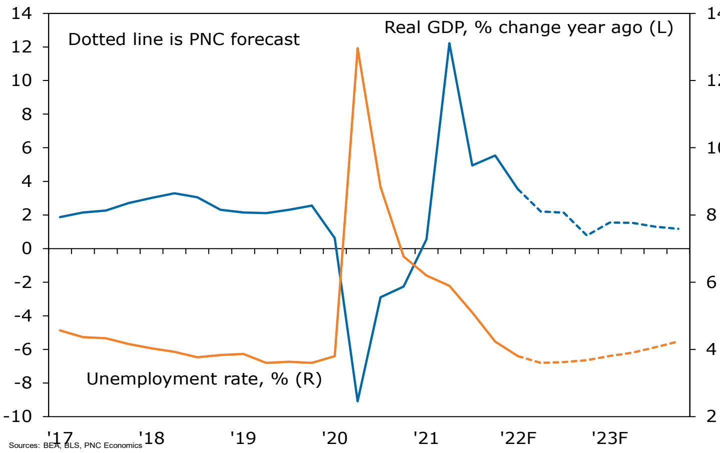
- Real gross domestic product fell 0.9% at an annual rate in the second quarter of 2022, according to the advance estimate from the Bureau of Economic Analysis; this followed a 1.6% decline in the first quarter. (PNC's July forecast was prepared before the BEA release). The big drag came from inventories, which subtracted 2 percentage points from growth. Trade was a major positive, adding 1.4 percentage points to growth in the quarter, as the trade deficit narrowed. Consumer spending rose 1.0% adjusted for inflation, adding 0.7 percentage point to growth. Goods spending fell, but a big increase in services spending more than offset this. Business fixed investment was essentially flat in the second quarter. Housing investment was a major drag, subtracting 0.7 percentage point from growth, as higher interest rates weighed on construction.

*Baseline U.S. Economic Outlook, Summary Table**

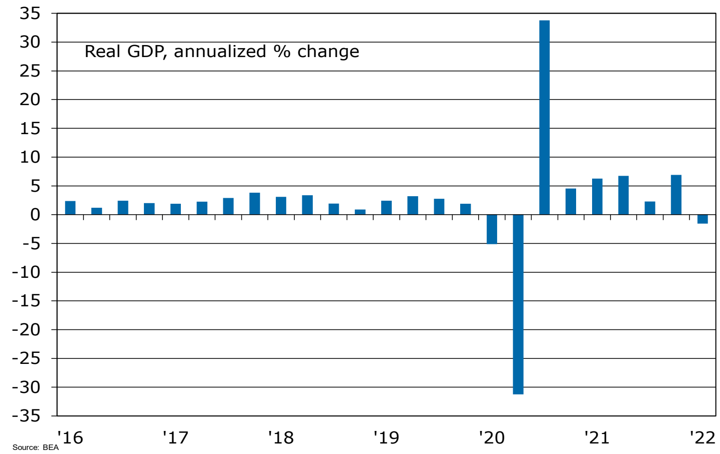
	1Q'22a	2Q'22f	3Q'22f	4Q'22f	1Q'23f	2Q'23f	2021a	2022f	2023f	2024f
Output & Prices										
Real GDP (*Chained 2012 Billions $*)	19728	19796	19896	19961	20034	20101	19427	19845	20122	20328
Percent Change Annualized	**-1.6**	**1.4**	**2.0**	**1.3**	**1.5**	**1.3**	**5.7**	**2.2**	**1.4**	**1.0**
CPI (*1982-84 = 100*)	284.6	291.8	294.1	296.7	299.0	301.1	271.0	291.8	302.0	309.1
Percent Change Annualized	**9.2**	**10.5**	**3.2**	**3.5**	**3.2**	**2.9**	**4.7**	**7.7**	**3.5**	**2.4**
Labor Markets										
Payroll Jobs (*Millions*)	150.4	151.6	152.4	152.8	153.0	153.2	146.1	151.8	153.3	153.8
Percent Change Annualized	**4.7**	**3.4**	**2.2**	**1.0**	**0.5**	**0.4**	**2.8**	**3.9**	**1.0**	**0.3**
Unemployment Rate (*Percent*)	3.8	3.6	3.6	3.7	3.8	3.9	5.4	3.7	4.0	4.3
Interest Rates (Percent)										
Federal Funds	0.12	0.76	2.19	3.08	3.54	3.63	0.08	1.54	3.59	2.81
10-Year Treasury Note	1.94	2.92	3.09	3.18	3.26	3.28	1.43	2.78	3.27	3.13

a = actual f = forecast p = preliminary **Please see the Expanded Table for more forecast series.*

Economic Growth Will Continue to Slow, Recession Risks Elevated



Modest Decline in Real GDP in the First Quarter, But Real Gross Domestic Income Rose



No Recession in Mid-2022, But Inverted Yield Curve Is Pointing to Possible Troubles Ahead

The National Bureau of Economic Research, a non-profit organization, is the most widely accepted authority on dating recessions and expansions in the U.S. economy. Although there is a lot of discussion in the media about a potential economic downturn, especially after real GDP declined in the second quarter, under the NBER's definition the U.S. economy is currently not in recession. However, recession risks are elevated in mid-2022. In particular, a prominent predictor of recession, the inverted yield curve, is flashing yellow in July, indicating that recession is possibly looming.

The NBER defines a recession as "a significant decline in economic activity that is spread across the economy and that lasts more than a few months." To determine if the economy is in recession, the NBER's Business Cycle Dating looks at several economic indicators, including personal income (excluding government transfer payments) and consumer spending, both adjusted for inflation; employment; wholesale and retail sales, also adjusted for inflation; and output in manufacturing, mining, and utilities. Using these indicators, in particular strong job growth and rising consumer spending and personal income, even after adjusting for high inflation, the economy was expanding through June.

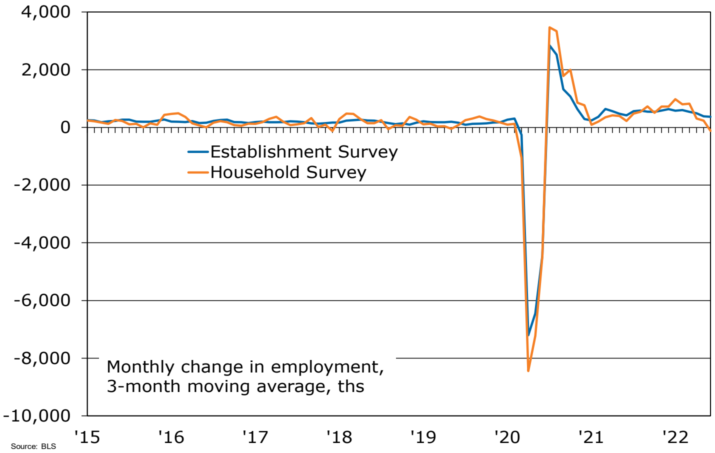
Notably, the NBER explicitly does not define a recession as two consecutive quarters of decline in real gross domestic product, which is sometimes used as shorthand for a recession in the media. The NBER's definition covers a broader range of economic indicators, considers the depth of the downturn, and is based on monthly, rather than quarterly, data. Real GDP fell modestly in both the first and second quarters of 2022, but even so the economy is very unlikely to meet the NBER definition of recession in the next few months. Notably, an alternative measure of the size of the economy that the NBER considers, real gross domestic income (the income flowing to households and businesses from economic activity, adjusted for inflation), increased at a moderate pace in the first quarter, and is likely to increase in the second quarter as well. And potential revisions to GDP, due in September, could significantly alter the picture of the economy in the first half of 2022.

But even as the economy is expanding in the middle of the year, recession risks are elevated. With high inflation weighing on consumer and business confidence, and the Federal Open Market Committee aggressively raising interest rates to fight inflation, the risk of recession over the next couple of years is around 45%, more than double what it was prior to the Russian invasion of Ukraine.

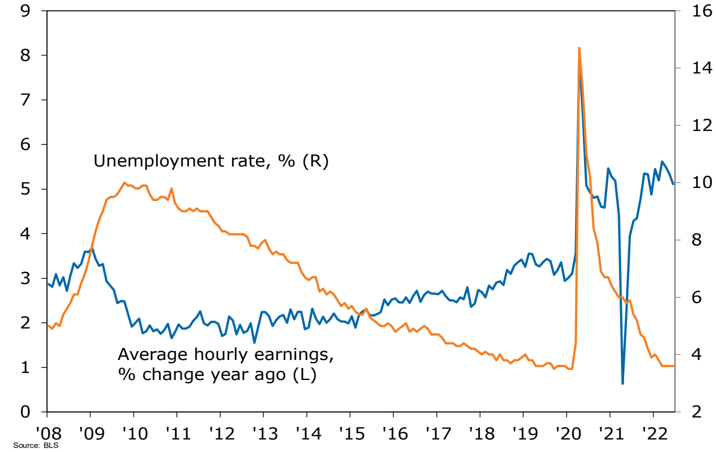
One indicator in particular, the inverted yield curve, points to potential near-term recession. Normally the yield curve is upward sloping; that is, yields on longer-dated U.S. Treasurys (federal government debt) are higher than those on shorter-term Treasurys. But in July the yield curve inverted, with the yield on the 2-year Treasury substantially higher than that on the 10-year Treasury. This inversion reflects current high inflation; expectations that the FOMC will continue to raise its short-term policy rate, the fed funds rate, into 2023; and expected slowing in both inflation and medium-term economic growth. Historically recession usually follows about 6 to 12 months after an inversion in the yield curve. Another, more reliable yield curve indicator, the difference in yields between 10-year Treasury notes and 3-month Treasury bills, is not inverted in July, although it is narrowing. PNC will continue to follow both of these yield curve measures, as well as other economic indicators, in evaluating whether the baseline forecast should include a near-term recession.

But at this point, with the labor market still very strong, PNC's baseline forecast is for slower growth over the next few years, but not recession. Real GDP growth is expected to slow from above 5% in 2021 to around 1% this year (Q4 to Q4 basis), and then stay at around 1% in 2023 and 2024; this is below the economy's long-term trend. Weaker growth will lead to a slowing in job growth and a slight increase in the unemployment rate over the next couple of years, to above 4% by late 2023, up from 3.6% in June 2022. With slower growth, particularly in interest-rate sensitive industries like housing, and reduced wage pressures, inflation will gradually ease to the Fed's 2% objective by mid-2024. While the probability of recession over the next few months remains low given the strong labor market and decent consumer fundamentals, recession risks are elevated for late 2022 and in 2023, as the impacts of higher interest rates continue to filter their way through the economy. PNC expects the fed funds rate to end this year at above 3%, and to peak at close to 4% in mid-2023.

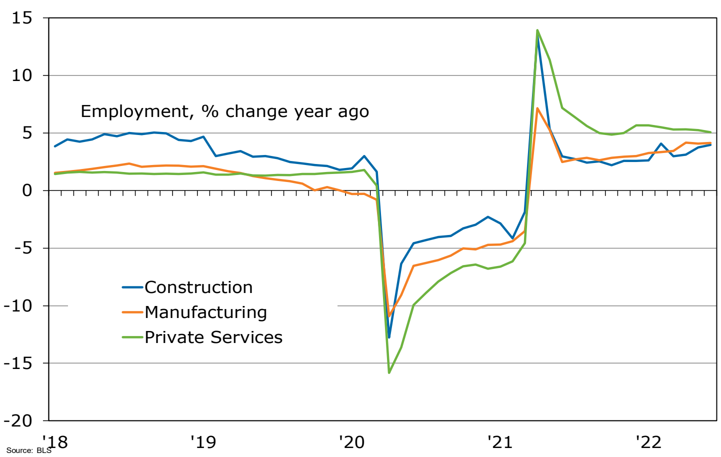
Recent Employment Growth Weaker in Survey of Households, Compared to Survey of Businesses



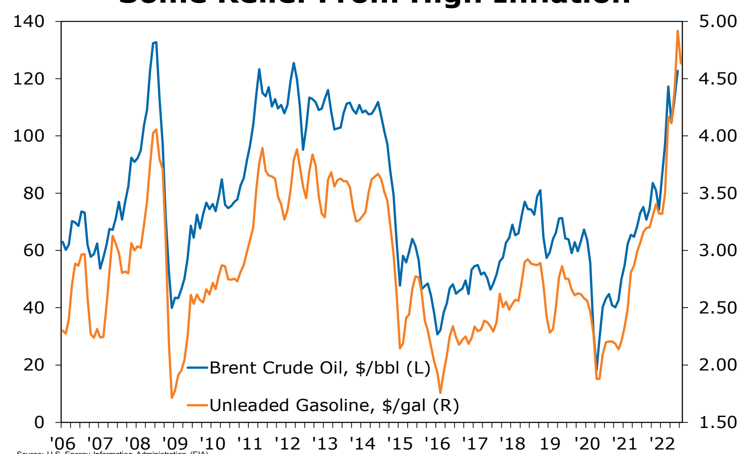
Unemployment Rate Has Stabilized at 3.6%, Near the Lowest Rate in Decades



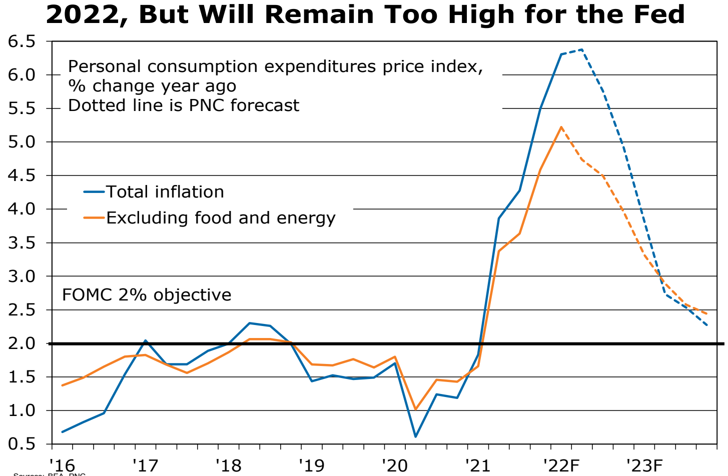
Private-Sector Job Growth Is Broad-Based



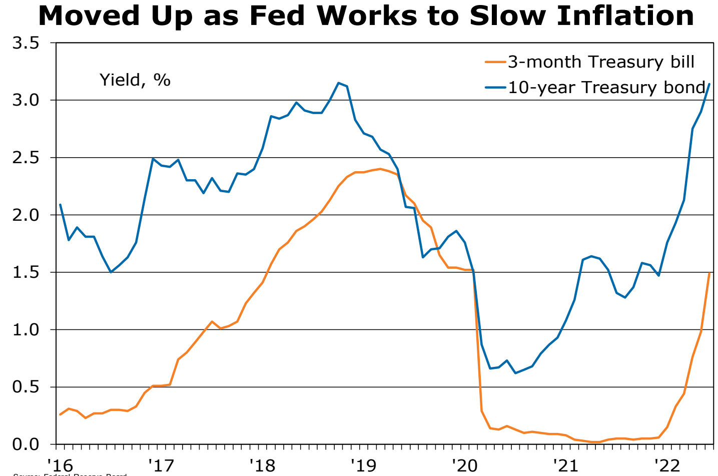
Energy Prices Are Coming Down, Offering Some Relief From High Inflation



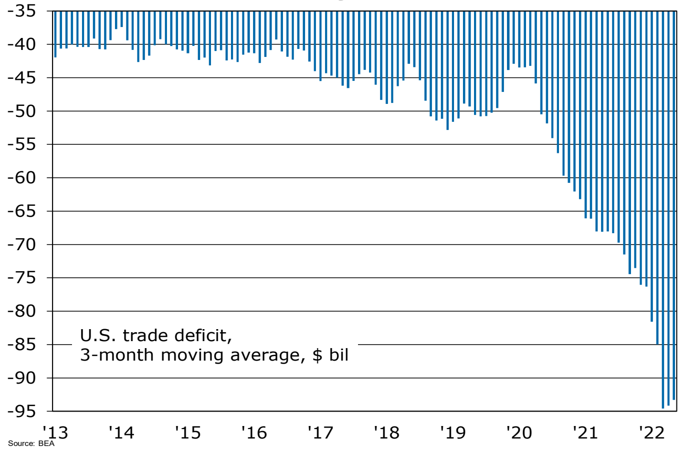
Inflation Set to Slow in the Second Half of 2022, But Will Remain Too High for the Fed



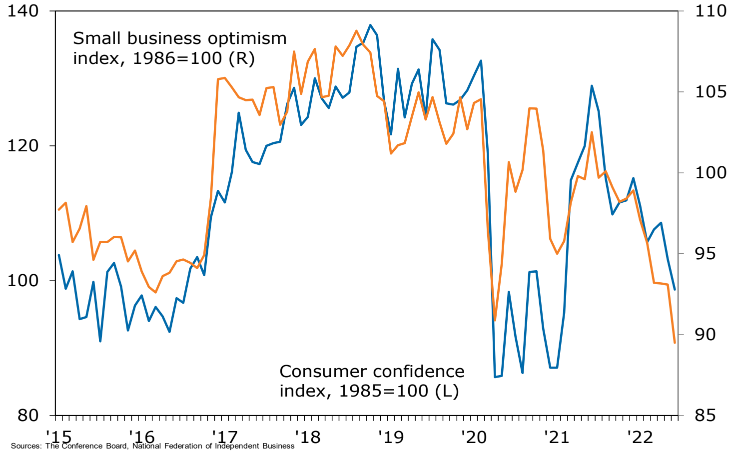
Short-Term and Long-Term Rates Have Moved Up as Fed Works to Slow Inflation



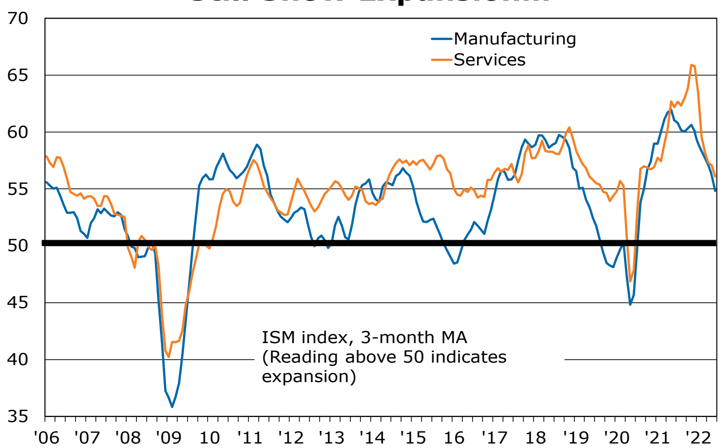
Smaller Trade Deficit Will Add to Second Quarter Growth



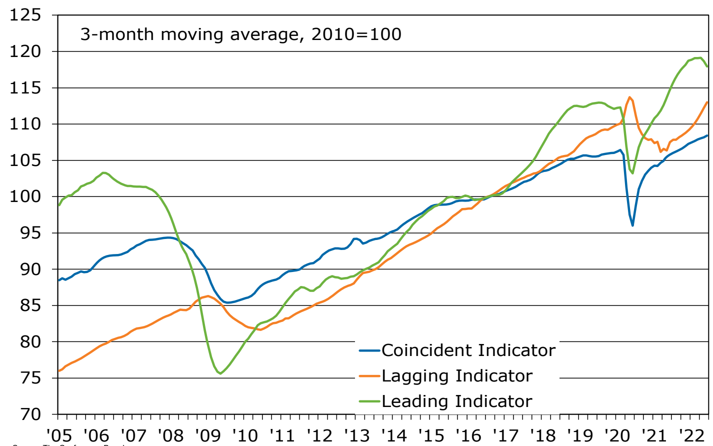
High Inflation Has Consumers and Small Businesses Very Nervous



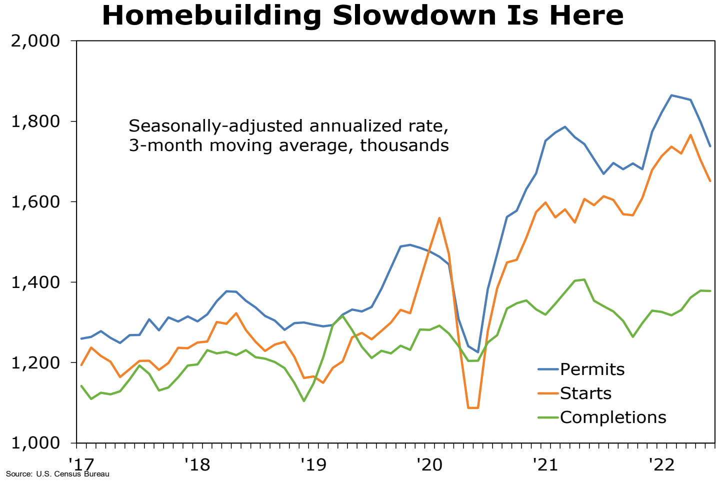
Purchasing Managers Surveys Still Show Expansion...



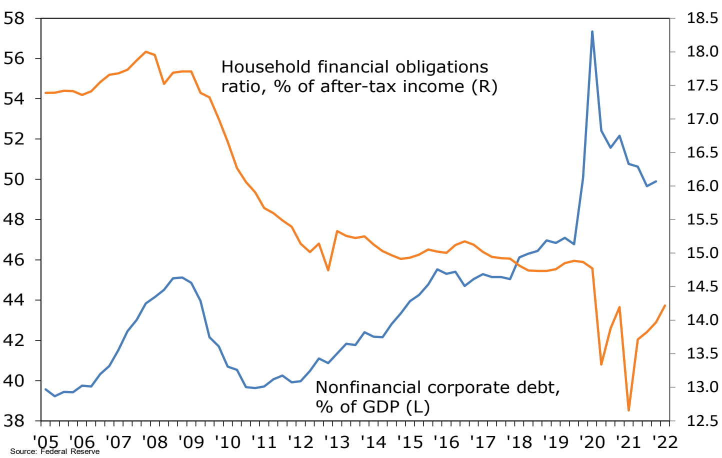
...But Conference Board Leading Indicator Has Moved Lower in Mid-2022



With Higher Mortgage Rates, Homebuilding Slowdown Is Here



Consumer Credit Quality Remains Exceptionally Strong



Baseline U.S. Economic Outlook, Expanded Table

	1Q'22a	2Q'22f	3Q'22f	4Q'22f	1Q'23f	2Q'23f	2021a	2022f	2023f	2024f
Output										
Nominal GDP (*Billions $*)	24387	24882	25265	25575	25850	26089	22996	25027	26180	26906
Percent Change Annualized	**6.6**	**8.4**	**6.3**	**5.0**	**4.4**	**3.8**	**10.1**	**8.8**	**4.6**	**2.8**
Real GDP (*Chained 2012 Billions $*)	19728	19796	19896	19961	20034	20101	19427	19845	20122	20328
Percent Change Annualized	**-1.6**	**1.4**	**2.0**	**1.3**	**1.5**	**1.3**	**5.7**	**2.2**	**1.4**	**1.0**
Pers. Consumption Expenditures	13881	13920	13983	14037	14092	14150	13625	13955	14172	14321
Percent Change Annualized	**1.8**	**1.1**	**1.8**	**1.5**	**1.6**	**1.7**	**7.9**	**2.4**	**1.6**	**1.0**
Nonresidential Fixed Investment	2975	2992	3004	3012	3023	3039	2868	2996	3050	3157
Percent Change Annualized	**10.0**	**2.3**	**1.5**	**1.1**	**1.4**	**2.1**	**7.4**	**4.4**	**1.8**	**3.5**
Residential Investment	699	690	684	674	662	649	708	686	642	598
Percent Change Annualized	**0.4**	**-5.0**	**-3.5**	**-5.9**	**-6.8**	**-7.6**	**9.2**	**-3.0**	**-6.5**	**-6.8**
Change in Private Inventories	188	137	131	109	91	84	-33	141	84	71
Net Exports	-1545	-1459	-1418	-1378	-1337	-1321	-1284	-1450	-1328	-1330
Government Expenditures	3334	3322	3317	3313	3310	3305	3376	3321	3307	3316
Percent Change Annualized	**-2.9**	**-1.5**	**-0.6**	**-0.4**	**-0.4**	**-0.6**	**0.5**	**-1.6**	**-0.4**	**0.3**
Industrial Prod. Index (*2012 = 100*)	103.4	104.9	105.7	106.1	106.4	106.8	100.1	105.0	107.0	108.3
Percent Change Annualized	**7.0**	**6.1**	**3.0**	**1.7**	**1.0**	**1.3**	**5.5**	**4.9**	**1.8**	**1.2**
Capacity Utilization (*Percent*)	77.5	78.3	78.6	78.4	78.1	77.8	75.4	77.9	77.9	78.7
Prices										
CPI (*1982-84 = 100*)	284.6	291.8	294.1	296.7	299.0	301.1	271.0	291.8	302.0	309.1
Percent Change Annualized	**9.2**	**10.5**	**3.2**	**3.5**	**3.2**	**2.9**	**4.7**	**7.7**	**3.5**	**2.4**
Core CPI Index (1982-84 = 100)	287.7	292.4	295.9	298.8	301.4	303.9	277.3	293.7	305.1	313.4
Percent Change Annualized	**6.5**	**6.6**	**5.0**	**3.9**	**3.5**	**3.4**	**3.6**	**5.9**	**3.9**	**2.7**
PCE Price Index (*2012 = 100*)	120.1	122.1	123.0	123.9	124.7	125.4	115.5	122.3	125.7	128.1
Percent Change Annualized	**7.1**	**6.8**	**2.9**	**3.0**	**2.6**	**2.4**	**3.9**	**5.8**	**2.8**	**1.9**
Core PCE Price Index (*2012 = 100*)	121.0	122.3	123.4	124.2	125.0	125.8	117.3	122.7	126.2	128.9
Percent Change Annualized	**5.2**	**4.2**	**3.6**	**2.9**	**2.6**	**2.5**	**3.3**	**4.6**	**2.8**	**2.2**
GDP Price Index (*2012 = 100*)	123.6	125.7	127.0	128.1	129.0	129.8	118.3	126.1	130.1	132.4
Percent Change Annualized	**8.3**	**6.9**	**4.2**	**3.6**	**2.9**	**2.4**	**4.1**	**6.6**	**3.2**	**1.7**
Crude Oil, WTI (*$/Barrel*)	95.0	108.5	105.3	102.6	101.1	97.9	68.0	102.9	95.0	85.3
Labor Markets										
Payroll Jobs (*Millions*)	150.4	151.6	152.4	152.8	153.0	153.2	146.1	151.8	153.3	153.8
Percent Change Annualized	**4.7**	**3.4**	**2.2**	**1.0**	**0.5**	**0.4**	**2.8**	**3.9**	**1.0**	**0.3**
Unemployment Rate (*Percent*)	3.8	3.6	3.6	3.7	3.8	3.9	5.4	3.7	4.0	4.3
Average Weekly Hours, Prod. Works.	34.1	34.0	34.0	33.9	33.8	33.8	34.3	34.0	33.7	33.6
Personal Income										
Average Hourly Earnings (*$*)	27.0	27.3	27.7	28.1	28.5	28.8	25.9	27.5	29.0	30.4
Percent Change Annualized	**6.0**	**5.4**	**5.6**	**5.7**	**5.6**	**5.5**	**4.9**	**6.2**	**5.5**	**4.6**
Real Disp. Income (*2012 Billions $*)	15152	15263	15481	15633	15809	15945	16032	15382	16012	16501
Percent Change Annualized	**-7.8**	**3.0**	**5.8**	**4.0**	**4.6**	**3.1**	**2.3**	**-4.1**	**4.1**	**3.1**
Housing										
Housing Starts (*Ths., Ann. Rate*)	1720	1648	1580	1529	1439	1333	1605	1619	1282	1080
Ext. Home Sales (*Ths., Ann Rate*)	6057	5377	5785	5777	5768	5754	6127	5749	5684	5389
New SF Home Sales (*Ths., Ann Rate*)	779	714	705	681	652	613	769	720	589	524
Case/Shiller HPI (*Jan. 2000 = 100*)	290.6	298.8	305.1	307.7	304.6	297.0	276.5	307.7	287.6	289.5
Percent Change Year Ago	**20.0**	**17.4**	**14.3**	**11.3**	**4.8**	**-0.6**	**18.9**	**11.3**	**-6.5**	**0.7**
Consumer										
Auto Sales (*Millions*)	14.1	13.4	14.4	15.0	15.5	16.0	15.0	14.2	16.2	16.3
Consumer Credit (*Billions $*)	4529	4619	4699	4774	4844	4908	4431	4774	5032	5259
Percent Change Year Ago	**7.1**	**7.5**	**7.9**	**7.7**	**7.0**	**6.3**	**5.9**	**7.7**	**5.4**	**4.5**
Interest Rates (Percent)										
Prime Rate	3.29	3.94	5.33	6.21	6.66	6.75	**3.25**	**4.69**	**6.72**	**5.93**
Federal Funds	0.12	0.76	2.19	3.08	3.54	3.63	**0.08**	**1.54**	**3.59**	**2.81**
3-Month Treasury Bill	0.28	1.04	2.18	2.81	3.22	3.26	**0.03**	**1.58**	**3.20**	**2.60**
10-Year Treasury Note	1.94	2.92	3.09	3.18	3.26	3.28	**1.43**	**2.78**	**3.27**	**3.13**
30-Year Fixed Mortgage	3.79	5.24	5.62	5.62	5.60	5.54	**2.96**	**5.07**	**5.48**	**5.06**

a = actual   f = forecast   p = preliminary

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