Economics



Monthly — May 12, 2021

U.S. Economic Outlook: May 2021

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Strengthening Growth Despite a Worsening Supply Problem

- We are forecasting full-year GDP growth to come in at 7.0%, which would mark the second-fastest year for growth since 1955 (full-year growth in 1984 was 7.2%). It is increasingly evident that the fastest pace of expansion in decades comes with some significant growing pains.
- Longer lead times, lack of available labor and supply chain constraints present challenges that are
 as disruptive to multinational manufacturing operations as they are to independent tradespeople
 and even the most basic service providers with shortages ranging from microchips to two-by-fours
 to chicken wings.
- The semiconductor shortage in particular is one of the most visible disruptions and has significant
 implications for the manufacturing of motor vehicles. We have taken down our industrial
 production forecasts for the next few quarters. If the chip problem gets fixed, output should snap
 back swiftly, given the scarcity of inventory on dealer lots.
- In recognition of the worsening supply problems against a backdrop of strengthening demand in recent weeks, we have upwardly revised our already above-consensus inflation forecast. Core PCE inflation is now expected to run 2.4%-2.7% on a year-ago basis over the next five quarters.
- The Federal Reserve is also looking for inflation to overshoot its 2% target for some time, and with
 the labor market still far from its inclusive goal of maximum employment, we believe rates will
 remain on hold and that it will still be months before the FOMC is ready to broach the topic of
 tapering.

Strengthening Growth Despite a Worsening Supply Problem

The U.S. economy is off to a faster start in 2021 than most forecasters anticipated, and while the biggest surge in activity is still on the horizon, it is increasingly evident the fastest growth in decades comes with some significant growing pains. Longer lead times, lack of available labor and supply chain constraints present maddening speed bumps for economic growth. These challenges are as disruptive to multinational manufacturing operations as they are to independent tradespeople and even the most basic service providers with shortages ranging from microchips to two-by-fours to chicken wings.

Predictably, the scarcities have led to a big run-up in various prices particularly for raw materials with reports of fresh all-time highs on an almost daily basis for one commodity or another and various indications of increased labor costs. Even beyond commodities, where trading is famously volatile, financial markets in general have taken note of the quickening growth and rising price environment. The upward trend for rates that characterized activity in the bond market earlier this year may have plateaued for now with the benchmark 10-year yield largely range-bound between 1.50% and 1.75% since mid-March. However, forward-looking inflation measures like the five-year breakeven TIPS spread (the difference in yield between an inflation-protected Treasury and a regular one) recently climbed north of 2.76%, the highest in about 15 years.

To the extent that there is a theme for our May monthly forecast update, it is that economic activity could be even faster were it not for these logjams in supply chains and structural mismatches that leave many employers unable to find and retain labor. In short, the economy has a supply problem rather a demand problem.

Figure 1

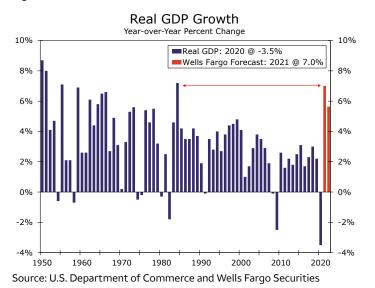
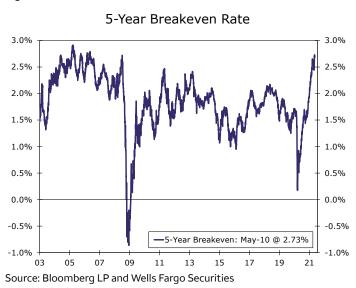


Figure 2



The Coming Surge in Services Spending

The two biggest things to understand about consumer spending is that households are sitting on a pile of savings, and after a year of record goods spending growth, an even larger surge in services outlays will power the broader economy to its fastest full-year growth since 1984 and its second fastest since 1955. In short, 2021 should go down in the books as one of the best years for economic growth in more than half a century.

In two out of the first three months of the year, U.S. consumers received stimulus funds from the federal government. While some households are no doubt still struggling, in aggregate, consumers are raking it in faster than they can spend it in a continuation of a trend that has been in place for almost a year. To be sure, a case can be made that some of the "saved" money might be flowing into places other than savings accounts. Still, the sheer volume of cash and record saving rates over the past year suggest that as restrictions are lifted, the 10.7% annualized growth in personal consumption

expenditures (PCE) we saw in the first estimate of Q1 GDP could be just the down payment in what we expect to be the strongest surge in consumer spending in a generation.

A seismic shift in spending on services is right around the corner, but our analysis of prior cycles suggests that there is scope for continued growth in durable goods spending even though some demand for these big-ticket items has been pulled forward. With the public health situation improving and the economy continuing to gradually reopen, households are preparing to direct consumption toward services. We expect the sizable pickup in services spending to be the primary driver of consumer spending in the second half of the year, though that need not come at the expense of a complete collapse in goods spending.

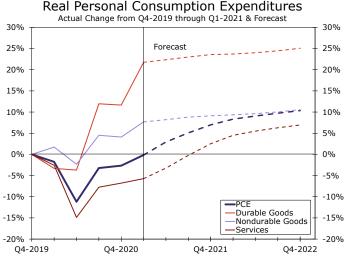
Supply Chain Reaction: The Impact of a Semiconductor Shortage

Perhaps nowhere is the supply problem more obvious than it is in the manufacturing sector. The ISM manufacturing index slowed to 60.7 in April from 64.7 in March. The sharpest decline among the subcomponents was the 5.6-point drop in the production index. That is not a terribly encouraging sign after industrial production fell in February and only partly recouped the loss in March. New orders fell, but backlogged orders rose to an all-time high of 68.2.

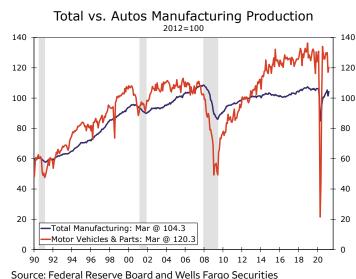
The global semiconductor shortage has become even more pronounced over the past few weeks, and one of the most visible disruptions is in the manufacturing of motor vehicles. Semiconductors represent just 1.3% of the total inputs used by the domestic autos & parts manufacturing industries, but they are an essential component. Major domestic automakers have announced factory closures amid semiconductor shortages. Motor vehicle & parts production accounts for 7.5% of total manufacturing in the United States, so a reduction in auto production would likely slice a few percentage points off manufacturing output this year. Production hurdles are occurring amid a surge in demand for automobiles and already exceptionally low inventories. The autos' inventory-to-sales ratio at retail dealers has collapsed and has been hovering around the lowest levels since October 2001. Given the fact that motor vehicle and parts production have been running ahead of broader manufacturing output in recent years, a reversal presents downside risk to output in manufacturing. We have taken down our forecasts for industrial production in the near term but beefed them up next year when supply chains may begin to normalize.

The demand and supply imbalance is giving way to higher prices of both new and used vehicles, which will likely be a noticeable source of higher inflation this year. Production cuts may also lead manufacturers to temporarily lay off workers. But, if manufacturers forgo typical summer shutdowns, seasonal layoffs are also apt to be skipped and generate a bigger boost to employment growth this summer; so it may well cancel out, provided the problem is getting better by autumn.

Figure 3 Figure 4



Source: U.S. Department of Commerce and Wells Fargo Securities



We look for only very modest growth in structures investment, as many office projects remain on hold until a clearer picture emerges on what the demand backdrop for office space will look like after workers return to the office. Many businesses have announced plans for a soft opening of the workplace during the summer and expect to have the majority of workers back in the office this fall. Demand for retail space has gotten a short-term reprieve, as consumers flush with cash are venturing out to brick-and-mortar stores. The bump will likely proved short-lived, however, and we expect the longer-term shift to online retailing to remain in place, fueling demand for warehouse and distribution space.

Supply-side issues are clearly limiting residential investment. Inventories of existing homes remain near all-time lows and home builders are selling homes faster than they can build them. Existing inventory will increase, as higher home prices and diminishing fears about COVID encourage more households to put their home on the market. New construction is also running strong and is expected to continue to do so. Supply-chain bottlenecks for building materials should at least modestly improve during the second half of this year, as more saw mills reopen and manufacturers ramp up production of other key inputs. Until then, we have yet another example of demand outstripping scarce supply, and lumber prices are near record highs.

U.S. Forecast Table

_											Wells Fargo Securities U.S. Economic Forecast										
-				Act	tual							Fore	cast				Act	tual	Fore	ecast	
		20:	19			20:	20			20	21			20	22		2019	2020	2021	2022	
	1Q	2Q	3Q	4Q	1Q	2Q	3Q	4Q	1Q	2Q	3Q	4Q	1Q	2Q	3Q	4Q					
Real Gross Domestic Product (a)	2.9	1.5	2.6	2.4	-5.0	-31.4	33.4	4.3	6.4	9.8	8.4	7.6	6.0	3.3	2.6	2.5	2.2	-3.5	7.0	5.6	
	1.8	3.7	2.7	1.6	-6.9	-33.2	41.0	2.3	10.7	12.9	8.6	7.5	5.1	2.8	2.4	2.3	2.4	-3.9	8.8	5.5	
	4.2	0.0	1.9	-0.3	-6.7	-27.2	22.9	13.1	9.9	13.0	6.9	6.7	6.1	5.4	5.2	4.9	2.9	-4.0	9.2	6.4	
***	2.0	-3.8	-1.7	-1.7	-15.2	-35.9	68.2	25.4	16.7	11.7	7.6	8.0	7.3	6.1	5.8	5.2	2.1	-5.0	16.3	7.2	
Intellectual Property Products	4.5	4.1	5.3	4.6	2.4	-11.4	8.4	10.5	10.1	9.3	7.5	6.8	6.0	5.6	5.1	4.9	6.4	1.7	7.8	6.3	
	8.2	1.6	3.6	-5.3	-3.7	-33.6	-17.4	-6.2	-4.8	3.2	3.3	2.8	2.5	2.8	3.5	3.7	-0.6	-11.0	-6.2	3.0	
	-1.7 2.5	-2.1 5.0	4.6 2.1	5.8 2.4	19.0 1.3	-35.6 2.5	63.0 -4.8	36.6 -0.8	10.8 6.3	4.0 1.1	9.0 2.6	8.5 2.2	8.5 2.2	8.5 1.8	8.0 1.4	7.5 1.1	-1.7 2.3	6.1 1.1	14.9 1.6	8.2 1.9	
	-907.4	-951.4	-950.2	-861.5	-788.0	-775.1	-1019.0	-1122.0	-1175.5	-1236.9	-1255.9	-1264.9	-1256.5	-1261.1	-1269.6	-1273.1	-917.6	-926.0	-1233.3	-1265.1	
	0.6	-0.8	0.0	1.5	1.1	0.6	-3.2	-1.5	-0.9	-1.3	-0.4	-0.2	0.2	-0.1	-0.2	-0.1	-0.2	0.0	-1.7	-0.2	
,	101.7	49.4	44.0	-1.1	-80.9	-287.0	-3.7	62.1	-85.5	5.0	50.0	90.0	120.0	120.0	110.0	100.0	48.5	-77.4	14.9	112.5	
Pct. Point Contribution to GDP	0.2	-1.0	-0.1	-0.8	-1.3	-3.5	6.6	1.4	-2.6	1.9	0.9	0.8	0.6	0.0	-0.2	-0.2	0.0	-0.7	0.5	0.5	
	4.0	4.1	4.0	3.9	-3.4	-32.8	38.3	6.3	10.7	14.5	11.6	10.2	8.3	5.3	4.6	4.4	4.0	-2.3	10.2	8.1	
	2.7	2.5	2.7	3.2	-3.6	-28.1	25.9	2.9	9.2	8.7	7.5	6.8	5.4	3.3	2.9	2.7	2.2	-2.9	6.6	5.2	
Retail Sales (b)	2.5	3.1	3.6	3.9	1.2	-7.8	4.0	3.9	14.2	32.1	15.3	15.3	5.9	1.2	1.2	1.3	3.3	0.3	18.9	2.4	
Inflation Indicators (b)																					
PCE Deflator	1.4	1.5	1.5	1.5	1.7	0.6	1.2	1.2	1.7	3.2	3.0	3.2	2.9	2.4	2.1	2.0	1.5	1.2	2.8	2.3	
"Core" PCE Deflator	1.7	1.7	1.8	1.6	1.8	1.0	1.4	1.4	1.5	2.6	2.4	2.7	2.7	2.4	2.3	2.2	1.7	1.4	2.3	2.4	
Consumer Price Index	1.6	1.8	1.8	2.0	2.1	0.4	1.3	1.2	1.9	4.0	3.7	3.7	3.3	2.6	2.3	2.3	1.8	1.2	3.3	2.6	
	2.1	2.1	2.3	2.3	2.2	1.3	1.7	1.6	1.4	2.6	2.5	2.7	3.1	2.8	2.6	2.5	2.2	1.7	2.3	2.7	
	1.9	2.0	1.7	1.1	1.1	-1.0	0.0	0.7	3.0	5.4	4.9	4.6	2.9	2.3	2.3	2.2	1.7	0.2	4.5	2.4	
Employment Cost Index	2.8	2.7	2.8	2.7	2.8	2.7	2.4	2.5	2.6	2.5	2.6	2.5	2.2	2.4	2.5	2.5	2.7	2.6	2.6	2.4	
Real Disposable Income (b)	3.2	2.1	1.8	1.6	1.4	12.2	6.4	3.1	15.5	-4.2	-0.1	1.8	-8.7	0.4	0.8	2.3	2.2	5.8	3.0	-1.5	
Nominal Personal Income (b)	4.7	4.1	3.5	3.5	3.2	10.7	6.8	4.0	15.6	-0.3	2.9	4.5	-5.4	2.8	2.9	4.3	3.9	6.1	5.5	1.0	
Industrial Production (a)	-1.9	-2.3	1.1	0.4	-6.8	-42.6	43.3	9.5	2.5	6.6	5.2	4.9	4.1	3.8	3.4	3.0	0.9	-6.7	5.5	4.3	
	78.6	77.8	77.6	77.2	75.8	66.0	72.2	73.9	74.4	76.0	77.5	78.3	79.0	80.1	80.9	81.4	77.8	72.0	76.5	80.3	
	-1.1	1.7	-0.5	1.3	-6.7	-19.3	3.5	-0.7	12.0	30.0	4.0	8.0	10.0	6.0	4.0	4.0	0.3	-5.8	12.6	5.9	
Corporate Profits After Taxes	-3.3	0.5	-0.3	1.3	-5.7	-18.8	2.8	-2.4	10.5	28.5	2.8	9.3	9.6	5.9	4.2	3.9	-0.4	-6.0	12.0	5.8	
	-372.2	-55.9	-237.3	-356.6	-386.9	-2000.9	-387.6	-572.9	-1133.3	-874.8	-618.9	-386.6	-517.6	-93.4	-302.4	-316.7	-984.4	-3131.9	-3200.0	-1300.0	
Trade Weighted Dollar Index (d)	109.9	109.8	111.2	110.0	112.8	110.4	106.6	103.3	104.2	103.3	103.8	103.8	103.0	102.3	101.8	101.8	110.2	109.1	103.7	102.2	
Nonfarm Payroll Change (e)	118.3	152.3	203.0	196.7	-359.7	-4333.3	1341.7	212.7	513.0	755.3	700.0	416.7	291.7	268.3	256.7	243.3	167.6	-784.7	596.3	265.0	
Unemployment Rate	3.9	3.7	3.6	3.6	3.8	13.1	8.8	6.8	6.2	5.8	5.2	4.7	4.5	4.4	4.3	4.2	3.7	8.1	5.5	4.4	
Housing Starts (f)	1.2	1.3	1.3	1.4	1.5	1.1	1.4	1.6	1.6	1.5	1.6	1.5	1.6	1.6	1.6	1.5	1.3	1.4	1.6	1.6	
Light Vehicle Sales (g)	16.9	17.0	17.0	16.9	15.0	11.3	15.3	16.1	16.9	17.4	15.7	16.1	16.1	16.9	17.1	17.2	17.0	14.4	16.5	16.8	
Crude Oil - Brent - Front Contract (h)	63.8	67.6	61.5	61.7	51.0	34.7	43.8	45.5	60.9	67.0	65.0	64.0	60.5	60.5	60.5	59.5	63.6	43.7	64.2	60.3	
Quarter-End Interest Rates (i)																					
Federal Funds Target Rate	2.50	2.50	2.00	1.75	0.25	0.25	0.25	0.25	0.25	0.25	0.25	0.25	0.25	0.25	0.25	0.25	2.25	0.50	0.25	0.25	
Secured Overnight Financing Rate (h)	2.43	2.43	2.28	1.67	1.23	0.05	0.09	0.09	0.04	0.05	0.05	0.05	0.05	0.05	0.05	0.05	2.20	0.36	0.05	0.05	
3 Month LIBOR	2.60	2.32	2.09	1.91	1.45	0.30	0.23	0.24	0.19	0.20	0.20	0.20	0.20	0.20	0.20	0.20	2.33	0.65	0.20	0.20	
Prime Rate	5.50	5.50	5.00	4.75	3.25	3.25	3.25	3.25	3.25	3.25	3.25	3.25	3.25	3.25	3.25	3.25	5.25	3.50	3.25	3.25	
Conventional Mortgage Rate	4.28	3.80	3.61	3.72	3.45	3.16	2.89	2.69	3.08	3.40	3.50	3.65	3.75	3.80	3.85	3.90	3.94	3.12	3.41	3.83	
3 Month Bill	2.40	2.12	1.88	1.55	0.11	0.16	0.10	0.09	0.03	0.05	0.05	0.05	0.05	0.05	0.05	0.05	2.11	0.36	0.05	0.05	
	2.44	2.09	1.83	1.60	0.15	0.18	0.11	0.09	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	2.11	0.37	0.05	0.05	
	2.40	1.92	1.75	1.59	0.17	0.16	0.12	0.10	0.07	0.10	0.10	0.10	0.15	0.15	0.20	0.25	2.05	0.37	0.09	0.19	
	2.27	1.75	1.63	1.58	0.23	0.16	0.13	0.13	0.16	0.15	0.20	0.25	0.30	0.40	0.50	0.65	1.97	0.39	0.19	0.46	
	2.23	1.76	1.55	1.69	0.37	0.29	0.28	0.36	0.92	1.00	1.10	1.25	1.40	1.50	1.60	1.70	1.95	0.53	1.07	1.55	
	2.41	2.00	1.68	1.92	0.70	0.66	0.69	0.93	1.74	1.85	1.95	2.05	2.15	2.20	2.25	2.30	2.14	0.89	1.90	2.23	
30 Year Bond Forecast as of: May 12, 2021	2.81	2.52	2.12	2.39	1.35	1.41	1.46	1.65	2.41	2.50	2.65	2.70	2.75	2.80	2.85	2.85	2.58	1.56	2.57	2.81	

(f) Millions of Units - Annual Data - Not Seasonally Adjusted (g) Quarterly Data - Average Monthly SAAR; Annual Data - Actual Total Vehicles Sold (h) Quarterly Average of Daily Close (f) Annual Numbers Represent Averages

Forecast as of: May 12, 2021

Notes: (a) Compound Annual Growth Rate Quarter-over-Quarter
(b) Vear-over-Year Percentage Change
(c) Quarterly Sum - Billions USD; Annual Data Represents Fiscal Yr.
(d) Federal Reserve Advanced Foreign Economies Index, 2006=100 - Quarter End
(e) Average Monthly Change

Source: U.S. Department of Commerce, U.S. Department of Labor, IHS Markit, Federal Reserve Board and Wells Fargo Securities

Forecast Delta Table

Changes to the Wells Fargo Securities U.S. Economic Forecast																				
	Actual				Forecast					Actual		Forecast								
		20)19			2	020	•		20	021			2	022		2019	2020	2021	2022
	1Q	2Q	3Q	4Q	1Q	2Q	3Q	4Q	1Q	2Q	3Q	4Q	1Q	2Q	3Q	4Q				
Real Gross Domestic Product (a)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.62	1.28	-0.79	0.45	0.49	-0.23	-0.23	-0.11	0.00	0.00	0.58	0.10
Personal Consumption	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.51	1.23	-1.82	-0.15	-0.11	-0.04	-0.02	-0.01	0.00	0.00	0.86	-0.21
Business Fixed Investment	0.00	0.00	0.00	0.00	0.00	0.00	-0.01	0.00	-2.60	5.94	0.01	0.11	-0.02	0.02	0.01	0.03	0.00	0.00	0.48	0.37
Equipment	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	4.03	2.77	-0.20	0.00	-0.01	0.00	0.01	0.05	0.00	0.00	1.54	0.14
Intellectual Property Products	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.08	2.85	0.24	0.25	-0.09	0.01	0.00	0.00	0.00	0.00	1.09	0.22
Structures	0.00	0.00	0.00	0.03	-0.02	-0.01	-0.01	0.02	-9.34	0.10	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-2.20	0.01
Residential Investment	0.00	0.00	0.00	0.01	0.00	-0.02	0.01	-0.02	-1.21	-5.50	0.00	0.00	0.50	1.50	1.50	1.00	0.00	0.00	-1.45	0.33
Government Purchases	0.00	0.00	0.00	0.00	0.00	0.01	0.00	-0.01	1.64	0.82	-0.41	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.50	0.00
Net Exports	0.0	0.0	0.0	0.0	0.0	0.1	0.0	0.0	-10.1	-2.9	-6.5	-1.3	-4.1	-16.5	-21.8	-22.4	0.0	0.0	-5.2	-16.2
Pct. Point Contribution to GDP	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.05	0.16	-0.07	0.11	-0.06	-0.24	-0.10	-0.01	0.00	0.00	-0.03	-0.06
Inventory Change	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	-110.5	-43.0	-15.0	5.0	35.0	35.0	27.0	20.0	0.0	0.0	-40.9	29.3
Pct. Point Contribution to GDP	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-1.85	1.42	0.57	0.40	0.59	0.00	-0.15	-0.13	0.00	0.00	-0.22	0.35
Nominal GDP	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.17	3.10	-0.01	0.58	0.52	-0.24	-0.23	-0.12	0.00	0.00	1.15	0.33
Real Final Sales	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.24	0.64	-1.42	0.02	-0.12	-0.23	-0.06	0.03	0.00	0.00	0.74	-0.21
Retail Sales (b)	-0.20	-0.27	-0.23	-0.20	-0.08	-0.13	-0.12	0.05	2.27	8.17	5.92	4.65	-0.12	-2.50	-2.55	-1.68	-0.23	-0.07	5.20	-1.75
Inflation Indicators (b)																				
PCE Deflator	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.02	0.38	0.57	0.60	0.58	0.21	0.03	0.00	0.00	0.00	0.39	0.20
"Core" PCE Deflator	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.02	0.38	0.36	0.39	0.37	0.15	0.16	0.00	0.00	0.00	0.27	0.22
Consumer Price Index	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.05	0.51	0.74	0.68	0.59	0.16	-0.06	0.00	0.00	0.00	0.50	0.17
"Core" Consumer Price Index	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.03	0.31	0.74	0.38	0.32	0.10	0.04	0.00	0.00	0.00	0.28	0.14
Producer Price Index (Final Demand)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.17	0.61	0.61	0.61	0.43	0.00	0.00	0.00	0.00	0.00	0.50	0.11
Employment Cost Index	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.49	0.38	0.46	0.50	0.06	0.20	0.16	0.12	0.00	0.00	0.46	0.14
Real Disposable Income (b)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.15 1.50	-0.24 0.13	0.50 1.08	0.74 1.36	-1.07 0.00	0.97 1.20	0.23 0.26	0.00	0.00	0.00	0.76 1.00	-0.02 0.36
Nominal Personal Income (b)					0.00	0.00	0.00		-3,40		-0.98	-0.07				0.57	0.00			
Industrial Production (a) Capacity Utilization	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.24 0.04	-0.56	-3.57 -0.71	-0.96	-0.07	0.00 -0.53	0.00 -0.18	0.27	0.00	0.00	0.01 0.01	-1.62 -0.54	-0.27 -0.18
Corporate Profits Before Taxes (b)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.04	-4.00	-4.00	-2.00	0.00	2.00	2.00	0.00	0.00	0.00	0.00	-2.37	0.96
Corporate Profits After Taxes	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-3.94	-3.95	-1.98	0.00	1.99	1.99	0.00	0.00	0.00	0.00	-2.36	0.96
- '	_																			
Federal Budget Balance (c)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	139.78	135.77	24.44	-0.23	-0.61	0.81	0.03	-0.25	0.00	0.00	300.00	0.00
Trade Weighted Dollar Index (d)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-2.50	-2.25	-2.25	-2.00	-2.25	-2.25	-1.75	0.00	0.00	-1.75	-2.06
Nonfarm Payroll Change (e)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-26.00	-178.00	100.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-26.00	0.00
Unemployment Rate	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.23	0.20	0.10	0.10	0.03	0.07	0.10	0.00	0.00	0.13	0.07
Housing Starts (f)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.13	0.05	0.13	-0.03	0.07	0.13	0.11	0.01	0.00	0.00	0.07	0.08
Light Vehicle Sales (g)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.13	1.51	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.41	0.00
Crude Oil - Brent - Front Contract (h)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	4.00	4.00	4.00	4.00	4.00	4.00	4.00	0.00	0.00	3.00	4.00
Quarter-End Interest Rates (i)																				
Federal Funds Target Rate	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Secured Overnight Financing Rate	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-0.05	-0.05	-0.05	-0.05	0.00	0.00	0.00	-0.05
3 Month LIBOR	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-0.05	-0.05	-0.05	-0.05	0.00	0.00	0.00	-0.05
Prime Rate	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Conventional Mortgage Rate	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-0.15	-0.15	-0.10	-0.10	-0.10	-0.10	-0.10	0.00	0.00	-0.10	-0.10
3 Month Bill	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	-0.05	-0.05	-0.05	-0.05	0.00	0.00	0.00	-0.05
2 Year Note	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
5 Year Note	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
10 Year Note	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
30 Year Bond	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Forecast as of: May 12, 2021

Notes: (a) Compound Annual Growth Rate Quarter-over- (f) Millions of Units - Annual Data - Not Seasonally Adjusted

(b) Vear-over-Year Percentage Change

(c) Quarterly Sum - Billions USD; Annual D tata - Average Monthly SAAR; Annual Data - Actual Total Vehicles Sold

(c) Quarterly Sum - Billions USD; Annual D (f) Quarterly Average of Daily Close

(d) Federal Reserve Advanced Foreign Ecor (i) Annual Numbers Represent Averages

(e) Average Monthly Change

Source: U.S. Department of Commerce, U.S. Department of Labor, IHS Markit, Federal Reserve Board and Wells Fargo Securities

Personal Consumption Expenditures

• The expected surge in consumer spending arrived early. First quarter PCE growth came in stronger than we were expecting as stimulus checks burned a hole in consumers' pockets.

- We have taken up our second quarter growth forecast for consumer spending but have pared Q3 growth slightly, essentially banking some demand having been pulled forward slightly.
- The biggest driver of consumer activity over the next few quarters will be the relaxation of social distancing restrictions and the concomitant reopening of the services economy.

A seismic shift in spending on services is right around the corner, but our <u>analysis</u> of prior cycles suggests that there is scope for continued growth in durable goods spending even though some demand for these big-ticket items has been pulled forward. With the public health situation improving and the economy continuing to gradually reopen, households are preparing to direct consumption toward services. We expect the sizable pickup in services spending to be the primary driver of consumer spending in the second half of the year, though that need not come at the expense of a complete collapse in goods spending.

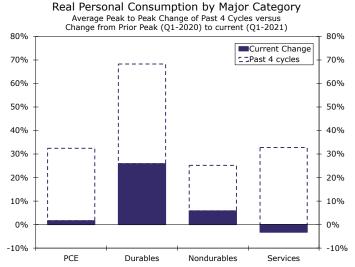
Investment: Equipment, Intellectual Property Products and Inventories

- Growing backlogs point to equipment spending continuing on at a brisk pace in Q2, even as investment spending will be restrained by ongoing parts shortages.
- The sharp draw down in inventories in Q1 and continuing struggles to meet booming demand suggest efforts to restock will take longer to ramp up. We now look for the pace of inventory rebuilding to peak around the first half of 2022.

The brisk pace of capital spending looks set to continue in the second quarter. Unfilled orders for core capital goods grew at a heady rate in Q1, up 8.1% annualized. However, issues securing key parts, particularly in the auto sector, which accounted for 13% of equipment spending in 2019, looks set to keep a lid on the pace of equipment spending in the near term.

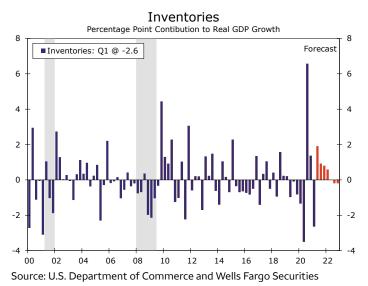
The struggle for production to keep pace with demand was evident in the first quarter's draw down in inventories that lopped 2.6 points off of headline GDP growth. The larger-than-expected decline in inventories and near-term struggle to procure materials and products suggest the bulk of restocking efforts will be larger and later over our forecast horizon. The rebuilding of inventories is now expected to add half a point to top-line GDP growth in 2022, mitigating the slowdown in final sales.

Figure 5



Source: U.S. Department of Commerce and Wells Fargo Securities

Figure 6



Investment: Residential

• We have lowered our forecast for growth in Q2-2021 residential investment reflecting weakerthan-anticipated existing home sales during March and surging prices for building materials.

Despite these near-term headwinds, we maintain our relatively strong residential investment
outlook for 2021 and are upgrading our forecast for 2022. Longer term, robust employment
growth and favorable demographics should more than offset the drag of higher interest rates and
low inventories of homes for sale.

Supply constraints appear to be limiting housing activity. Existing home sales fell 3.7% in March to a still-strong 6.01-million unit pace. Even with the modest improvement in the number of homes for sale recently, inventories remain at historic lows and are almost 30% lower than they were a year ago. Higher home prices are also likely pushing some buyers to the sidelines. The median price of an existing single-family home has risen over 18% over the past year. Relatively few trade-up options and soaring home values, which have significantly boosted homeowner equity, have also led to a surge in additions and renovations.

New home construction has strong momentum. During March, total housing starts jumped over 19% to a 1.74-million unit pace, which is the fastest pace in over a decade. Home builders are clearly ramping up construction to meet strong demand and alleviate low inventories for new and existing home. However, building material shortages for key inputs, such as lumber, copper and steel, are leading to soaring costs and project delays. We expect some of these supply chain issues to partially resolve as the year goes on and building material producers are able to operate closer to full capacity. The ongoing strength in the NAHB/Wells Fargo Housing Market Index (HMI) suggests that new home sales and single-family construction will remain close to their recent highs, despite these supply-side challenges.

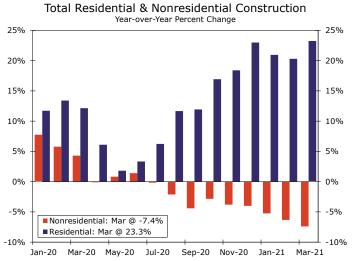
Investment: Nonresidential Structures

We have not made any significant changes to the structures forecast. Uncertain occupancy needs
in a post-COVID environment means new office construction will continue to lag, especially in
central business districts. However, improved prospects for other areas of nonresidential building
construction and oil & gas drilling activity should keep growth in overall structures investment
positive over the forecast period.

Despite weakening recently, nonresidential construction activity appears poised for improvement this year as more projects are given the green light alongside diminishing COVID risks. Against an improving public health backdrop, hotel occupancy rates continue to rise and retailers appear to be seeing a significant increase in foot-traffic at brick-and-mortar establishments. Even with more people venturing out, however, the shift to e-commerce will continue to fuel robust demand for warehouse and distribution space. Construction of manufacturing facilities could be another source of strength this year as more production is re-shored due to ongoing supply chain constraints.

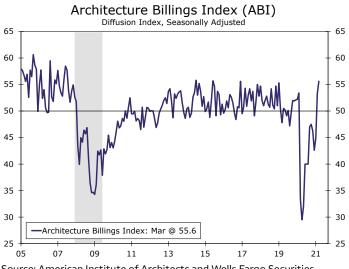
Another promising sign is that the forward-looking Architecture Billings Index (ABI) rose to 55.6 in March, which marks a pandemic high. The recent rise in the ABI means nonresidential activity should begin to strengthen over the course of the year. A revival in oil and gas drilling activity is also under way. At the end of the first week in May, the total rig count was 448, the highest since the collapse in oil prices and drilling activity in the spring of last year. Similar to the residential sector, however, higher material costs will likely be a headwind for the construction industry.

Figure 7



Source: U.S. Department of Commerce and Wells Fargo Securities

Figure 8



Source: American Institute of Architects and Wells Fargo Securities

Labor Market

 April's disappointing jobs report highlighted the frictions of fully reopening an economy. We have slightly pushed back our expectations for a full jobs recovery and forecast unemployment will end the year at 4.7%, a tick higher than our April forecast.

Hiring in April fell well short of expectations, with 266K new jobs added compared to the consensus mark of 1.0M. The report seemed to be somewhat of an outlier compared to other labor market data last month, such as hiring indices of various PMIs and rising job openings, but illustrates that staffing up after a pandemic will not be a quick, seamless process. The labor supply is improving, evidenced by the increase in the participation rate to 61.7%, which should help businesses fill open positions, but will also lead to a slower pace of improvement in the unemployment rate. We expect hiring over the next few months will be slightly stronger than previous estimates as payroll growth comes back in alignment with other labor data, but look for the jobs recovery overall to take a bit more time.

Inflation

• The struggle for the supply side of the economy to meet surging demand intensified over the past month. Rising material costs, ongoing parts shortages and firming labor costs have led us to upwardly revise our already above-consensus inflation forecast. Core PCE inflation is now expected to run 2.4%-2.7% on a year-ago basis over the next five quarters.

Inflationary pressures have intensified over the past month, leading us to raise our near-term forecasts even further above the current consensus. Momentum in core inflation picked up in March, including a hefty 0.4% rise in the core PCE deflator. We see scope for further solid monthly gains in headline and core inflation measures as the supply-side struggle to meet demand has worsened. Commodity prices have continued to climb generally, but the ongoing rise in food prices suggests the solid clip of food inflation over the past year is not about to let up anytime soon. Meanwhile, auto prices look poised for some steep near-term gains as wholesale prices for used cars have surged and new production has been scaled back significantly due to the semiconductor shortage. Beyond the scramble for parts and materials, the slow return of workers to the labor force is keeping wage pressures firm. While the year-ago rates of inflation are expected to peak during the current quarter thanks in part to low base comparisons after last spring's lockdowns, current pressures are to keep the year-over-year pace elevated in 2021. We expect inflation to slow more discernibly over the latter half of 2022, but with inflation expectations continuing to firm, core PCE inflation is expected to remain above 2.0% through our forecast horizon.

Figure 9

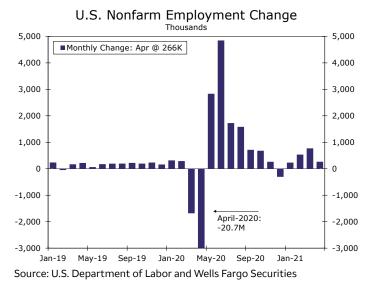
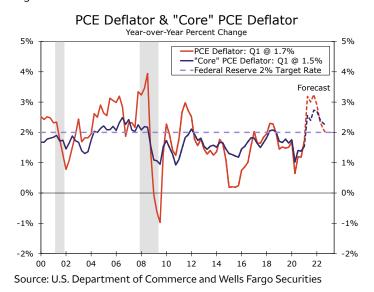


Figure 10



Fiscal Policy

• No material changes to our forecast for government output. Revised our federal budget deficit forecast for FY 2021 from \$3.5 trillion to \$3.2 trillion, left FY 2022 unchanged at \$1.3 trillion.

• American Jobs Plan, American Families Plan are still in the early stages.

We have made no major changes to our forecast for government output. We expect state and local government output to accelerate in the months ahead as school re-openings continue and many of these governments use federal aid and robust tax collections to fund new spending initiatives. We revised our federal budget deficit forecast for FY 2021 from \$3.5 trillion to \$3.2 trillion. Additional details on this revision can be found in a recent report.

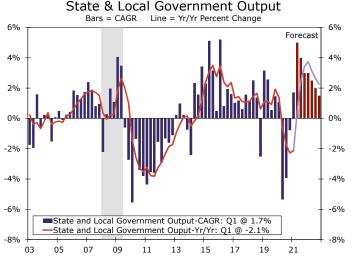
Since our previous monthly economic outlook, the Biden administration has released the American Families Plan, a \$1.8 trillion social welfare initiative paired with some tax increases on the individual side of the tax code. Talks around the infrastructure-oriented American Jobs Plan (AJP) have continued to occur, but so far, we have not seen much evidence of meaningful progress in the six weeks or so since the AJP was released. Ultimately, our best guess is that legislators will eventually combine both plans into one budget reconciliation bill, scaling back some parts significantly and eliminating other parts altogether such that total spending lands in the \$2 trillion-\$3 trillion range over 10 years, with tax increases perhaps about half that size. In our view, a plausible fallback option could be just the "core" physical infrastructure proposal of \$1 trillion or so. With so much uncertainty, our forecast still makes no explicit assumptions about new tax or spend policies, but we will be watching this topic closely and could make changes if progress starts to occur.

Monetary Policy & Interest Rates

- No material changes to our interest rate or monetary policy outlook.
- Our base case is still that the FOMC announces a taper of its asset purchases in December 2021, with the actual tapering beginning in January 2022 and continuing for most of the year.

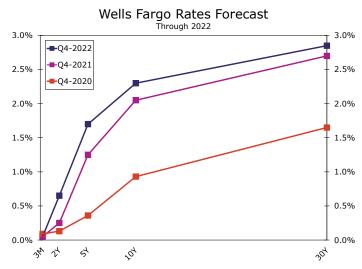
April's weak nonfarm payrolls reading reinforces our view that the FOMC is still at least a few months away from talking about a taper of its asset purchases, let alone actually executing on that vision. That said, although there may be some near-term bumps in the road as the economy fully reopens, we still anticipate a significant improvement in the economy over the remainder of the year. The exact timing of the taper is uncertain, but we believe sometime later this year or early in 2022 will be the sweet spot. With a shrinking output gap, improving labor market, faster inflation and anticipated Federal Reserve tightening, we think Treasury yields will eventually break out of their recent narrow trading range and head higher. We continue to look for the 10-year yield to finish 2021 around 2%.

Figure 11



Source: U.S. Department of Commerce and Wells Fargo Securities

Figure 12



Net Exports

• We continue to look for trade to be a sizable drag on growth in the near term and forecast net exports to subtract 1.3 percentage points (1.4 pp previously) from headline growth in Q2-2021.

Our latest forecast still has net exports subtracting 1.7 percentage points from 2021 GDP growth.

We did not make any major changes to the trajectory of net exports since our previous forecast update. We continue to expect exceptionally-lean retail and business inventories in the United States to fuel import growth and the gradual reopening of the global economy to begin to more meaningfully spur export growth beginning in the second quarter.

While the contributions to growth remain fairly steady with our prior forecast, we did decrease 2021 import growth a touch, reflecting ongoing supply shortages of key inputs. This downward revision, however, was balanced by a modest downward revision to full-year export growth due entirely to a weaker first quarter than we had forecast. We also shifted the growth profile of exports pulling some growth forward from later in the year, reflecting increased near-term expectations in some key international economies (see International Developments below).

International Developments & The U.S. Dollar

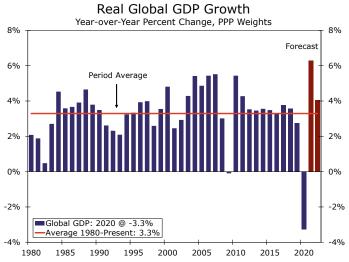
- Our 2021 global GDP growth forecast of 6.3% is unchanged from a month ago. However, that steady forecast reflects an improved outlook for the U.S. and some other major economies that has been offset by downgrades elsewhere, most notably for the emerging economies. We have revised our growth forecast for the United Kingdom higher as confidence surveys have improved as COVID concerns recede, but have lowered our outlook for Japan. Our GDP growth forecasts for India and Brazil have softened since last month.
- Risks to our forecast for the trade-weighted U.S. dollar: tilted to the downside given improved
 outlooks for some major developed economies, and hints toward less accommodative monetary
 policy from some foreign central banks.
- Risks to our forecast for global GDP growth: balanced, with upside risk for the developed economies and downside risks for emerging economies.
- For further reading on the global economy, please see our most recent <u>International Economic Outlook</u>.

Our 2021 global GDP growth forecast is unchanged from last month, with upward revisions for some key developed economies offset by downward growth revisions for some emerging economies. Internationally, the most notable forecast change is to U.K. GDP, where we now expect 7.0% GDP growth in 2021. The United Kingdom continues to make steady progress in vaccinating its population against COVID, which is reflected in both firming activity data and stronger confidence surveys. The Australian growth outlook has also firmed as that country shows a solid post-COVID recovery, but we have lowered our 2021 Japan GDP growth forecast to just 2.6% as a renewed wave of COVID cases has seen a state of emergency extended. Among the emerging economies, we have made sizable downward revisions to growth forecast for India, where COVID cases have surged, and Brazil, where the outlook remains somewhat uncertain.

Another significant theme that has become more noticeable over the past month are early hints of moves by some foreign central banks toward less accommodative monetary policy. Norway's central bank still looks to be on course to raise rates before the end of this year. Meanwhile, with respect to quantitative easing, both the Bank of Canada and Bank of England have slowed the pace of their weekly bond purchases within the past month, by C\$1 billion per week and £1 billion per week, respectively.

Given the still sturdy U.S. economic outlook and likelihood of robust near-term growth, our view remains that the trade-weighted value of the U.S. dollar can remain steady to stronger over the next quarter or two. However, as the outlook for economies such and the United Kingdom and Canada improve, and even that of the Eurozone stays relatively steady, we believe the eventual improvement in international growth and international sentiment will see the U.S. dollar soften. The fact that some foreign central banks appear to be moving toward less policy accommodation ahead of the Fed is another factor that could weigh on the greenback, which could see moderate declines versus the developed and emerging currencies over the medium term.

Figure 13



Source: International Monetary Fund and Wells Fargo Securities

Figure 14



Monthly

Wells Fargo International Economic Forecast								
(Year-over-Year Percent Change)								
		G	DP			C	PI	
	<u>2019</u>	<u>2020</u>	<u>2021</u>	<u>2022</u>	<u>2019</u>	<u>2020</u>	<u>2021</u>	<u>2022</u>
Global (PPP Weights)	2.8%	-3.3%	6.3%	4.1%	3.5%	3.2%	3.4%	3.5%
Advanced Economies ¹	1.6%	-4.7%	5.5%	4.8%	1.4%	0.7%	2.3%	2.0%
United States	2.2%	-3.5%	7.0%	5.6%	1.8%	1.2%	3.3%	2.6%
Eurozone	1.3%	-6.6%	3.6%	3.9%	1.2%	0.3%	1.4%	1.2%
United Kingdom	1.4%	-9.9%	7.0%	5.8%	1.8%	0.9%	1.6%	2.0%
Japan	0.3%	-4.8%	2.6%	2.1%	0.5%	0.0%	0.1%	0.5%
Canada	1.9%	-5.4%	6.1%	3.5%	1.9%	0.7%	2.1%	2.1%
Switzerland	1.1%	-3.0%	3.3%	2.8%	0.4%	-0.7%	0.2%	0.3%
Australia	1.9%	-2.4%	4.8%	3.6%	1.6%	0.9%	1.8%	1.8%
New Zealand	2.4%	-3.0%	4.3%	2.8%	1.6%	1.7%	1.6%	1.4%
Sweden	1.4%	-2.8%	3.8%	3.1%	1.6%	0.7%	1.5%	1.4%
Norway	0.9%	-0.8%	3.7%	3.1%	2.2%	1.3%	2.6%	2.0%
Developing Economies ¹	3.6%	-2.2%	6.9%	3.5%	5.1%	5.1%	4.4%	4.6%
China	5.8%	2.3%	9.0%	5.6%	2.9%	2.4%	1.6%	2.3%
India	4.0%	-8.0%	11.0%	4.2%	4.8%	6.2%	4.6%	4.5%
Mexico	-0.1%	-8.2%	5.0%	2.7%	3.6%	3.4%	4.2%	3.7%
Brazil	1.4%	-4.1%	3.2%	2.1%	3.7%	3.2%	4.5%	4.0%

Forecast as of: May 12, 2021

Source: International Monetary Fund and Wells Fargo Securities

	Wells Fargo	Internation	al Interest I	Rate Forecas	t					
(End of Quarter Rates)										
	Central Bank Key Policy Rate									
		2021			2022					
	Q2	Q3	Q4	Q1	Q2	Q3				
United States	0.25%	0.25%	0.25%	0.25%	0.25%	0.25%				
Eurozone ¹	-0.50%	-0.50%	-0.50%	-0.50%	-0.50%	-0.50%				
United Kingdom	0.10%	0.10%	0.10%	0.10%	0.10%	0.10%				
Japan	-0.10%	-0.10%	-0.10%	-0.10%	-0.10%	-0.10%				
Canada	0.25%	0.25%	0.25%	0.25%	0.25%	0.50%				
	2-Year Note									
		2021			2022					
	Q2	Q3	Q4	Q1	Q2	Q3				
United States	0.15%	0.20%	0.25%	0.30%	0.40%	0.50%				
Eurozone ²	-0.70%	-0.65%	-0.65%	-0.60%	-0.60%	-0.55%				
United Kingdom	0.05%	0.10%	0.10%	0.15%	0.15%	0.20%				
Japan	-0.10%	-0.10%	-0.05%	-0.05%	-0.05%	-0.05%				
Canada	0.30%	0.35%	0.45%	0.55%	0.70%	0.85%				
	10-Year Note									
		2021			2022					
	Q2	Q3	Q4	Q1	Q2	Q3				
United States	1.85%	1.95%	2.05%	2.15%	2.20%	2.25%				
Eurozone ²	-0.20%	-0.15%	-0.10%	-0.05%	0.05%	0.15%				
United Kingdom	1.00%	1.05%	1.15%	1.20%	1.30%	1.40%				
Japan	0.10%	0.10%	0.15%	0.15%	0.15%	0.20%				
Canada	1.65%	1.80%	1.95%	2.10%	2.20%	2.30%				

Forecast as of: May 12, 2021

Source: Bloomberg LP and Wells Fargo Securities

¹Aggregated Using PPP Weights

¹ ECB Deposit Rate ² German Government Bond Yield

U.S. Economic Outlook: May 2021

This Month's Economic Calendar

Monday	Tuesday	Wednesday	Thursday	Friday
10	11	12	13	14
Evans* (Chicago Fed)	JOLTS Job Openings	Consumer Price Index (MoM)	PPI Final Demand (MoM)	Retail Sales (MoM)
Discusses the Economic Outlook	March 8,123K	March o.6%; April o.3% (W)	March 1.0%; April 0.2% (W)	March 9.7%; April 1.9% (W)
China CPI (YoY)	Williams* (Fed Vice Chair)	Clarida* (Board of Governors)	Barkin* (Richmond Fed)	Industrial Production (MoM)
March 0.4%	Speaks at a SOFR Symposium	Discusses the U.S. Economic Outlook	Speaks to the Central Maryland Chamber	March 1.4%; April 1.1% (W)
	Brainard* (Board of Governors)	United Kingdom GDP (QoQ)	Waller* (Board of Governors)	Clarida* & Bostic* (B. of Gov. & Atl. Fed)
	Discusses the U.S. Economic Outlook	Q4 1.3%	Discusses the U.S. Economic Outlook	Hold an Armchair Discussion
17	18	19	20	21
Japan GDP (SA, QoQ)	Housing Starts (SAAR)	Canada CPI (YoY)	Japan Natl CPI (YoY)	Existing Home Sales (SAAR)
Q4 2.8%	March 1,739K	March 2.2%	March -0.2%	March 6.01M
	Eurozone GDP (SA, QoQ)			
	Q4 -0.6%			
	Kaplan (Dallas Fed)			
	Part of Panel Discussion at Atlanta Fed Conf.			
		FOMC Meeting Minutes		
24	25	26	27	28
	New Home Sales (SAAR)		Durable Goods (MoM)	Personal Income & Spending (MoM)
	March 1,021K		March o.8%	March 21.1%; 4.2% (Income; Spending)
	Consumer Confidence			
	April 121.7			
	Quarles* (Board of Governors)			
	Testifies Before the Senate Banking Committee			
31	1	2	3	4
	ISM Manufacturing Index	U.S. Federal Reserve Releases Beige Book	ISM Services Index	Nonfarm Payrolls
	April 60.7		April 62.7	April 266K
	Eurozone CPI (YoY)		Quarles* (Board of Governors)	
	April 1.6%		Speaks at SIFMA Conference	
	April 1.6% Canada GDP (QoQ, Annualized)		Speaks at SIFMA Conference	

Note: (W) = Wells Fargo Estimate, (C) = Consensus Estimate, * = voting FOMC member in 2021, Purple = Market Moving Releases

Source: Bloomberg LP, Federal Reserve System, U.S. Department of Labor, U.S. Department of Commerce, Institute for Supply Management, Conference Board and Wells Fargo Securities

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Economics Group

Jay H. Bryson, Ph.D.	Chief Economist	(704) 410-3274	jay.bryson@wellsfargo.com
Mark Vitner	Senior Economist	(704) 410-3277	mark.vitner@wellsfargo.com
Sam Bullard	Senior Economist	(704) 410-3280	sam.bullard@wellsfargo.com
Nick Bennenbroek	International Economist	(212) 214-5636	nicholas.bennenbroek@wellsfargo.com
Tim Quinlan	Senior Economist	(704) 410-3283	tim.quinlan@wellsfargo.com
Azhar Iqbal	Econometrician	(212) 214-2029	azhar.iqbal@wellsfargo.com
Sarah House	Senior Economist	(704) 410-3282	sarah.house@wellsfargo.com
Charlie Dougherty	Economist	(704) 410-6542	charles.dougherty@wellsfargo.com
Michael Pugliese	Economist	(212) 214-5058	michael.d.pugliese@wellsfargo.com
Brendan McKenna	International Economist	(212) 214-5637	brendan.mckenna@wellsfargo.com
Shannon Seery	Economist	(704) 410-1681	shannon.seery@wellsfargo.com
Hop Mathews	Economic Analyst	(704) 383-5312	hop.mathews@wellsfargo.com
Nicole Cervi	Economic Analyst	(704) 410-3059	nicole.cervi@wellsfargo.com
Sara Cotsakis	Economic Analyst	(704) 410-1437	sara.cotsakis@wellsfargo.com
Coren Burton	Administrative Assistant	(704) 410-6010	coren.burton@wellsfargo.com

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