US Economic Weekly

A policy gift of trillions

27 March 2020

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Macro viewpoint: A policy gift of trillions

The Fed has become the lender and buyer of last resort to restore liquidity and the flow of credit. Washington announced $2 trillion of stimulus or 9% of GDP, targeting households and businesses most impacted by COVID-19. Will it work? It will help mitigate the pain but it does not prevent a deep recession.

View from the top:

Review:

The Fed made several additional moves this week including unlimited QE, re-establishing Term Asset-Backed Securities Loan Facility (TALF) and creating two new corporate bond facilities. It also plans to set up a Main Street lending program. Meanwhile, Congress moved ahead with a $2.2tr stimulus bill.

Initial jobless claims soared to 3.3mn in the week ending March 28.

Preview:

Although the jobs report is out on Friday, it won't be the focus given its lagging nature (survey week was prior to the brunt of the COVID shock). We expect nonfarm payrolls to decline 25K – fast forward a month to April and job losses will be in the millions.

The ISM surveys should show a move to recession with 46 on manufacturing and 45 on services. Auto sales for March should collapse to a 12 million saar pace. Consumer confidence should tank while claims remain elevated.

GDP update:

Weak capex data cut 1Q GDP tracking down by 0.2pp to 0.3% qoq saar.

Data deck for Mar 30 – Apr 3

Date	Time	Indicator	Period	BofA Estimate	Consensus	Previous
3/30/20	10:00	Pending Home Sales	Feb	-3.5%	-2.5%	5.2%
3/31/20	9:45	Chicago Purchasing Managers	Mar	40.0	44.0	49.0
3/31/20	10:00	Consumer Confidence	Mar	110	118.0	130.7
3/31/20	9:00	Case-Shiller HPI (yoy)	Jan	3.9%	—	3.8%
4/01/20	10:00	Construction Spending (mom)	Feb	1.0%	0.5%	1.8%
4/01/20	10:00	ISM Manufacturing	Mar	46.0	46.0	50.1
4/01/20	8:15	ADP Employment	Mar	-75k	-100k	183k
4/01/20	All day	Total Vehicle Sales	Mar	12.0M	15.4M	16.8M
4/02/20	8:30	Initial Jobless Claims	Mar 28	2500k	—	3283k
4/02/20	8:30	Trade Balance	Feb	-$39.1b	-$43.3b	-$45.3b
4/03/20	10:00	ISM Non-Manufacturing	Mar	45.0	48.1	57.3
4/03/20	8:30	Change in Nonfarm Payrolls	Mar	-25k	-81k	273k
4/03/20	8:30	Private Payrolls	Mar	-25k	-123k	228k
4/03/20	8:30	Unemployment Rate	Mar	3.7%	3.8%	3.5%
4/03/20	8:30	Average Hourly Earnings mom	Mar	0.4%	0.2%	0.3%
4/03/20	8:30	Average Weekly Hours	Mar	34.1	34.2	34.4

Source: BofA Global Research, Bloomberg

Refer to important disclosures on page 20 to 21.

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Timestamp: 27 March 2020 04:30AM EDT

Macro viewpoint

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A policy gift of trillions

- The Fed has become the lender and buyer of last resort. The goal is clear - restore liquidity in the financial system and the flow of credit in the real economy
- Washington joined forces and announced $2 trillion of stimulus or 9% of GDP, targeting households and businesses most impacted by COVID-19
- Will it work? Yes, it will help. But, no, it does not prevent a deep recession. Also the job of policymakers is not over – expect more as the economic weakens further.

Millions, billions, trillions!

This was a week of a policy action. We started on Monday morning with a bazooka from the Fed including unlimited quantitative easing (QE) and a number of new liquidity tools. We ended with a record $2 trillion stimulus from Washington. Policymakers are resolved to fix the credit crunch in both the financial system and the real economy.

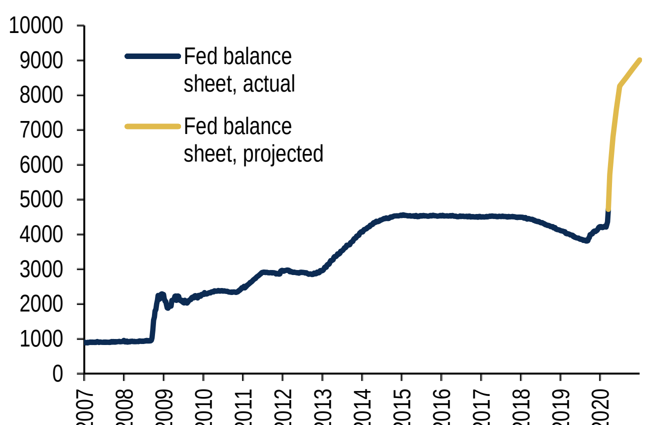
The question is whether it will work. In our view, it will help but it is too late to prevent a deep recession. It also won't be the final move for policymakers. In this piece we review the transmission of policy and offer ways to track - both in markets and the data - whether the stimulus is having an impact.

The cliffs note version

The Fed moved beyond the 2008 playbook with a series of unprecedented actions. We review here and in Table 1 in the appendix:

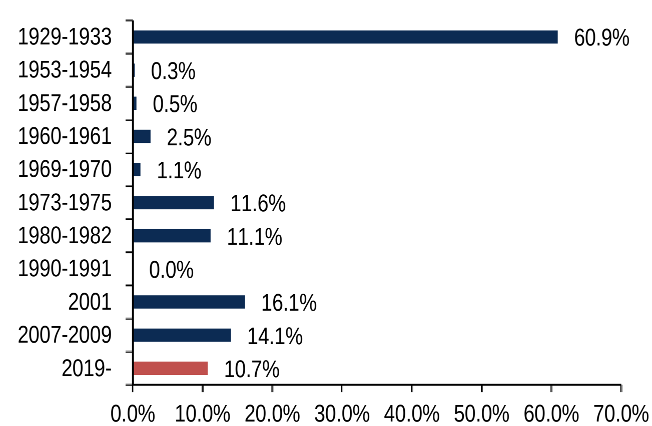
1. **Open-end QE**: Unlimited QE including Treasuries, agency mortgage-backed security (MBS) and agency commercial mortgage-backed securities (CMBS). The purchases are front-loaded, buying $75bn/day in Treasuries and $50bn/day in MBS. It seems reasonable that this record pace will continue through the end of March, sending the size of the Fed's balance sheet sharply higher (Chart 1).

Chart 1: The Fed's balance sheet is set to balloon ($bn)



Source: BofA Global Research, Federal Reserve Board of Governors

Chart 2: Fiscal stimulus as a share of GDP during and after recessions



Source: US Treasury, CBO, Joint Committee on Taxation, Templaski (2013), Fishback (2016)

2. **Credit facilities**: There are two – one to focus on the primary market (primary market corporate credit facility, PMCFF) and the other on the second (secondary market corporate credit facility, SMCCF). The former will allow the Fed to offer financing to investment grade corporates which will address the heavy amount of issuance. The latter will allow the Fed to purchase investment grade (IG) corporate bonds and exchanged traded funds (ETFs), providing liquidity and accommodating the rapid outflows in the market.

3. **TALF**, term asset backed securities loan facility: Fed enables the issuance of asset backed securities that include auto loans, credit cards and loans guaranteed by the Small Business Association (SBA).

4. **Funding**: expanded eligibility for the Commercial Paper Funding Facility (CPFF) and lowered funding rate. Also added munis and bank certificate of deposits (CDs) to the Money Market Lending Facility (MMLF).

5. **Main Street** Lending Program (MSLP): few details other than that the program which will support lending to small and mid-sized businesses.

Congress then stepped up to the plate. On Thursday, the Senate unanimously approved a stimulus package worth around $2.2tn or approximately 9% of GDP. Combining it with the smaller bills already passed, it leaves total stimulus as 10.7% of GDP (Chart 2). A summary:

- **Households:** Direct payments of $1200/$2400 (single/married) tax filers with additional $500 per child capped at $75k/$150k phasing out at $99k/$198k (about $250bn). Thirteen week expansion of unemployment insurance and an extra $600/week for workers receiving unemployment benefits through June (~$250bn).

- **Businesses:** Loans and grants to small businesses impacted by the outbreak (about $367bn), targeted financial support to industries disproportionately affected by the outbreak such as passenger airlines ($50bn), cargo airlines ($8bn), and other firms deemed important to national security ($17bn), and funding for the Fed via the Treasury to provide loans and liquidity to financial markets ($425bn).

- **Other:** Financial support to state and local governments (about $150bn), hospitals ($130bn), farmers ($50bn), and other social safety net programs (TBD).

There are many questions regarding the bill with timing and mechanics at the top of the list. We think that the increase in unemployment benefits can be disbursed quickly given that the infrastructure is already in place. In contrast, direct payments to households and financial assistance to businesses may take several weeks to implement.

Test 1: market liquidity

In the latest round of action, the Fed has focused on key markets: investment grade corporate (PMCCF and SMCCF), agency MBS (QE) and ABS (TALF 2.0) as well as municipal debt. In prior programs, the focus was on funding and Treasury market functioning. Tracking a few key market measures will help us determine the impact of the policies. We pick our top 6 charts and show them at the end of the piece (See: Top 6 charts on market liquidity):

Investment grade corporate debt:

As Hans Mikkelsen, BofA's IG credit strategist, has noted in a recent piece, "It's good to be IG" as the Fed can tolerate the credit risk from the IG market thereby underpinning it but cannot for high yield (HY). Since the Fed announced the credit programs – even though they haven't yet been implemented – outflows from prime money market funds and short term IG bond funds declined (Chart 7). And IG credit spreads are tightening (Chart 8). All of this before the facilities are up and running.

Securitized products:
The agency MBS market has been greatly supported as can be seen by the narrowing in spreads in Chart 9. For the ABS market, spreads for the highest quality assets have narrowed but there has only been minimal tightening for the broad aggregate (Chart 10), showing only little support so far.

Funding:
As BofA's rate strategists – Mark Cabana and Olivia Lima – have been writing about, funding has only improved on the margin. As Chart 11 shows, there are still dislocations in the front end as commercial paper and CD rates remain elevated. Prime MMFs also continue to see outflows, though the pace is slowing as the Fed's facilities greatly reduce the risk of a run on MMFs (Chart 12).

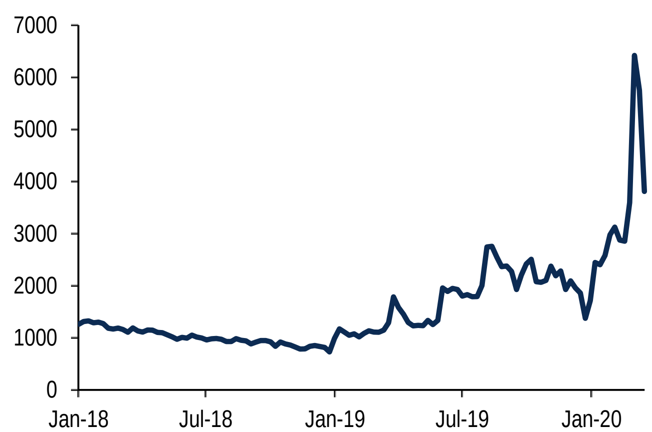
Test 2: the flow of credit to the economy

If markets behave better, it will help to restore the flow of credit through the financial system. One of the most obvious places to see whether these programs have worked is by tracking mortgage rates. The initial decline in Treasury rates through February was passed to the household with mortgage rates tumbling lower and an unprecedented surge in refinancing activity (Chart 3). However, in the past few weeks, mortgage rates have climbed higher as the spread between 10yr Treasury rates and 30 fixed conforming have blown out. This likely reflects the liquidity issues in the agency MBS market - which the Fed is now working to address - but also capacity constraints from services and banks which only time will help. The good news for the Fed is that since the action taken on Monday, spreads have begun to narrow (Chart 4)

The challenge for policymakers will be to get credit to flow outside of the capital markets. Restoring the investment grade corporate debt market will be able to help large companies who are deemed to be investment grade and can access the capital markets. It doesn't help the lower rated companies – those that are in the high yield universe. As BofA's HY strategist Oleg Melentyev notes, the credit cycle has turned and he expects defaults to reach 9% for the overall HY market and 6% ex energy. This would be slightly below the 10-12% per annum average seen during past credit cycles.

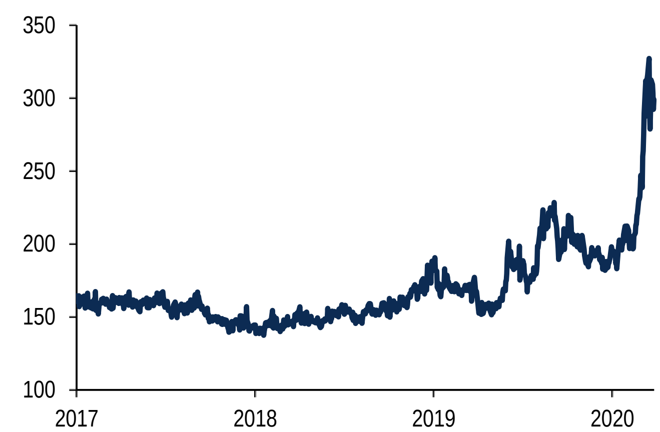
The Fed is zeroing in on small and mid-sized businesses which largely depend on bank lines of credit. It makes sense as just over half of all jobs are in small and mid-sized businesses, which we define as firms with employment less than 500. So it is a top priority to support these companies. This is where the Fed's "Main Street facility" will come into play as well as fiscal stimulus. We know very little about the Fed's Main Street Facility. Clearly the Fed cannot become a commercial bank and lend directly to small businesses. This means it will need to use an intermediary. Similar to TALF where the Fed will use asset managers to buy the securities, the Fed will need to partner with commercial banks to offer credit. Presumably the focus will be on the regional and community banks and will involve credit protection to banks or direct funding.

Chart 3: MBA refinance index surged earlier on the initial fall in mortgage rates but has since come back down (Mar-16-90 = 100)



Source: Mortgage Bankers association

Chart 4: Spread between mortgage rates and treasury yields narrowed (bp,30 yr FRM – 10 yr treasury yield)



Source: Bloomberg

From the stimulus bill, the funds allocated for small and medium sized businesses will be distributed through the Small Business Administration (SBA) and SBA approved lenders (e.g. credit unions, regional/community banks, etc.). These lenders will then extend credit to small businesses. There are outstanding questions about the logistics and timing of the disbursements of funds.

Test 3: the economic data

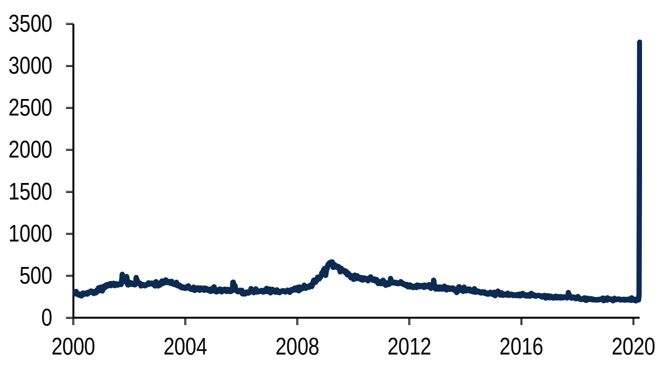
There is little that policymakers could do to prevent what will be extremely ugly data on the economic front in the coming weeks. We already received initial jobless claims which totaled 3.3 million in the latest week – breaking all records by far (Chart 5). And we expect claims to remain elevated for the next few weeks as reportedly claims offices were overwhelmed and there is a backlog to address. Moreover, businesses are continuing to close doors when faced with a lack of revenues. This should translate to between 4 and 6 million jobs lost in April, sending the unemployment rate to touch 7%. And it could be even more dramatic.

Regional manufacturing surveys have plunged into recession territory, and we expect the national ISM survey to confirm the contraction with a drop to 46.0 next week. This would be the lowest reading since May 2009. Moreover, the headline reading will likely be propped up partially by slower supplier deliveries – making the headline look better than the other details indicate.

We also continue to closely track trends in consumer spending from the BAC aggregated card data. As of the last report, we saw a significant decline in discretionary spending moving beyond travel and toward a decline in activity at restaurants and bars. Our proprietary consumer sentiment survey also showed that confidence has dropped sharply (Chart 6), which should be reflected in the upcoming surveys from University of Michigan and Conference Board.

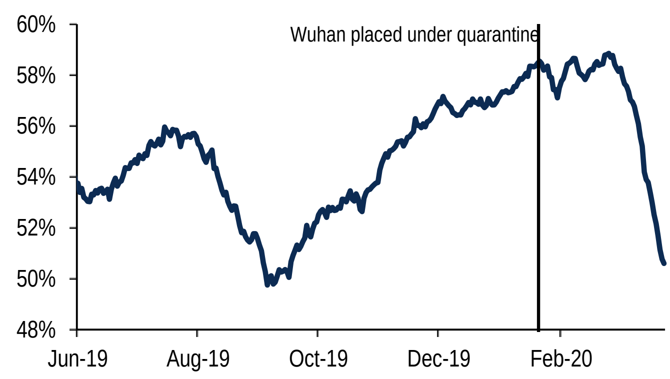
Clearly the recession is here and the initial plunge has been severe. The hope for the recovery will only come if the public health response is aggressive enough to flatten the curve for the spread of the virus. That means social distancing policies and sheltering at home to alleviate the stress on the healthcare system and stop the spread of the virus. Parts of the economy will have to be shut down to facilitate such. All that monetary and fiscal policy can do during this time is to put a stopgap in place so that once the virus passes, the economy can function again.

Chart 5: Initial jobless claims makes a new record by a large margin (in thousands)



Source: Department of Labor

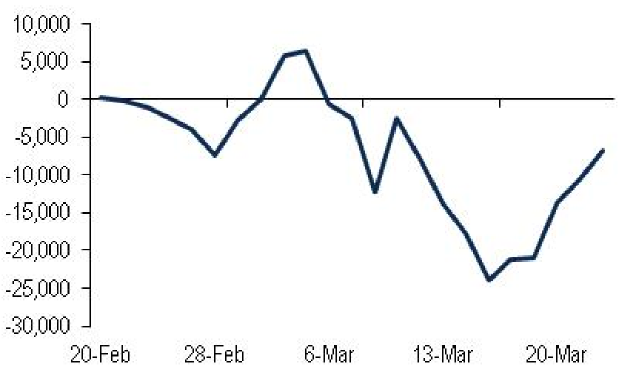
Chart 6: BofA US Consumer Confidence Indicator (%, 28-day weighted rolling ma)



Source: The indicator identified above as the BofA US Consumer Confidence Indicator above is intended to be an indicative metric only and may not be used for reference purposes or as a measure of performance for any financial instrument or contract, or otherwise relied upon by third parties for any other purpose, without the prior written consent of BofA Global Research. This indicator was not created to act as a benchmark. The 28 day rolling moving average is weighted by the daily sample size during the 28-day window. See Appendix for details on the construction of the indicator. Average sample size: 3,124 per 28-day window. Data through March 22.
Source: BofA Global Research

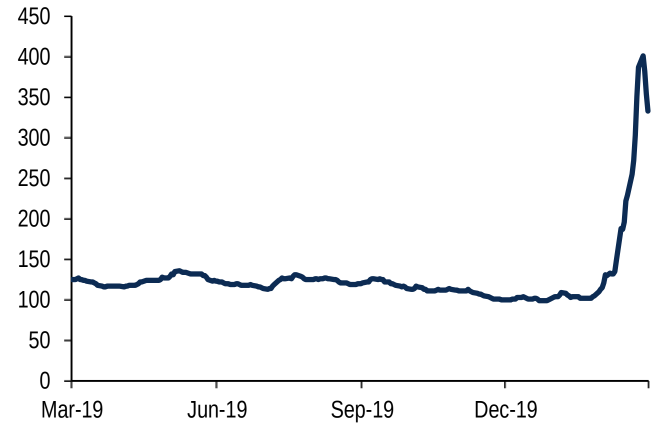
Top 6 charts on market liquidity

Chart 7: IG corporate bond prime market outflows abating



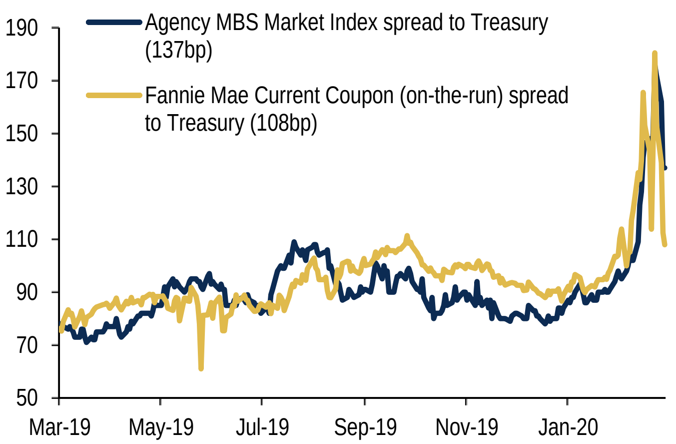
Source: Crane, Epfr Global, BofA Global Research

Chart 8: IG corporate bond spread tightening



Source: BofA Global Research

Chart 9: On-the-run MBS tightens in response to Fed

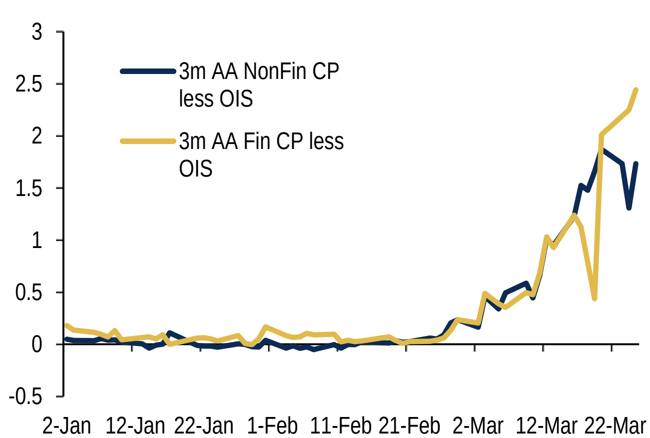


Source: ICE Data Indices, LLC, Bloomberg Note: Through 3/25/2020

Chart 10: TALF has yet to result in AAA ABS spread tightening

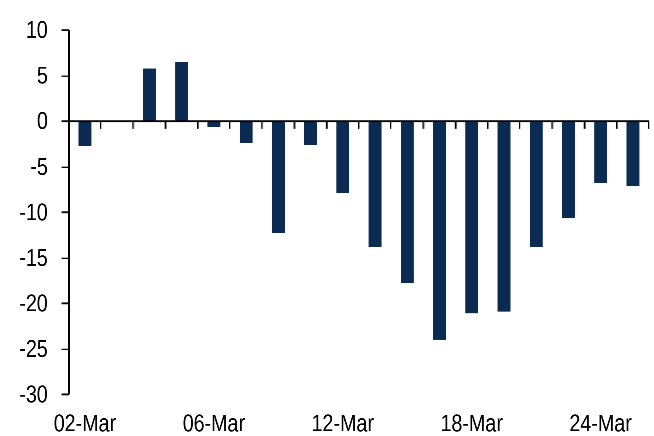
Source: ICE Data Indices, LLC Note: Through 3/25/2020

Chart 11: CP to OIS spreads remain wide (bps)



Source: Bloomberg, Note: Through 3/20

Chart 12: Daily prime MMF flows ($bn)



Source: Crane Data

Table 1: Fed policy actions now and then

Type of Tool	About	2020 Announced	Size	2008 Announced
Funding/Liquidity				
Repos	Overnight and term repo operations for primary dealers			
Discount Window	Short term funding against eligible collateral for depository institutions			
Central bank liquidity swap lines	Foreign central banks can access USD liquidity from the Fed	3/15/2020		12/12/2007
PCDF - primary dealer credit facility	Term funding against eligible collateral for primary dealers	3/17/2020		3/16/2008
TAF - term auction facility	Term funding against eligible collateral for depository institutions			12/12/2007
TSLF - term securities lending facility	UST loan against eligible collateral for primary dealers			3/11/2008
POMO				
Agency & MBS	Purchases of Agency securities and MBS from primary dealers	3/15/2020	Unlimited	11/28/2008
USTs	Purchases of Treasury securities from primary dealers	3/15/2020	Unlimited	3/18/2009
Credit				
CPFF - Commercial Paper Funding Facility	Fed created LLC purchases 3m CP directly from issuers, using loans	3/17/2020	$10bn likely 10x levered	10/7/2008
MMLF - Money Market Mutual Fund Liquidity Facility	Dealer purchases eligible assets from MMFs, using Fed loans	3/18/2020	$10bn likely 10x levered	
PMCCF - Primary Market Corporate Credit Facility	Fed Special Purpose Vehicle purchases corporate bonds from and provides loans to eligible issuers	3/23/2020	$10bn likely 10x levered	
SMCCF - Secondary Market Corporate Credit Facility	Fed Special Purpose Vehicle purchases corp bonds and ETFs in the secondary market. Held directly on Fed's balance sheet	3/23/2020	$10bn likely 10x levered	
TALF -Term Asset Backed Securities Loan Facility	Fed issues loans to holders of eligible ABS, collateralized by ABS	3/23/2020	$100bn	11/25/2008
AMLF - Asset Backed Commercial Paper Money Market Mutual Fund Liquidity Facility	US depository institutions purchase eligible ABCP from MMFs, via loans from Fed			9/19/2008
MMIFF - Money Market Investor Funding Facility	Fed Special Purpose Vehicle purchases eligible assets from MMFs, using Fed loans			10/21/2008
Targeted loans				
Bear Stearns Loan	FRBNY extends credit to Bear Stearns through JPM Chase Bank			3/14/2008
AIG Loan	FRBNY extends loan to AIG			9/16/2008

Source: BofA Global Research

View from the top

What's new

Review

- The Fed made several additional moves this week including unlimited QE, re-establishing TALF and creating two new corporate bond facilities. It also plans to set up a Main Street lending program. Meanwhile, the Senate passed a $2.2tn stimulus bill that provides support to households, businesses, state & local governments, and other sectors.
- Initial jobless claims soared to 3.3mn in the week ending March 28 amid massive city and state lockdowns across the nation.

Preview

- Although the jobs report is out on Friday, it won't be the focus given its lagging nature (survey week was prior to the brunt of the COVID shock). We expect nonfarm payrolls to decline 25K – fast forward a month to April and job losses will be in the millions.
- The ISM surveys should show a move to recession with 46 on manufacturing and 45 on services. Auto sales for March should collapse to a 12 million saar pace. Consumer confidence should tank while claims remain elevated.

GDP update

- Weak capex data cut 1Q GDP tracking down by 0.2pp to 0.3% qoq saar.

Core views

Growth

- The COVID-19 coronavirus is disrupting real activity in the US and has likely pushed the economy into recession. We expect negative growth of -0.8% this year followed by a 1.9% bounce in 2021.

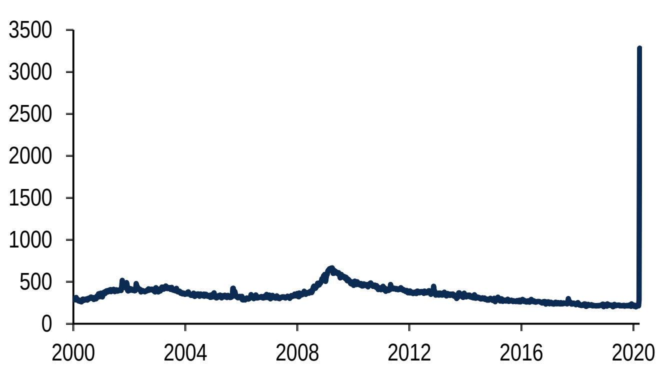
Inflation

- With the economy set for an extreme downturn, inflation pressures should ease. As such, we expect core PCE to end the year lower at 1.2% yoy.

Federal Reserve

- The Fed has been aggressive in providing policy accommodation and creating emergency lending facilities to support financial markets and the broader economy. The Fed will expand the toolkit as needed.

Chart 13: Initial jobless claims are off the charts



Source: Department of Labor

- Initial jobless claims spiked to 3.3mn in the week ending March 21st, well above the previous record high of 695k in 1982. This speaks to the unusual nature of this downturn—the abrupt plunge into a recession.
- The numbers could remain elevated as unemployment insurance offices are reportedly working through a backlog of applications preventing workers from applying.
- That said, the March jobs report is likely to be spared given that the survey period (the pay period/week including the 12th) mostly covers the days prior to the country taking drastic measures to stop the spread of the coronavirus.

Data in the past week

Data deck for Mar 24 – Mar 27

Date	Time	Indicator	Period	Actual	Consensus	Previous
03/24/20	9:45	IHS-Markit manufacturing PMI	Mar P	49.2	43.5	50.7
03/24/20	9:45	IHS-Markit services PMI	Mar P	39.1	42.0	49.4
03/24/20	10:00	New Home Sales	Feb	765k	750k	764k
03/25/20	7:00	MBA Mortgage Applications	Mar 20	-29%	--	-8%
03/25/20	8:30	Durable Goods Orders	Feb P	1.2%	-0.9%	-0.2%
03/25/20	8:30	Durables Ex Transportation	Feb P	-0.6%	-0.4%	0.8%
03/25/20	8:30	Core Capital Goods Orders	Feb P	-0.8%	-0.4%	1.1%
03/25/20	8:30	Core Capital Goods Shipments	Feb P	-0.7%	-0.2%	1.0%
03/26/20	8:30	Advance Goods Trade Balance	Feb	-$59.9b	-$63.4b	-$65.5b
03/26/20	8:30	Wholesale Inventories	Feb P	-0.5%	-0.2%	-0.4%
03/26/20	8:30	GDP (qoq saar)	4Q T	2.1%	2.1%	2.1%
03/26/20	8:30	Personal consumption (qoq saar)	4Q T	1.8%	1.7%	1.7%
03/26/20	8:30	GDP Price Index (qoq saar)	4Q T	1.3%	1.3%	1.3%
03/26/20	8:30	Core PCE (qoq saar)	4Q T	1.3%	1.2%	1.2%
03/26/20	8:30	Initial Jobless Claims	43911	3283k	1700k	281k
03/27/20	8:30	Personal Income	Feb	NR	0.4%	0.6%
03/27/20	8:30	Personal Spending	Feb	NR	0.2%	0.2%
03/27/20	8:30	PCE Headline Prices (mom)	Feb	NR	0.1%	0.1%
03/27/20	8:30	PCE Headline Prices (yoy)	Feb	NR	1.7%	1.7%
03/27/20	8:30	PCE Core Prices (mom)	Feb	NR	0.2%	0.1%
03/27/20	8:30	PCE Core Prices (yoy)	Feb	NR	1.7%	1.6%
03/27/20	10:00	U. of Michigan Sentiment	Mar F	NR	90.0	95.9

*NR: Not released.
Source: Bloomberg

Initial jobless claims breaking records

Initial jobless claims spiked 3.283mn in the week ending March 21st, shattering the previous high of 695k in the week ending October 2, 1982. The claims numbers show the severity of the current downturn and the speed of it. It also speaks to the unusual nature of this recession—the abrupt plunge into a recession compared to prior recessions when the shock took time to reverberate through the economy.

The numbers could remain elevated as there have been reports of unemployment insurance offices working through a backlog of applications and workers unable to apply for unemployment benefits due to sudden surge in claims. This suggest that we could continue to see very high numbers over the next week before it settles back to more normal levels.

IHS-Markit PMIs weakened on the back of COVID-19 outbreak

Advance March PMIs came in mixed. The manufacturing PMI declined to 49.2 from 50.7, better than consensus expectations at 43.5. This is the lowest reading since August 2009. New orders fell to 46.8 from 50.4 pointing to further declines in near-term activity. Meanwhile, services fell to 39.1 from 49.4, well below consensus expectations at 49.4. This is in line with data we got out of Europe. The services sector in both the US and Euro Area is being shocked sharply by the COVID-19 outbreak.

One thing to note on the relatively strong manufacturing PMI reading is that part of the better than expected result owes in part to a sharp drop in the supplier deliveries index. Slower supplier deliveries are treated as a positive in the composite Markit manufacturing index and therefore boosted the headline reading this month. However, in this case, it's likely a sign of supply chain disruptions and not stronger demand. So the headline manufacturing PMI is a bit misleading and should be taken with a grain of salt as activity was likely a bit weaker than indicated.

Capital goods orders reverse in February

Durable goods orders advanced by 1.2% mom in February owing primarily to an increase in transportation equipment orders. However, orders excluding transportation contracted by 0.6% mom reversing direction after increasing by 0.6% mom (0.8% mom initially) in January. Orders of primary metals, fabricated metal products, and other durable goods fell on the month. Meanwhile orders for machinery, computers and electronic products, and electrical equipment, appliances and components rose. Similarly, core capital goods orders declined by 0.8% after posting an increase of 1.0% in January, and core capital goods shipments decreased by 0.7% following January's 1.1% increase.

We think it's unlikely that this data was materially affected by the COVID-19 outbreak and the associated containment efforts as it reflects February data. That means that data in March is likely to also come in weak as several industries have reportedly shut down production in response to the COVID-19 pandemic.

MBA mortgage applications fall by most since 2009

For the week ending March 20, MBA mortgage applications fell by 29.4% the most since 2009 and a steep deceleration from the -8.4% decline in the prior week. It appears that the housing sector is starting to be affected by the COVID-19 outbreak and the efforts to contain the spread. Looking at the details of the report, purchase applications dropped by 14.6% over the week signaling weaker home sales data, and refinancing collapsed by 33.8%.

New home sales

New home sales came in at 765k in February, which was slightly better than expectations of 750k. There were also net positive revisions of 60k. That said, this is before the containment efforts against the virus so the data are surely to weaken in coming reports.

Advance goods trade deficit narrowed as imports fell

The advance goods deficit narrowed to -$59.9bn in February from -$65.9bn in the prior month. Imports dropped by 2.6% mom while exports picked up 0.5% mom. For imports, industrial supplies declined by 4.1% and capital goods plunged 7.0%. Falling imports should partly reflect the disruption of the COVID-19 outbreak in China which saw sharp declines in trade. We expect trade flows to continue weakening in the near term as the virus has spread rapidly across the world, leading to lockdowns and slowing in economic activity.

4Q GDP unrevised

4Q GDP in 2019 was unrevised at 2.1% qoq saar in the final release, in line with expectations. Core PCE was bumped to 1.3% from 1.2%, suggesting modest upward revisions in the % yoy rate.

Data in the week ahead

Monday, March 30

Data deck for Mar 30

Date	Time	Indicator	Period	BofA Estimate	Consensus	Previous
3/30/20	10:00	Pending Home Sales	Feb	-3.5%	-2.5%	5.2%

Source: BofA Global Research, Bloomberg

Pending home sales

We expect pending home sales to drop by 3.5% mom in February after surging 5.2% in the prior month, taking signal from falling mortgage purchase applications during the month. This could reflect some of the impact of the COVID-19 pandemic. We expect more pain to come in March and April, as shutdowns across many cities and states in the US likely reduced foot traffic and therefore housing demand. Adding to that headwind, mortgage rates and jobless claims spiked in March, which will dampen buying interest.

Tuesday, March 31

Data deck for Mar 31

Date	Time	Indicator	Period	BofA Estimate	Consensus	Previous
3/31/20	9:45	Chicago Purchasing Managers	Mar	40.0	44.0	49.0
3/31/20	10:00	Consumer Confidence	Mar	110	118.0	130.7
3/31/20	9:00	Case-Shiller HPI (yoy)	Jan	3.9%	—	3.8%

Source: BofA Global Research, Bloomberg

Chicago Purchasing Managers index

March Chicago PMI should drop by 9.0pts to 40.0, which would be the lowest reading since July 2001. This would be a similar sized drop to what we saw in the ISM-adjusted Empire State and Philadelphia Fed manufacturing indexes, as the COVID-19 pandemic, and its associated containment measures have resulted in depressed regional activity.

Conference Board consumer confidence

We look for Conference Board confidence to drop noticeably to 110 in March from 130.7 in February. Note that the survey period cutoff for the preliminary reading is around the 18th of each month and hence only captured part of the coronavirus-related shutdowns for March. As a result, we believe confidence will likely get revised even lower during the next release and April will see a further plunge.

Case-Shiller home price index

We look for the national S&P CoreLogic Case-Shiller home price index to accelerate to 3.9% yoy in January from 3.8% in December. Note this is a lagged indicator, and the strong momentum of home appreciation is unlikely to continue owing to disruptions from the COVID-19 outbreak.

Wednesday, April 1

Data deck for Apr 1

Date	Time	Indicator	Period	BofA Estimate	Consensus	Previous
4/01/20	7:00	MBA Mortgage Applications	Mar 27	—	—	-29.4%
4/01/20	10:00	Construction Spending (mom)	Feb	1.0%	0.5%	1.8%
4/01/20	10:00	ISM Manufacturing	Mar	46.0	46.0	50.1
4/01/20	8:15	ADP Employment	Mar	-75k	-100k	183k
4/01/20	9:45	IHS-Markit manufacturing PMI	Mar F	—	—	49.2
4/01/20	All day	Total Vehicle Sales	Mar	12.0M	15.4M	16.8M

Source: BofA Global Research, Bloomberg

ADP employment

We look for ADP private employment to contract by 75k in March following an increase of 183k in February. The jobs numbers for March are unlikely to capture the full impact of the outbreak as the survey period (the pay period containing the 12th) covers the period before many states implemented strict containment measures. That said, we think industries that have been disproportionately hurt by the outbreak such as transportation and leisure & hospitality will have halted hiring and in some cases reduced payrolls during that period, leading to an overall net job loss in March.

Note that our forecast for ADP employment shows a bigger contraction than BLS private payrolls because ADP estimates are based on models that use initial claims, consumer sentiment, and oil prices which are all likely to contribute negatively to the final number. Also, keep a close eye on the ADP's employment data by company size and industry as it can give some insights as to how the outbreak is impacting different companies.

ISM manufacturing survey

We look for ISM manufacturing in March to drop to 46.0 from 50.1 in February owing primarily to the COVID-19 pandemic and the associated efforts to contain its spread. This would be the lowest reading since May 2009. We take signal from sizeable declines in many of the regional manufacturing surveys (Empire State, Philadelphia Fed and Kansas City Fed). Moreover, it is likely that the index weakens further in April as the first half of March was largely unaffected by containment efforts.

In terms of the components, we expect new orders, employment, production and inventories indexes to decline over the month. Production has been shuttered or slowed at many manufacturing firms, including auto manufacturers and Boeing, in response to the COVID-19 outbreak. Moreover, firms are likely facing shortfalls in intermediate inputs due to lockdowns in other region, which means firms were likely drawing down on their existing inventories. Similarly, new orders are likely to have declined substantially as the containment efforts have likely resulted in weaker demand for many items, particularly durable goods.

In turn, uncertainty over the virus and weaker new orders and production likely resulted in many firms putting hiring decisions on hold. Therefore, the employment index should also decline. On the other hand, the supplier deliveries index should increase (slower deliveries) due to disruptions associated from domestic and overseas containment efforts. This may artificially boost the headline measure, as slower supplier deliveries are taken to be a positive in the composite. However, in this situation slower supplier deliveries are not indicating stronger demand but instead are indicative of supply shortages.

Construction spending

We expect construction spending in February to increase by 1.0% mom following the 1.8% mom increase in January. This is largely due to the strength in housing starts, which have averaged 2.6% mom over the last six months. However, this data will be stale as it reflects February activity, which was before most measures were put in place to flatten the COVID-19 cases curve. We should see private construction spending slow in the coming reports for March and April reflecting both COVID-19 measures and the collapse in energy prices.

Total vehicle sales

We estimate that US light vehicle sales in March will decline by roughly 30% yoy to around 12mn saar. Specifically, with the effects of quarantining and social distancing, we find it unlikely that consumers are in the market to purchase a new vehicle, and believe we could see 50%+ yoy declines in sales over the next few months. That said, the situation around the coronavirus, including the pace at which it spreads, and how governments handle the pandemic, remains very much in flux, which makes estimating the economic implications from quarantines, production stoppages, supply chain disruptions, and demand impairment very difficult to quantify.

Thursday, April 2

Data deck for Apr 2

Date	Time	Indicator	Period	BofA Estimate	Consensus	Previous
4/02/20	10:00	Durable Goods Orders	Feb F	—	—	1.2%
4/02/20	10:00	Durables Ex Transportation	Feb F	—	—	-0.6%
4/02/20	10:00	Core Capital Goods Orders	Feb F	—	—	-0.8%
4/02/20	10:00	Core Capital Goods Shipments	Feb F	—	—	-0.7%
4/02/20	10:00	Factory Orders	Feb	—	—	-0.5%
4/02/20	8:30	Initial Jobless Claims	Mar 28	2500k	—	3283k
4/02/20	8:30	Trade Balance	Feb	-$39.1b	-$43.3b	-$45.3b

Source: BofA Global Research, Bloomberg

Initial jobless claims

We expect 2.5mn initial jobless claims in the week ending March 28 following a record-shattering 3.3mn in the prior week. Initial claims have surged due to the abrupt shutdown in activity across the country in an effort to contain the COVID-19 outbreak. But with more states and local municipalities placing "stay-at-home" orders, we expect more workers to apply for unemployment benefits as businesses shutter their doors. Additionally, we suspect that there are many states with a backlog of applications that will be processed in coming weeks which will further add to the unemployment insurance rolls.

Trade balance

We look for the trade deficit to narrow sharply to $39.1bn in February from $45.4bn. The goods trade deficit likely improved by $6bn to $60.9bn as revealed in the advance economic indicators report. For the services trade balance, we expect a surplus of $20.8bn based on our expectation for trend-like growth in services imports and exports.

Friday, April 3

Data deck for Apr 3

Date	Time	Indicator	Period	BofA Estimate	Consensus	Previous
4/03/20	10:00	ISM Non-Manufacturing	Mar	45.0	48.1	57.3
4/03/20	8:30	Change in Nonfarm Payrolls	Mar	-25k	-81k	273k
4/03/20	8:30	Private Payrolls	Mar	-25k	-123k	228k
4/03/20	8:30	Unemployment Rate	Mar	3.7%	3.8%	3.5%
4/03/20	8:30	Average Hourly Earnings mom	Mar	0.4%	0.2%	0.3%
4/03/20	8:30	Average Weekly Hours	Mar	34.1	34.2	34.4
4/03/20	9:45	IHS-Markit services PMI	Mar F	—	—	39.1

Source: BofA Global Research, Bloomberg

Job market report

This week's initial jobless claims report suggests the toll of the COVID-19 outbreak on the job market will be large and far reaching. That said, we think the March job report is likely to be spared given that the survey period (the pay period/week including the 12th) mostly covers the days prior to the country taking drastic measures to stop the spread of the coronavirus.

Consequently, we expect nonfarm payrolls to only decline by 25k in March following an impressive gain of 273k in the prior month and the unemployment rate to tick up to 3.7% from 3.5. Our forecasts reflects a slowdown in hiring across all industries amid the outbreak and job cuts in the transportation and leisure and hospitality sectors in response to plunging demand. Data on the labor market outside of the claims data have been mixed for March. To the upside, our private payrolls tracker is looking for a 105k increase in March, though our tracker may not be fully capturing the impact of the outbreak as the BAC data have a degree of selection bias, including but not limited to income levels and geographies. In contrast, employment indicators within regional survey measures such as the Philly Fed and Empire State surveys show hiring activity slowing meaningfully in March.

Elsewhere, we expect a more severe drop in average weekly hours worked to 34.1hr from 34.4hr as businesses were more aggressive in cutting hours. Less working hours should bias wage growth, pushing average hourly earnings up to 0.4% mom or 3.2% yoy.

Looking ahead, the April report should better reflect the severity of the recession, though the exact numbers are hard to pin down. Initial jobless claims could potentially be biased as eligibility rules have been relaxed or waived and some states allow workers who had their hours reduced to claim unemployment benefits. Also some workers could be counted as employed if they are being paid but not at work. There is also the question of whether the BLS can capture the degree of firings given sampling challenges - businesses that have closed won't be responding to the survey. In that context, keep an eye on the ADP employment report to see if small businesses see a big drop in payrolls.

Along with the claims number, the high frequency data on the consumer and other survey measures we have been tracking suggests that the disruption to the economy has been drastic and acute. As such, we think we could see between 4 and 6 million jobs lost and the unemployment rate could reach around 7% by April. Meanwhile other labor market slack measures such as the underemployment rate could easily reach double digits. And job loss will likely continue beyond April, pushing the unemployment rate higher.

Upcoming policy speakers

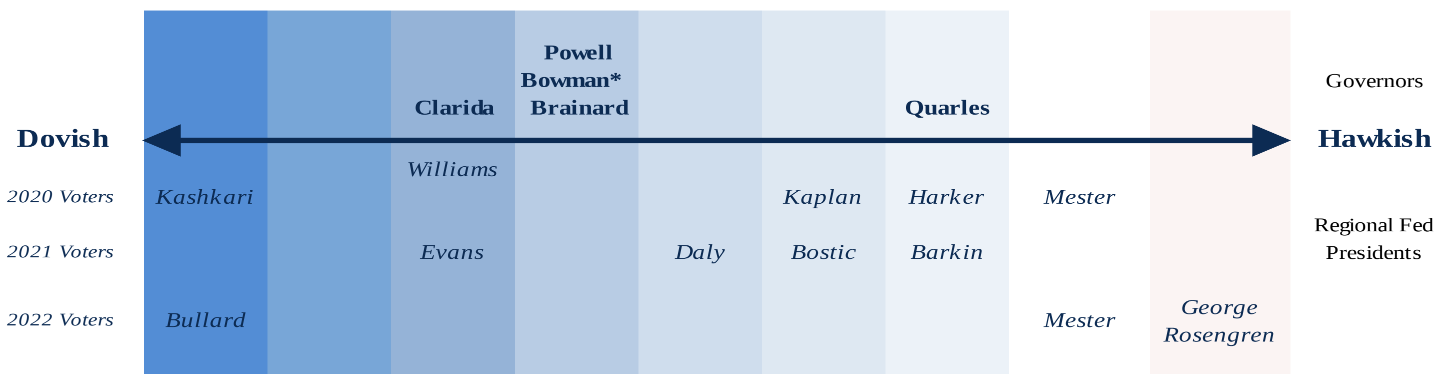
Key speaking engagements and news events*

Monday, March 30	*No events scheduled at this time*
Tuesday, March 31	*No events scheduled at this time*
Wednesday, April 1	*No events scheduled at this time*
Thursday, April 2	*No events scheduled at this time*
Friday, April 3	*No events scheduled at this time*

*All listed times are Eastern times. Dates and times are subject to change.
Source: BofA Global Research, Bloomberg

FOMC dove-hawk spectrum

Chart 14: FOMC dove-hawk spectrum



Note(s): NY Fed President (Williams) is always a voter.
* There is limited information on Bowman's monetary policy views. For now, we assume she will vote with the core of the committee.
Source: BofA Global Research

Economic forecast summary

Real Economic Activity, % SAAR	2Q 18	3Q 18	4Q 18	1Q 19	2Q 19	3Q 19	4Q 19	1Q 20	2Q 20	3Q 20	4Q 20	2018	2019	2020	2021
Real GDP	3.5	2.9	1.1	3.1	2.0	2.1	2.1	0.5	-12.0	3.0	4.0	2.9	2.3	-0.8	1.9
% Change, Year Ago	3.2	3.1	2.5	2.7	2.3	2.1	2.3	1.7	-2.0	-1.8	-1.3				
Final Sales	4.8	0.8	1.0	2.6	2.9	2.1	3.1	1.1	-11.3	2.7	3.0	2.8	2.2	-0.4	1.6
Domestic Demand	4.0	2.8	1.3	1.8	3.6	2.3	1.6	1.0	-11.8	3.1	3.8	3.0	2.3	-0.7	1.9
Consumer Spending	4.0	3.5	1.4	1.1	4.6	3.1	1.8	0.5	-12.9	3.0	3.5	3.0	2.6	-0.9	1.7
Residential Investment	-3.7	-4.0	-4.6	-1.1	-2.9	4.6	6.5	10.0	-10.0	4.0	6.0	-1.5	-1.5	2.9	3.4
Nonresidential Investment	7.9	2.1	4.8	4.4	-1.0	-2.3	-2.5	-0.5	-16.3	3.2	5.2	6.4	2.1	-3.5	2.1
Structures	11.0	-2.1	-9.0	4.0	-11.1	-9.9	-7.3	-5.0	-25.0	0.0	2.0	4.1	-4.3	-9.5	-0.6
Equipment	3.4	2.9	7.4	-0.1	0.8	-3.8	-4.2	-2.0	-20.0	4.0	6.0	6.8	1.3	-4.9	1.9
Intellectual Property	11.9	4.1	11.7	10.9	3.6	4.6	2.8	4.0	-6.0	4.0	6.0	7.4	7.5	2.0	3.7
Government	2.6	2.1	-0.4	2.9	4.8	1.7	2.5	2.0	0.0	2.5	3.0	1.7	2.3	2.0	2.0
Exports	5.8	-6.2	1.5	4.2	-5.7	0.9	2.1	-3.0	-8.0	3.0	5.0	3.0	0.0	-1.5	2.3
Imports	0.3	8.6	3.5	-1.5	0.0	1.8	-8.4	-3.0	-10.0	5.0	10.0	4.4	1.0	-2.9	4.2
Net Exports (Bil 12$)	-851	-962	-983	-944	-981	-990	-901	-894	-857	-879	-929	-920	-954	-890	-974
Contribution to growth (ppts)	0.7	-2.1	-0.4	0.7	-0.7	-0.2	1.5	0.1	0.5	-0.3	-0.8	-0.3	-0.1	0.2	-0.3
Inventory Accumulation (Bil 12$)	-28.0	87.2	93.0	116.0	69.4	69.4	13.1	-14.9	-74.9	-59.9	-9.9	48.2	67.0	-39.9	20.1
Contribution to growth (ppts)	-1.2	2.1	0.1	0.5	-0.9	0.0	-1.0	-0.5	-1.1	0.3	0.9	0.1	0.1	-0.5	0.3
Nominal GDP (Bil $, SAAR)	20510	20750	20898	21099	21340	21543	21729	21836	21125	21397	21690	20580	21428	21512	22292
% SAAR	7.1	4.8	2.9	3.9	4.7	3.8	3.5	2.0	-12.4	5.2	5.6	5.4	4.1	0.4	3.6
Key Indicators															
Industrial Production (% SAAR)	4.6	5.2	3.9	-1.9	-2.3	1.1	0.2	-1.7	-15.3	3.1	3.6	3.9	0.9	-2.8	1.4
Capacity Utilization (%)	78.5	79.1	79.5	78.6	77.8	77.5	77.2	76.7	74.9	75.3	75.7	78.7	77.8	75.6	76.3
Nonfarm Payrolls (Avg mom change, 000s)	211	153	172	139	159	203	210	174	-2500	40	100	193	178	-547	156
Civilian Unemployment Rate (%)	3.9	3.8	3.8	3.9	3.6	3.6	3.5	3.6	8.6	9.1	8.9	3.9	3.7	7.5	8.6
Civilian Participation Rate (%)	62.9	62.8	62.9	63.1	62.9	63.1	63.2	63.4	63.4	63.4	63.3	62.9	63.1	63.4	63.2
Productivity (% SAAR)	2.0	1.6	0.5	3.8	2.6	-0.3	1.2	0.4	-2.0	0.5	2.5	1.4	1.9	0.3	1.1
Personal Savings Rate (%)	7.6	7.5	7.8	8.5	7.9	7.6	7.7	8.4	10.3	8.7	8.1	7.7	7.9	8.9	8.6
Light Vehicle Sales (Millions SAAR)	17.3	17.0	17.4	16.8	17.0	17.0	16.7	15.3	9.3	12.0	14.7	17.2	16.9	12.8	15.0
Housing Starts (Thous. SAAR)	1260	1233	1185	1213	1256	1282	1449	1399	1281	1291	1307	1250	1300	1320	1380
Current Account (% of GDP)												-2.4	-2.4	-2.3	-2.3
US Budget Balance ($bn, Fiscal Year)												-779	-984	-2000	-2200
Inflation															
GDP Price Index (% SAAR)	3.2	2.0	1.6	1.1	2.4	1.8	1.3	1.4	-0.1	2.2	1.6	2.4	1.8	1.3	1.7
% Change, Year Ago	2.6	2.5	2.3	2.0	1.8	1.7	1.6	1.7	1.1	1.2	1.3				
PCE Chain Prices (% SAAR)	2.2	1.6	1.3	0.4	2.4	1.5	1.3	1.2	-1.0	2.3	1.5	2.1	1.4	1.1	1.7
% Change, Year Ago	2.3	2.2	1.9	1.4	1.4	1.4	1.4	1.6	0.7	0.9	1.0				
Core PCE Chain Prices (% SAAR)	2.1	1.6	1.7	1.1	1.9	2.1	1.2	1.6	0.8	1.3	1.3	1.9	1.6	1.4	1.5
% Change, Year Ago	2.0	2.0	1.9	1.6	1.6	1.7	1.6	1.7	1.4	1.2	1.2				
CPI, Consumer Prices (% SAAR)	2.1	2.0	1.3	0.9	3.0	1.8	2.4	1.4	-1.8	3.7	2.0	2.4	1.8	1.4	2.2
% Change, Year Ago	2.7	2.6	2.2	1.6	1.8	1.8	2.0	2.2	0.9	1.4	1.3				
CPI ex Food & Energy (% SAAR)	1.9	2.0	2.0	2.2	2.2	2.8	2.0	2.3	1.7	1.7	1.7	2.1	2.2	2.1	1.9
% Change, Year Ago	2.2	2.2	2.2	2.1	2.1	2.3	2.3	2.3	2.2	1.9	1.9				

Shaded regions represent BofA US Economics Research forecast

Source: BofA US Economics Research

Global economic forecast summary

	GDP growth, %				CPI inflation, %				Short-term interest rates, %			
	2018	2019F	2020F	2021F	2018	2019	2020F	2021F	Current	2019	2020F	2021F
Global	3.8	3.1	0.3	4.2	3.2	3.1	2.6	2.5	2.65	3.1	2.22	2.35
US	2.9	2.3	-0.8	1.9	2.4	1.8	1.2	1.9	0.13	1.6	0.13	0.63
Global ex US	3.9	3.3	0.6	4.6	3.4	3.3	2.9	2.8	3.18	3.5	2.64	2.69
Euro Area	1.9	1.2	-1.7	1.9	1.8	1.2	0.7	1.0	-0.50	-0.5	-0.50	-0.50
UK	1.4	1.4	-2.0	2.2	2.5	1.8	1.1	1.5	0.10	0.8	0.10	0.10
Japan	0.8	0.7	-2.6	3.3	1.0	0.5	-0.1	0.4	-0.10	-0.1	-0.10	-0.10
Canada	1.9	1.6	-1.5	1.0	2.2	2.0	2.1	2.6	0.75	1.8	0.25	0.25
Emerging EMEA	2.9	2.1	0.7	2.3	7.3	6.4	4.7	4.6	5.77	6.9	4.98	4.88
Latin America	1.6	0.8	-1.5	2.8	6.6	8.2	7.5	6.7	4.34	5.0	3.87	4.26
Brazil	1.1	1.1	-0.5	2.5	3.7	3.7	3.6	3.6	3.75	4.5	3.50	4.50
Emerging Asia	6.0	5.3	2.1	6.9	2.4	2.7	2.7	2.1	4.13	4.1	3.34	3.36
China	6.6	6.1	1.5	8.5	2.1	2.9	2.5	1.1	4.35	4.2	3.15	3.15

Shaded regions represent BofA Global Economics Research forecast.
Source: BofA Global Economics Research

Interest rate forecast summary

(% EOP)	1Q18	2Q18	3Q18	4Q18	1Q19	2Q19	3Q19	4Q19	1Q20	2Q20	3Q20	4Q20	2017	2018	2019	2020
Fed Funds	1.50-1.75	1.75-2.00	2.00-2.25	2.25-2.50	2.25-2.50	2.25-2.50	1.75-2.00	1.50-1.75	0.00-0.25	0.00-0.25	0.00-0.25	0.00-0.25	1.25-1.50	2.25-2.50	1.50-1.75	0.00-0.25
Fed effective	1.67	1.91	2.18	2.40	2.43	2.40	1.90	1.55	0.13	0.13	0.13	0.13	1.33	2.40	1.55	0.13
3-Month LIBOR	2.31	2.34	2.40	2.81	2.60	2.32	2.09	1.91	0.60	0.50	0.40	0.35	1.69	2.81	1.91	0.35
2-Year T-Note	2.27	2.53	2.82	2.49	2.26	1.75	1.62	1.57	0.35	0.40	0.55	0.60	1.88	2.49	1.57	0.60
5-Year T-Note	2.56	2.74	2.95	2.51	2.23	1.77	1.54	1.69	0.50	0.60	0.80	1.00	2.21	2.51	1.69	1.00
10-Year T-Note	2.74	2.86	3.06	2.68	2.41	2.01	1.66	1.92	0.75	0.85	1.05	1.25	2.41	2.68	1.92	1.25
30-Year T-Bond	2.97	2.99	3.21	3.01	2.81	2.53	2.11	2.39	1.30	1.40	1.65	1.90	2.74	3.01	2.39	1.90
2-Year swap	2.58	2.79	2.99	2.66	2.38	1.81	1.63	1.70	0.41	0.50	0.70	0.75	2.08	2.66	1.70	0.75
5-year swap	2.71	2.89	3.07	2.57	2.29	1.77	1.50	1.73	0.52	0.65	0.87	1.07	2.24	2.57	1.73	1.07
10-year swap	2.79	2.93	3.12	2.71	2.41	1.96	1.56	1.90	0.63	0.70	0.87	1.07	2.40	2.71	1.90	1.07
30-year swap	2.82	2.93	3.13	2.84	2.58	2.21	1.71	2.09	0.59	0.65	0.85	1.10	2.54	2.84	2.09	1.10

Source: BofA US Rates Research
Note: Federal funds rate forecasts are modal expectations; other values are for market rates. Shaded regions represent BofA US Rates Research forecast.

FX rate forecast summary

	Spot	20-Mar	20-Jun	20-Sep	20-Dec	21-Mar	21-Jun	21-Sep	21-Dec
G3									
EUR-USD	1.10	1.08	1.02	1.02	1.05	1.08	1.10	1.12	1.15
USD-JPY	109	110	105	102	103	103	103	103	103
EUR-JPY	121	119	107	104	108	111	113	115	118
Dollar Bloc									
USD-CAD	1.40	1.32	1.50	1.55	1.50	1.50	1.50	1.50	1.50
AUD-USD	0.60	0.66	0.56	0.58	0.62	0.66	0.66	0.68	0.70
NZD-USD	0.59	0.63	0.54	0.56	0.60	0.64	0.64	0.66	0.67
Europe									
EUR-GBP	0.91	0.84	0.88	0.88	0.87	0.87	0.87	0.88	0.88
GBP-USD	1.22	1.29	1.16	1.16	1.21	1.24	1.26	1.27	1.31
EUR-CHF	1.06	1.07	1.06	1.07	1.08	1.08	1.09	1.10	1.11
USD-CHF	0.96	0.99	1.04	1.05	1.03	1.00	0.99	0.98	0.97
EUR-SEK	11.00	10.60	11.80	11.50	11.20	11.00	10.80	10.60	10.50
USD-SEK	9.97	9.81	11.57	11.27	10.67	10.19	9.82	9.46	9.13
EUR-NOK	11.49	9.90	13.00	11.50	11.20	11.00	10.80	10.60	10.50
USD-NOK	10.42	9.17	12.75	11.27	10.67	10.19	9.82	9.46	9.13

Source: BofA Global FX Rates & Commodities Research
Note: Spot exchange rate as of day before publishing. The left of the currency pair is the denominator of the exchange rate. Forecasts for end of period.

Monthly CPI forecast update

	Non-seasonally Adjusted						Seasonally Adjusted			
	Total CPI			Energy			Total CPI		Core CPI	
	Level	mom	yoy	Level	mom	yoy	mom	yoy	mom	yoy
2018: Jul	252.01	0.01	2.9	227.11	-0.89	12.1	0.12	2.9	0.19	2.3
2018: Aug	252.15	0.06	2.7	226.94	-0.07	10.2	0.17	2.7	0.06	2.2
2018: Sep	252.44	0.12	2.3	226.17	-0.34	4.8	0.14	2.4	0.21	2.3
2018: Oct	252.89	0.18	2.5	225.76	-0.18	8.9	0.20	2.5	0.15	2.2
2018: Nov	252.04	-0.33	2.2	215.91	-4.36	3.1	-0.05	2.2	0.19	2.2
2018: Dec	251.23	-0.32	1.9	205.91	-4.63	-0.3	0.00	1.9	0.19	2.2
2019: Jan	251.71	0.19	1.6	200.56	-2.59	-4.8	-0.04	1.5	0.22	2.1
2019: Feb	252.78	0.42	1.5	202.74	1.09	-5.0	0.25	1.5	0.13	2.1
2019: Mar	254.20	0.56	1.9	211.72	4.43	-0.4	0.36	1.9	0.16	2.0
2019: Apr	255.55	0.53	2.0	222.50	5.09	1.7	0.33	2.0	0.20	2.1
2019: May	256.09	0.21	1.8	225.77	1.47	-0.5	0.09	1.8	0.14	2.0
2019: Jun	256.14	0.02	1.6	221.37	-1.95	-3.4	0.09	1.7	0.28	2.1
2019: Jul	256.57	0.17	1.8	222.49	0.51	-2.0	0.27	1.8	0.25	2.2
2019: Aug	256.56	-0.01	1.7	216.98	-2.48	-4.4	0.08	1.7	0.22	2.4
2019: Sep	256.76	0.08	1.7	215.42	-0.72	-4.8	0.12	1.7	0.19	2.3
2019: Oct	257.35	0.23	1.8	216.35	0.43	-4.2	0.25	1.8	0.12	2.3
2019: Nov	257.21	-0.05	2.1	214.64	-0.79	-0.6	0.23	2.0	0.19	2.3
2019: Dec	256.97	-0.09	2.3	212.98	-0.77	3.4	0.24	2.3	0.12	2.2
2020: Jan	257.97	0.39	2.5	213.04	0.03	6.2	0.15	2.5	0.24	2.3
2020: Feb	258.68	0.27	2.3	208.35	-2.20	2.8	0.09	2.3	0.22	2.4
2020: Mar	258.49	-0.07	1.7	199.60	-4.20	-5.7	-0.27	1.7	0.11	2.3
2020: Apr	257.13	-0.53	0.6	181.16	-9.24	-18.6	-0.69	0.6	0.13	2.2
2020: May	258.28	0.45	0.9	190.27	5.03	-15.7	0.33	0.9	0.15	2.3
2020: Jun	259.35	0.42	1.3	199.34	4.77	-10.0	0.48	1.3	0.15	2.1
2020: Jul	259.63	0.11	1.2	201.28	0.97	-9.5	0.22	1.2	0.13	2.0
2020: Aug	260.41	0.30	1.5	205.60	2.15	-5.2	0.38	1.5	0.16	1.9
2020: Sep	260.51	0.04	1.5	204.44	-0.57	-5.1	0.07	1.5	0.13	1.9
2020: Oct	260.73	0.08	1.3	201.73	-1.32	-6.8	0.10	1.3	0.13	1.9
2020: Nov	260.57	-0.06	1.3	200.82	-0.45	-6.4	0.21	1.3	0.14	1.8
2020: Dec	260.31	-0.10	1.3	198.63	-1.09	-6.7	0.21	1.3	0.16	1.9

NSA: Not seasonally adjusted, SA: seasonally adjusted. MoM is monthly percent change; YoY is year-over-year percent change. Shaded regions represent BofA US Rates Research forecast.
Source: BofA Global Research

Rolling calendar of business indicators

Monday	Tuesday	Wednesday	Thursday	Friday
Mar 30 10:00 am: Pending Home Sales - Feb Feb: -3.5%* Jan: 5.2% Dec: -4.3% 10:30 am: Dallas Fed - Mar Feb: 1.2 Jan: -0.2	**Mar 31** 9:00 am: Case-Shiller HPI yoy - Jan Jan: 3.9%* Dec: 3.8% Nov: 3.5% 9:45 am: Chicago PMI - Mar Mar: 40* Feb: 49.0 Jan: 42.9 10:00 am: Consumer Confidence - Mar Mar: 110* Feb: 130.7 Jan: 130.4	**Apr 1** 7:00 am: MBA Mortgage Applications - (week ending 3/27/2020) 8:15 am: ADP Employment - Mar Mar: -75k* Feb: 183k Jan: 209k 10:00 am: Construction Spending - Feb Feb: 1.0%* Jan: 1.8% Dec: 0.2% 10:00 am: ISM Manufacturing - Mar Mar: 46.0* Feb: 50.1 Jan: 50.9 NA: Total Vehicle Sales - Mar Mar: 12.0M* Feb: 16.8M Jan: 16.8M	**Apr 2** 8:30 am: Initial Jobless Claims - (week ending 3/28/2020) 8:30 am: Trade Balance - Feb Feb: -$39.1b* Jan: -$45.3b Dec: -$48.6b 10:00 am: Durable Goods Orders - Feb(F) Feb(P): 1.2% Jan: 0.1% 10:00 am: Factory Orders - Feb Feb: —* Jan: -0.5% Dec: 1.9%	**Apr 3** 8:30 am: Nonfarm Payrolls - Mar Mar: -25k* Feb: 273k Jan: 273k 8:30 am: Private Payrolls - Mar Mar: -25k* Feb: 228k Jan: 222k 8:30 am: Unemployment Rate - Mar Mar: 3.7%* Feb: 3.5% Jan: 3.6% 8:30 am: Avg. Hourly Earnings - Mar Mar: 0.4%* Feb: 0.3% Jan: 0.2% 8:30 am: Avg. Weekly Hours - Mar Mar: 34.1* Feb: 34.4 Jan: 34.3 10:00 am: ISM Non-Manufacturing - Mar Mar: 45.0* Feb: 57.3 Jan: 55.5
Apr 6 0	**Apr 7** 10:00 am: JOLTS Job Openings - Feb Jan: 6,963k Dec: 6,552k 3:00 pm: Consumer Credit - Feb Jan: $12.0b Dec: $20.3b	**Apr 8** 7:00 am: MBA Mortgage Applications - (week ending 4/3/2020)	**Apr 9** 8:30 am: Initial Jobless Claims - (week ending 4/4/2020) 8:30 am: Producer Price Index - Mar Feb: -0.6% Jan: 0.5% 8:30 am: Core PPI - Mar Feb: -0.3% Jan: 0.5% 8:30 am: Core Core PPI - Mar Feb: -0.1% Jan: 0.4% 10:00 am: Wholesale Inventories - Feb(P) Jan: -0.5% Dec: -0.5%	**Apr 10** 8:30 am: Consumer Price Index - Mar Feb: 0.1% Jan: 0.1% 8:30 am: Core CPI - Mar Feb: 0.2% Jan: 0.2%
Apr 13 2:00 pm: Monthly Budget Statement - Mar Feb: -$235.3b Jan: -$32.6b	**Apr 14** 6:00 am: NFIB Small Business Optimism - Mar Feb: 104.5 Jan: 104.3 8:30 am: Import Price Index - Mar Feb: -0.5% Jan: 0.1%	**Apr 15** 7:00 am: MBA Mortgage Applications - (week ending 4/10/2020) 8:30 am: Retail Sales - Mar Feb: -0.5% Jan: 0.6% 8:30 am: Retail Sales ex. Autos - Mar Feb: -0.4% Jan: 0.6% 8:30 am: Core Control - Mar Feb: 0.0% Jan: 0.4% 8:30 am: Empire Manufacturing - Apr Mar: -21.5 Feb: 12.9 9:15 am: Industrial Production - Mar Feb: 0.6% Jan: -0.5% 9:15 am: Capacity Utilization - Mar Feb: 77.0% Jan: 76.6% 10:00 am: NAHB Housing Market Index - Apr Mar: 72 Feb: 74	**Apr 16** 8:30 am: Initial Jobless Claims - (week ending 4/11/2020) 8:30 am: Housing Starts - Mar Feb: 1,599k Jan: 1,624k 8:30 am: Building Permits - Mar Feb: 1,464k Jan: 1,550k 8:30 am: Philly Fed - Apr Mar: -12.7 Feb: 36.7	**Apr 17** 10:00 am: Leading Indicators - Mar Feb: 0.1% Jan: 0.7%

*Projections- subject to revision as additional data become available. P - preliminary reading , S - second reading, T - third reading, F - final reading

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