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Monetary Policy Outlook for 2019

Remarks by

Richard H. Clarida

Vice Chairman

Board of Governors of the Federal Reserve System

at the

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Happy New Year. I am very glad to be speaking to you here in New York, a city I lived and worked in for 30 years before joining the Federal Reserve Board in September. The new year is often a time when people make resolutions--resolutions to exercise more, learn a new skill, or spend more quality time with family and friends. My resolution, as a member of the Federal Open Market Committee (FOMC), is to work with my colleagues to implement a monetary policy that will sustain economic growth and maximum employment at levels consistent with our 2 percent inflation objective.¹

Initial Conditions and What I Am Looking for in 2019

As we begin 2019, the initial conditions for the real economy are favorable. Through the first three quarters of last year, gross domestic product growth averaged 3.2 percent. Private-sector forecasts as well as our Summary of Economic Projections indicate that, when the data for the fourth quarter are released, they will show the economy likely grew at 3 percent or perhaps a little faster in 2018 for the year as a whole. If so, economic growth in 2018 would be the fastest annual growth rate recorded in 13 years. In terms of the economic outlook, ongoing momentum heading into this year indicates that that above-trend growth is likely to continue in 2019. If the economy continues to grow in 2019 along the lines that I expect, in July the current expansion will become the longest in recorded U.S. history.

The labor market remains healthy, with an unemployment rate near the lowest level recorded in 50 years and with average monthly job gains continuing to outpace the increases needed over the longer run to provide employment for new entrants to the labor

¹ The views expressed are my own and not necessarily those of other Federal Reserve Board members or FOMC participants. I would like to thank Brian Doyle, David Lebow, and Ellen Meade for their assistance in preparing these remarks.

force. Moreover, the declines in the unemployment rate have been widespread across racial and ethnic minority groups, though gaps for African Americans and Hispanics relative to whites remain sizable. At 3.9 percent, the overall unemployment rate is below the median of FOMC participants' estimates of its full employment level, u^* , of 4.4 percent. That said, the participants' median estimate of u^* has been falling for several years as strong employment gains have not triggered a worrying rise in price inflation.

In a welcome development, nominal wage growth is picking up, with most measures now running around 3 percent on an annual basis. And, for the past couple of years, wage gains have been notably faster for lower-income workers.² Aggregate wage gains are broadly in line with productivity growth and our 2 percent inflation objective, and they are consistent with a labor market that is operating in the vicinity of full employment. They are not, at present, a source of upward, cost-push pressure on price inflation.

With regard to labor supply, we have had a pickup in labor force participation among prime-age workers (those 25 to 54 years old) that is, at least for now, boosting the supply side of the economy. The participation rate of prime-age workers has risen about 1-1/2 percentage points over the past few years. And participation in the job market may

² Wage gains for workers with different wage levels can be calculated using data from the Current Population Survey from the Bureau of Labor Statistics. The Economic Policy Institute provides convenient tabulations of these data. For data through 2017, see Economic Policy Institute (2018), *State of Working America Data Library* (Washington: EPI, March), table ("Wages by Percentile"), <https://www.epi.org/data/#?subject=wage-percentiles>. For an update through the first half of 2018, see Elise Gould and Heidi Shierholz (2018), "Average Wage Growth Continues to Flatline in 2018, While Low-Wage Workers and Those with Relatively Lower Levels of Educational Attainment See Stronger Gains," Economic Policy Institute, *Working Economics Blog*, July 18, <https://www.epi.org/blog/average-wage-growth-continues-to-flatline-in-2018-while-low-wage-workers-and-those-with-relatively-lower-levels-of-educational-attainment-see-stronger-gains>.

still have some further room to rise, as the prime-age participation rate is still a couple of percentage points below the levels that prevailed in the late 1990s, when the labor market was last this strong.

Price stability, of course, is the other leg of our dual mandate, and PCE (personal consumption expenditures) inflation over the past 12 months has been running close to our 2 percent objective. That said, and notwithstanding strong economic growth and a low unemployment rate, inflation has surprised to the downside recently, and it is not yet clear that inflation has moved back to 2 percent on a sustainable basis.

Because expectations of future inflation are such an important determinant of actual inflation, central banks are as much in the business of anchoring inflation expectations as they are of managing actual inflation. Longer-run inflation expectations, based on straight readings of inflation compensation from TIPS (Treasury Inflation-Protected Securities), have drifted downward, although, when adjusted for term premiums and liquidity, they remain near 2 percent. The University of Michigan Surveys of Consumers' measure of expected inflation over the next 5 to 10 years has been broadly stable but has edged down over the past few years and is now at the very lower end of the range that has prevailed historically. Inflation expectations of professional forecasters have remained stable and consistent with our 2 percent objective.

At each future FOMC meeting, as I consider what, if any, adjustment to our policy stance is warranted to achieve and sustain our dual-mandate objectives, I will closely monitor the incoming data on inflation expectations as well as actual inflation, among the broad range of real and financial indicators that I consult. To me, it is

important that any future policy decisions we may consider in 2019 be consistent with *both* pillars of our dual mandate.

I will also be monitoring closely the incoming data on labor supply and productivity.³ Not only has aggregate demand growth been robust, but so, too, has been the growth in realized aggregate supply. Over the first three quarters of 2018, hours worked in the nonfarm business sector were up 2.0 percent (at an annual rate), and productivity was up 1.8 percent. Realized productivity growth over the past eight quarters has averaged 1.3 percent, which is up from the 0.7 percent average recorded between 2011 and 2016. Strong growth supported by supply-side gains in hours worked and productivity is not inflationary, as the experience of 2018 confirms. With labor supply and productivity growth in 2018 having surprised on the upside, some mean reversion in 2019 is not unreasonable to forecast. But right now, that is just a forecast, and if the positive developments on the supply side of the economy continue in 2019, they would need to be factored into the inflation outlook and thus the appropriate settings for monetary policy.

As I have indicated previously, I believe we may have seen the bottom on the productivity slowdown, but how much of the recent welcome uptick in productivity growth can be sustained or extended is hard to judge at this point. It will depend in part on how much business investment spending adds to the stock of capital in the economy. We saw a welcome pickup in investment in the first half of last year, but growth of

³ For an analysis of the effect of a positive boost to productivity in the FRB/US model, see Jean-Philippe Laforte (2018), "Overview of the Changes to the FRB/US Model (2018)," FEDS Notes (Washington: Board of Governors of the Federal Reserve System, December 7), fig. 4, <https://www.federalreserve.gov/econres/notes/feds-notes/overview-of-the-changes-to-the-frb-us-model-2018-20181207.htm>. In the model, higher productivity lowers inflation, which calls for a flatter path for policy normalization than would otherwise be the case.

capital spending slowed notably in the third quarter and the manufacturing indexes from the Institute for Supply Management have softened, though other data are consistent with a rebound in business spending in the fourth quarter. If a pickup in the growth of investment spending was realized and sustained, it would be expected to contribute to future productivity growth.

The December Decision and the Outlook for Monetary Policy in 2019

With a robust labor market and inflation running close to our 2 percent inflation objective, the Committee decided at its December meeting to raise the target range for the federal funds rate to 2-1/4 to 2-1/2 percent.⁴ That said, growth and growth prospects in other economies around the world have moderated somewhat in recent months, and overall financial conditions have tightened materially. These recent developments in the global economy and financial markets represent crosswinds to the U.S. economy. If these crosswinds are sustained, appropriate forward-looking monetary policy should respond to keep the economy as close as possible to our dual-mandate objectives of maximum employment and price stability.⁵ I will closely monitor the incoming data on

⁴ See Board of Governors of the Federal Reserve System (2018), “Federal Reserve Issues FOMC Statement,” press release, December 19, <https://www.federalreserve.gov/newsevents/pressreleases/monetary20181219a.htm>.

⁵ In the model of optimal monetary policy discussed in a paper by Clarida, Galí, and Gertler, the central bank is able to offset fully exogenous declines in aggregate demand through adjustments in the expected path for the policy rate. See Richard H. Clarida, Jordi Galí, and Mark Gertler (1999), “The Science of Monetary Policy: A New Keynesian Perspective,” *Journal of Economic Literature*, vol. 37 (December), pp. 1661-1707. A paper by Clarida shows that this result extends to the open economy facing, for example, a decline in exports. While monetary policy in practice must confront real-world complications that theoretical models ignore, the crucial point is that economic projections for growth and inflation under appropriate monetary policy may be much less affected by adverse or positive “demand” fluctuations than would be the case if policy did not respond appropriately to these developments. That is, under present circumstances and under appropriate monetary policy, one can be more optimistic about the economic outlook than would be a “pessimist” who focuses only on the crosswinds without factoring in the appropriate policy response to the crosswinds. See Richard H. Clarida (2017), “The Global Factor in Neutral Policy Rates: Some Implications for Exchange Rates, Monetary Policy, and Policy Coordination,” NBER Working Paper Series 23562 (Cambridge, Mass.: NBER, June).

these global economic and financial developments as, at each future FOMC meeting, I consider what adjustment to our monetary policy stance is warranted to achieve and sustain our dual-mandate objectives.

With our December decision, the 2.5 percent upper limit of our target range for the federal funds rate is now equal to the lower end of the range of Committee participants' estimates of its longer-run equilibrium level, r^* . One defines r^* as the level of the policy rate that, if sustained, would maintain full employment and price stability in the long run. As I have discussed in a previous speech, r^* is both unobserved and time varying, so it must be inferred from macroeconomic and financial data.⁶

It is for this reason that, at this stage of the business cycle and with the economy operating close to our dual-mandate objectives, it will be especially important for our policy decisions to continue to be data dependent. We need to be data dependent in two related but distinct ways. First, we need to base our policy decisions on what trends in the data tell us about where the economy is at the time of each meeting relative to our dual-mandate objectives for unemployment and inflation. Second, we need to be data dependent by looking at a wide range of real and financial data that can provide information on where the economy is heading under appropriate policy, including the ultimate destination for u^* and r^* . Over the past seven years, FOMC participants have continually revised down their estimates of long-run u^* and r^* as the unemployment rate fell and historically low policy rates did not trigger a surge in inflation and inflation expectations above target. This process of learning about u^* and r^* as new data arrive

⁶ See Richard H. Clarida (2018), "Data Dependence and U.S. Monetary Policy," speech delivered at the Clearing House and the Bank Policy Institute Annual Conference, New York, November 27, <https://www.federalreserve.gov/newsevents/speech/clarida20181127a.htm>.

continues and reinforces that we are not on a preset course. With inflation muted, I believe that the Committee can afford to be patient as we see how the data evolve in 2019 and as we assess what monetary policy stance is warranted to sustain strong growth and our dual-mandate objectives.

In terms of monetary policy implementation, the FOMC is assessing how the demand for our liabilities, especially reserve balances held at the Fed by depository institutions and U.S. currency holdings, is evolving in a world in which regulation and prudence boost holdings of liquid assets by financial institutions. Ultimately, these factors, along with the choice we make with regard to our operating framework, will be the primary determinants of the size of our balance sheet, which since October 2017 has been shrinking as we allow our holdings of Treasury securities and agency mortgage-backed securities to roll off as they mature and prepay. There have been significant changes in financial regulation pertaining to high-quality liquid assets and liquidity coverage ratios, and the legacy of the Global Financial Crisis has likely led financial institutions to want to have higher liquidity even outside of regulation. And that means that we are going to be in a world in which financial institutions are likely either required or going to want to hold onto liquid assets, including reserves at the Fed.

The FOMC is discussing the pros and cons of different longer-run approaches to monetary policy implementation and is still learning about the evolution of the demand for reserves in the banking system. As noted in the FOMC's Policy Normalization Principles and Plans, the Committee intends to, in the longer run, hold "no more

securities than necessary to implement monetary policy efficiently and effectively.”⁷ In that vein, as indicated in the minutes from our recent meetings, the Committee has been weighing the costs and benefits of an implementation system with abundant reserves. The current system for policy implementation with abundant reserves has, to date, served us well. We have good control of short-term money market rates in a variety of market conditions, and these rates have been effectively transmitting to broader financial conditions in the economy. However, while the assessment of our operating framework is ongoing, let me be clear that any decisions we make on the ultimate size of the balance sheet and the implementation of policy will be taken so as to be consistent with our goals of sustaining strong growth, maximum employment, and price stability. If we find that the ongoing program of balance sheet normalization or any other aspect of normalization no longer promotes the achievement of our dual-mandate goals, we will not hesitate to make changes.

Review of the Federal Reserve’s Strategy, Tools, and Communication

In November, the Federal Reserve announced that it will conduct a wide-ranging and public review in 2019 of how we go about achieving the twin goals of maximum employment and price stability assigned to us by the Congress. The review will cover the Fed’s monetary policy strategy, policy tools, and communication practices and will include outreach to businesses, community groups, academics, and other interested parties. As Chairman Powell has indicated, with labor market conditions close to maximum employment and inflation near our 2 percent objective, now is a good time to

⁷ See Board of Governors of the Federal Reserve System (2014), “Federal Reserve Issues FOMC Statement on Policy Normalization Principles and Plans,” press release, September 17, paragraph 9, <https://www.federalreserve.gov/newsevents/pressreleases/monetary20140917c.htm>.

take stock of how the Federal Reserve formulates, conducts, and communicates monetary policy. As part of this outreach effort, the Federal Reserve System will hold a research conference June 4-5, 2019, hosted by the Federal Reserve Bank of Chicago and featuring outside speakers and panelists. The Federal Reserve Board and Reserve District Banks will also be holding outreach and public events as we seek views from a wide range of interested parties. Beginning in the summer of 2019, the FOMC will draw on what it has learned from the conference and the System outreach events as it assesses possible ways in which the Fed's strategy, tools, and communication practices might evolve to best achieve, on a sustained basis, the twin goals of maximum employment and price stability assigned to it by the Congress. We anticipate making our findings public after the FOMC concludes this review sometime in 2020.

Concluding Thoughts

The U.S. economy enters 2019 after a year of strong growth, with inflation near our 2 percent objective, and with the unemployment rate near 50-year lows. That said, growth and growth prospects in other economies around the world have moderated somewhat in recent months, and overall financial conditions have tightened materially. These recent developments in the global economy and financial markets represent crosswinds to the U.S. economy. If these crosswinds are sustained, appropriate forward-looking monetary policy should seek to offset them to keep the economy as close as possible to our dual-mandate objectives of maximum employment and price stability. As we have long said, monetary policy is not on a preset course. Going forward, we need, I believe, to be cognizant of the balance we must strike between (1) being forward looking and preemptive and (2) maximizing the odds of being right.

For example, were models to predict a surge in inflation, a decision for preemptive hikes before the surge is evident in actual data would need to be balanced against the cost of the model being wrong. Speaking for myself, I believe we can afford to be patient about assessing how to adjust our policy stance to achieve and sustain our dual-mandate objectives. We begin the year as close to our assigned objectives as we have in a very long time. In these circumstances, I believe patience is a virtue and is one we can today afford. Thank you.