

Minutes of the Federal Open Market Committee January 30–31, 2018

A joint meeting of the Federal Open Market Committee and the Board of Governors was held in the offices of the Board of Governors of the Federal Reserve System in Washington, D.C., on Tuesday, January 30, 2018, at 10:00 a.m. and continued on Wednesday, January 31, 2018, at 9:00 a.m.¹

PRESENT:

Janet L. Yellen, Chair
William C. Dudley, Vice Chairman
Thomas I. Barkin
Raphael W. Bostic
Lael Brainard
Loretta J. Mester
Jerome H. Powell
Randal K. Quarles
John C. Williams

James Bullard, Charles L. Evans, Esther L. George, Michael Strine, and Eric Rosengren, Alternate Members of the Federal Open Market Committee

Patrick Harker, Robert S. Kaplan, and Neel Kashkari, Presidents of the Federal Reserve Banks of Philadelphia, Dallas, and Minneapolis, respectively

James A. Clouse, Secretary
Matthew M. Luecke, Deputy Secretary
David W. Skidmore, Assistant Secretary
Michelle A. Smith, Assistant Secretary
Mark E. Van Der Weide, General Counsel
Michael Held, Deputy General Counsel
Steven B. Kamin, Economist
Thomas Laubach, Economist
David W. Wilcox, Economist

David Altig, Kartik B. Athreya, Thomas A. Connors, Mary Daly, David E. Lebow, Trevor A. Reeve, Argia M. Sbordone, Ellis W. Tallman, William Wascher, and Beth Anne Wilson, Associate Economists

Simon Potter, Manager, System Open Market Account

Lorie K. Logan, Deputy Manager, System Open Market Account

Ann E. Misback, Secretary, Office of the Secretary, Board of Governors

Matthew J. Eichner,² Director, Division of Reserve Bank Operations and Payment Systems, Board of Governors; Andreas Lehnert, Director, Division of Financial Stability, Board of Governors

Rochelle M. Edge, Deputy Director, Division of Monetary Affairs, Board of Governors; Maryann F. Hunter, Deputy Director, Division of Supervision and Regulation, Board of Governors

David Reifschneider and John M. Roberts, Special Advisers to the Board, Office of Board Members, Board of Governors

Linda Robertson, Assistant to the Board, Office of Board Members, Board of Governors

Joseph W. Gruber, Senior Associate Director, Division of International Finance, Board of Governors; Michael G. Palumbo, Senior Associate Director, Division of Research and Statistics, Board of Governors

Antulio N. Bomfim, Ellen E. Meade, Stephen A. Meyer, Edward Nelson, and Joyce K. Zickler, Senior Advisers, Division of Monetary Affairs, Board of Governors; Jeremy B. Rudd, Senior Adviser, Division of Research and Statistics, Board of Governors

William F. Bassett, Associate Director, Division of Financial Stability, Board of Governors

¹ The Federal Open Market Committee is referenced as the “FOMC” and the “Committee” in these minutes.

² Attended through the discussion of developments in financial markets and open market operations.

Andrew Figura, Assistant Director, Division of Research and Statistics, Board of Governors; Jason Wu, Assistant Director, Division of Monetary Affairs, Board of Governors

Penelope A. Beattie,³ Assistant to the Secretary, Office of the Secretary, Board of Governors

Dana L. Burnett and Michele Cavallo, Section Chiefs, Division of Monetary Affairs, Board of Governors

David H. Small, Project Manager, Division of Monetary Affairs, Board of Governors

Andrea Ajello, Kurt F. Lewis, and Bernd Schlusche, Principal Economists, Division of Monetary Affairs, Board of Governors; Ekaterina Peneva and Daniel J. Vine, Principal Economists, Division of Research and Statistics, Board of Governors

Camille Bryan, Lead Financial Analyst, Division of International Finance, Board of Governors

Ellen J. Bromagen, First Vice President, Federal Reserve Bank of Chicago

Jeff Fuhrer and Daniel G. Sullivan, Executive Vice Presidents, Federal Reserve Banks of Boston and Chicago, respectively

Todd E. Clark,³ Evan F. Koenig, Keith Sill, and Mark L.J. Wright, Senior Vice Presidents, Federal Reserve Banks of Cleveland, Dallas, Philadelphia, and Minneapolis, respectively

Carlos Garriga and Jonathan L. Willis, Vice Presidents, Federal Reserve Banks of St. Louis and Kansas City, respectively

Annual Organizational Matters⁴

In the agenda for this meeting, it was reported that advices of the election of the following members and alternate members of the Federal Open Market Committee for a term beginning January 30, 2018, had been received and that these individuals had executed their oaths of office.

The elected members and alternate members were as follows:

William C. Dudley, President of the Federal Reserve Bank of New York, with Michael Strine, First Vice President of the Federal Reserve Bank of New York, as alternate

Thomas I. Barkin, President of the Federal Reserve Bank of Richmond, with Eric Rosengren, President of the Federal Reserve Bank of Boston, as alternate

Loretta J. Mester, President of the Federal Reserve Bank of Cleveland, with Charles L. Evans, President of the Federal Reserve Bank of Chicago, as alternate

Raphael W. Bostic, President of the Federal Reserve Bank of Atlanta, with James Bullard, President of the Federal Reserve Bank of St. Louis, as alternate

John C. Williams, President of the Federal Reserve Bank of San Francisco, with Esther L. George, President of the Federal Reserve Bank of Kansas City, as alternate

By unanimous vote, the Committee selected Janet L. Yellen to serve as Chairman through February 2, 2018, and Jerome H. Powell to serve as Chairman, effective February 3, 2018, until the selection of his successor at the first regularly scheduled meeting of the Committee in 2019.

By unanimous vote, the following officers of the Committee were selected to serve until the selection of their successors at the first regularly scheduled meeting of the Committee in 2019:

William C. Dudley	Vice Chairman
James A. Clouse	Secretary
Matthew M. Luecke	Deputy Secretary
David W. Skidmore	Assistant Secretary
Michelle A. Smith	Assistant Secretary
Mark E. Van Der Weide	General Counsel
Michael Held	Deputy General Counsel
Richard M. Ashton	Assistant General Counsel
Steven B. Kamin	Economist
Thomas Laubach	Economist
David W. Wilcox	Economist

David Altig
Kartik B. Athreya

³ Attended Tuesday session only.

⁴ Committee organizational documents are available at www.federalreserve.gov/monetarypolicy/rules_authorizations.htm.

Thomas A. Connors
 Mary Daly
 David E. Lebow
 Trevor A. Reeve
 Argja M. Sbordone
 Ellis W. Tallman
 William Wascher
 Beth Anne Wilson

Associate Economists

By unanimous vote, the Federal Reserve Bank of New York was selected to execute transactions for the System Open Market Account (SOMA).

By unanimous vote, the Committee selected Simon Potter and Lorie K. Logan to serve at the pleasure of the Committee as manager and deputy manager of the SOMA, respectively, on the understanding that these selections were subject to their being satisfactory to the Federal Reserve Bank of New York.

Secretary's note: Advice subsequently was received that the manager and deputy manager selections indicated above were satisfactory to the Federal Reserve Bank of New York.

By unanimous vote, the Authorization for Domestic Open Market Operations was approved with revisions to incorporate transactions of securities lending into the existing operational readiness testing provision and to improve the document's readability. The Guidelines for the Conduct of System Open Market Operations in Federal-Agency Issues remained suspended.

AUTHORIZATION FOR DOMESTIC OPEN MARKET OPERATIONS

(As amended effective January 30, 2018)

OPEN MARKET TRANSACTIONS

1. The Federal Open Market Committee (the "Committee") authorizes and directs the Federal Reserve Bank selected by the Committee to execute open market transactions (the "Selected Bank"), to the extent necessary to carry out the most recent domestic policy directive adopted by the Committee:

A. To buy or sell in the open market securities that are direct obligations of, or fully guaranteed as to principal and interest by, the United States, and securities that are direct obligations of, or fully guaranteed as to principal and interest by, any agency of the United States, that are eligible for purchase or sale under Sec-

tion 14(b) of the Federal Reserve Act ("Eligible Securities") for the System Open Market Account ("SOMA"):

- i. As an outright operation with securities dealers and foreign and international accounts maintained at the Selected Bank: on a same-day or deferred delivery basis (including such transactions as are commonly referred to as dollar rolls and coupon swaps) at market prices; or
 - ii. As a temporary operation: on a same-day or deferred delivery basis, to purchase such Eligible Securities subject to an agreement to resell ("repo transactions") or to sell such Eligible Securities subject to an agreement to repurchase ("reverse repo transactions") for a term of 65 business days or less, at rates that, unless otherwise authorized by the Committee, are determined by competitive bidding, after applying reasonable limitations on the volume of agreements with individual counterparties;
- B. To allow Eligible Securities in the SOMA to mature without replacement;
- C. To exchange, at market prices, in connection with a Treasury auction, maturing Eligible Securities in the SOMA with the Treasury, in the case of Eligible Securities that are direct obligations of the United States or that are fully guaranteed as to principal and interest by the United States; and
- D. To exchange, at market prices, maturing Eligible Securities in the SOMA with an agency of the United States, in the case of Eligible Securities that are direct obligations of that agency or that are fully guaranteed as to principal and interest by that agency.

SECURITIES LENDING

2. In order to ensure the effective conduct of open market operations, the Committee authorizes the Selected Bank to operate a program to lend Eligible Securities held in the SOMA to dealers on an overnight basis (except that the Selected Bank may lend Eligible Securities for longer than an overnight term to accommodate weekend, holiday, and similar trading conventions).

- A. Such securities lending must be:
- i. At rates determined by competitive bidding;
 - ii. At a minimum lending fee consistent with the objectives of the program;
 - iii. Subject to reasonable limitations on the total amount of a specific issue of Eligible Securities that may be auctioned; and
 - iv. Subject to reasonable limitations on the amount of Eligible Securities that each borrower may borrow.

- B. The Selected Bank may:
- i. Reject bids that, as determined in its sole discretion, could facilitate a bidder's ability to control a single issue;
 - ii. Accept Treasury securities or cash as collateral for any loan of securities authorized in this paragraph 2; and
 - iii. Accept agency securities as collateral only for a loan of agency securities authorized in this paragraph 2.

OPERATIONAL READINESS TESTING

3. The Committee authorizes the Selected Bank to undertake transactions of the type described in paragraphs 1 and 2 from time to time for the purpose of testing operational readiness, subject to the following limitations:

- A. All transactions authorized in this paragraph 3 shall be conducted with prior notice to the Committee;
- B. The aggregate par value of the transactions authorized in this paragraph 3 that are of the type described in paragraph 1.A.i shall not exceed \$5 billion per calendar year; and
- C. The outstanding amount of the transactions described in paragraphs 1.A.ii and 2 shall not exceed \$5 billion at any given time.

TRANSACTIONS WITH CUSTOMER ACCOUNTS

4. In order to ensure the effective conduct of open market operations, while assisting in the provision of short-term investments or other authorized services for foreign central bank and international accounts maintained at a Federal Reserve Bank (the "Foreign Accounts") and accounts maintained at a Federal Reserve Bank as fiscal agent of the United States pursuant to section 15 of the Federal Reserve Act (together with the Foreign Accounts, the "Customer Accounts"), the Committee authorizes the following when undertaken on terms comparable to those available in the open market:

- A. The Selected Bank, for the SOMA, to undertake reverse repo transactions in Eligible Securities held in the SOMA with the Customer Accounts for a term of 65 business days or less; and
- B. Any Federal Reserve Bank that maintains Customer Accounts, for any such Customer Account, when appropriate and subject to all other necessary authorization and approvals, to:
 - i. Undertake repo transactions in Eligible Securities with dealers with a corresponding reverse repo

transaction in such Eligible Securities with the Customer Accounts; and

- ii. Undertake intra-day repo transactions in Eligible Securities with Foreign Accounts.

Transactions undertaken with Customer Accounts under the provisions of this paragraph 4 may provide for a service fee when appropriate. Transactions undertaken with Customer Accounts are also subject to the authorization or approval of other entities, including the Board of Governors of the Federal Reserve System and, when involving accounts maintained at a Federal Reserve Bank as fiscal agent of the United States, the United States Department of the Treasury.

ADDITIONAL MATTERS

5. The Committee authorizes the Chairman of the Committee, in fostering the Committee's objectives during any period between meetings of the Committee, to instruct the Selected Bank to act on behalf of the Committee to:

- A. Adjust somewhat in exceptional circumstances the stance of monetary policy and to take actions that may result in material changes in the composition and size of the assets in the SOMA; or
- B. Undertake transactions with respect to Eligible Securities in order to appropriately address temporary disruptions of an operational or highly unusual nature in U.S. dollar funding markets.

Any such adjustment described in subparagraph A of this paragraph 5 shall be made in the context of the Committee's discussion and decision about the stance of policy at its most recent meeting and the Committee's long-run objectives to foster maximum employment and price stability, and shall be based on economic, financial, and monetary developments since the most recent meeting of the Committee. The Chairman, whenever feasible, will consult with the Committee before making any instruction under this paragraph 5.

The Committee voted unanimously to reaffirm without revision the Authorization for Foreign Currency Operations and the Foreign Currency Directive as shown below.

AUTHORIZATION FOR FOREIGN CURRENCY OPERATIONS

(As reaffirmed effective January 30, 2018)

IN GENERAL

1. The Federal Open Market Committee (the "Committee") authorizes the Federal Reserve Bank selected by

the Committee (the “Selected Bank”) to execute open market transactions for the System Open Market Account as provided in this Authorization, to the extent necessary to carry out any foreign currency directive of the Committee:

A. To purchase and sell foreign currencies (also known as cable transfers) at home and abroad in the open market, including with the United States Treasury, with foreign monetary authorities, with the Bank for International Settlements, and with other entities in the open market. This authorization to purchase and sell foreign currencies encompasses purchases and sales through standalone spot or forward transactions and through foreign exchange swap transactions. For purposes of this Authorization, foreign exchange swap transactions are: swap transactions with the United States Treasury (also known as warehousing transactions), swap transactions with other central banks under reciprocal currency arrangements, swap transactions with other central banks under standing dollar liquidity and foreign currency liquidity swap arrangements, and swap transactions with other entities in the open market.

B. To hold balances of, and to have outstanding forward contracts to receive or to deliver, foreign currencies.

2. All transactions in foreign currencies undertaken pursuant to paragraph 1 above shall, unless otherwise authorized by the Committee, be conducted:

A. In a manner consistent with the obligations regarding exchange arrangements under Article IV of the Articles of Agreement of the International Monetary Fund (IMF).¹

B. In close and continuous cooperation and consultation, as appropriate, with the United States Treasury.

C. In consultation, as appropriate, with foreign monetary authorities, foreign central banks, and international monetary institutions.

D. At prevailing market rates.

STANDALONE SPOT AND FORWARD TRANSACTIONS

3. For any operation that involves standalone spot or forward transactions in foreign currencies:

A. Approval of such operation is required as follows:

i. The Committee must direct the Selected Bank in advance to execute the operation if it would result in the overall volume of standalone spot and forward transactions in foreign currencies, as defined in paragraph 3.C of this Authorization, exceeding

\$5 billion since the close of the most recent regular meeting of the Committee. The Foreign Currency Subcommittee (the “Subcommittee”) must direct the Selected Bank in advance to execute the operation if the Subcommittee believes that consultation with the Committee is not feasible in the time available.

ii. The Committee authorizes the Subcommittee to direct the Selected Bank in advance to execute the operation if it would result in the overall volume of standalone spot and forward transactions in foreign currencies, as defined in paragraph 3.C of this Authorization, totaling \$5 billion or less since the close of the most recent regular meeting of the Committee.

B. Such an operation also shall be:

i. Generally directed at countering disorderly market conditions; or

ii. Undertaken to adjust System balances in light of probable future needs for currencies; or

iii. Conducted for such other purposes as may be determined by the Committee.

C. For purposes of this Authorization, the overall volume of standalone spot and forward transactions in foreign currencies is defined as the sum (disregarding signs) of the dollar values of individual foreign currencies purchased and sold, valued at the time of the transaction.

WAREHOUSING

4. The Committee authorizes the Selected Bank, with the prior approval of the Subcommittee and at the request of the United States Treasury, to conduct swap transactions with the United States Exchange Stabilization Fund established by section 10 of the Gold Reserve Act of 1934 under agreements in which the Selected Bank purchases foreign currencies from the Exchange Stabilization Fund and the Exchange Stabilization Fund repurchases the foreign currencies from the Selected Bank at a later date (such purchases and sales also known as warehousing).

RECIPROCAL CURRENCY ARRANGEMENTS, AND STANDING DOLLAR AND FOREIGN CURRENCY LIQUIDITY SWAPS

5. The Committee authorizes the Selected Bank to maintain reciprocal currency arrangements established under the North American Framework Agreement, standing dollar liquidity swap arrangements, and stand-

ing foreign currency liquidity swap arrangements as provided in this Authorization and to the extent necessary to carry out any foreign currency directive of the Committee.

A. For reciprocal currency arrangements all drawings must be approved in advance by the Committee (or by the Subcommittee, if the Subcommittee believes that consultation with the Committee is not feasible in the time available).

B. For standing dollar liquidity swap arrangements all drawings must be approved in advance by the Chairman. The Chairman may approve a schedule of potential drawings, and may delegate to the manager, System Open Market Account, the authority to approve individual drawings that occur according to the schedule approved by the Chairman.

C. For standing foreign currency liquidity swap arrangements all drawings must be approved in advance by the Committee (or by the Subcommittee, if the Subcommittee believes that consultation with the Committee is not feasible in the time available).

D. Operations involving standing dollar liquidity swap arrangements and standing foreign currency liquidity swap arrangements shall generally be directed at countering strains in financial markets in the United States or abroad, or reducing the risk that they could emerge, so as to mitigate their effects on economic and financial conditions in the United States.

E. For reciprocal currency arrangements, standing dollar liquidity swap arrangements, and standing foreign currency liquidity swap arrangements:

- i. All arrangements are subject to annual review and approval by the Committee;
- ii. Any new arrangements must be approved by the Committee; and
- iii. Any changes in the terms of existing arrangements must be approved in advance by the Chairman. The Chairman shall keep the Committee informed of any changes in terms, and the terms shall be consistent with principles discussed with and guidance provided by the Committee.

OTHER OPERATIONS IN FOREIGN CURRENCIES

6. Any other operations in foreign currencies for which governance is not otherwise specified in this Authorization (such as foreign exchange swap transactions with private-sector counterparties) must be authorized and directed in advance by the Committee.

FOREIGN CURRENCY HOLDINGS

7. The Committee authorizes the Selected Bank to hold foreign currencies for the System Open Market Account in accounts maintained at foreign central banks, the Bank for International Settlements, and such other foreign institutions as approved by the Board of Governors under Section 214.5 of Regulation N, to the extent necessary to carry out any foreign currency directive of the Committee.

A. The Selected Bank shall manage all holdings of foreign currencies for the System Open Market Account:

- i. Primarily, to ensure sufficient liquidity to enable the Selected Bank to conduct foreign currency operations as directed by the Committee;
- ii. Secondly, to maintain a high degree of safety;
- iii. Subject to paragraphs 7.A.i and 7.A.ii, to provide the highest rate of return possible in each currency; and
- iv. To achieve such other objectives as may be authorized by the Committee.

B. The Selected Bank may manage such foreign currency holdings by:

- i. Purchasing and selling obligations of, or fully guaranteed as to principal and interest by, a foreign government or agency thereof ("Permitted Foreign Securities") through outright purchases and sales;
- ii. Purchasing Permitted Foreign Securities under agreements for repurchase of such Permitted Foreign Securities and selling such securities under agreements for the resale of such securities; and
- iii. Managing balances in various time and other deposit accounts at foreign institutions approved by the Board of Governors under Regulation N.

C. The Subcommittee, in consultation with the Committee, may provide additional instructions to the Selected Bank regarding holdings of foreign currencies.

ADDITIONAL MATTERS

8. The Committee authorizes the Chairman:

A. With the prior approval of the Committee, to enter into any needed agreement or understanding with the Secretary of the United States Treasury about the division of responsibility for foreign currency operations between the System and the United States Treasury;

B. To advise the Secretary of the United States Treasury concerning System foreign currency operations, and to consult with the Secretary on policy matters relating to foreign currency operations;

C. To designate Federal Reserve System persons authorized to communicate with the United States Treasury concerning System Open Market Account foreign currency operations; and

D. From time to time, to transmit appropriate reports and information to the National Advisory Council on International Monetary and Financial Policies.

9. The Committee authorizes the Selected Bank to undertake transactions of the type described in this Authorization, and foreign exchange and investment transactions that it may be otherwise authorized to undertake, from time to time for the purpose of testing operational readiness. The aggregate amount of such transactions shall not exceed \$2.5 billion per calendar year. These transactions shall be conducted with prior notice to the Committee.

10. All Federal Reserve banks shall participate in the foreign currency operations for System Open Market Account in accordance with paragraph 3G(1) of the Board of Governors' Statement of Procedure with Respect to Foreign Relationships of Federal Reserve Banks dated January 1, 1944.

11. Any authority of the Subcommittee pursuant to this Authorization may be exercised by the Chairman if the Chairman believes that consultation with the Subcommittee is not feasible in the time available. The Chairman shall promptly report to the Subcommittee any action approved by the Chairman pursuant to this paragraph.

12. The Committee authorizes the Chairman, in exceptional circumstances where it would not be feasible to convene the Committee, to foster the Committee's objectives by instructing the Selected Bank to engage in foreign currency operations not otherwise authorized pursuant to this Authorization. Any such action shall be made in the context of the Committee's discussion and decisions regarding foreign currency operations. The Chairman, whenever feasible, will consult with the Committee before making any instruction under this paragraph.

¹ In general, as specified in Article IV, each member of the IMF undertakes to collaborate with the IMF and other members to assure orderly exchange arrangements and to promote a stable system of exchange rates. These obligations include seeking to direct the member's eco-

nomie and financial policies toward the objective of fostering orderly economic growth with reasonable price stability. These obligations also include avoiding manipulating exchange rates or the international monetary system in such a way that would impede effective balance of payments adjustment or to give an unfair competitive advantage over other members.

FOREIGN CURRENCY DIRECTIVE

(As reaffirmed effective January 30, 2018)

1. The Committee directs the Federal Reserve Bank selected by the Committee (the "Selected Bank") to execute open market transactions, for the System Open Market Account, in accordance with the provisions of the Authorization for Foreign Currency Operations (the "Authorization") and subject to the limits in this Directive.

2. The Committee directs the Selected Bank to execute warehousing transactions, if so requested by the United States Treasury and if approved by the Foreign Currency Subcommittee (the "Subcommittee"), subject to the limitation that the outstanding balance of United States dollars provided to the United States Treasury as a result of these transactions not at any time exceed \$5 billion.

3. The Committee directs the Selected Bank to maintain, for the System Open Market Account:

A. Reciprocal currency arrangements with the following foreign central banks:

Foreign central bank	Maximum amount (millions of dollars or equivalent)
Bank of Canada	2,000
Bank of Mexico	3,000

B. Standing dollar liquidity swap arrangements with the following foreign central banks:

Bank of Canada
Bank of England
Bank of Japan
European Central Bank
Swiss National Bank

C. Standing foreign currency liquidity swap arrangements with the following foreign central banks:

Bank of Canada
Bank of England

Bank of Japan
European Central Bank
Swiss National Bank

4. The Committee directs the Selected Bank to hold and to invest foreign currencies in the portfolio in accordance with the provisions of paragraph 7 of the Authorization.

5. The Committee directs the Selected Bank to report to the Committee, at each regular meeting of the Committee, on transactions undertaken pursuant to paragraphs 1 and 6 of the Authorization. The Selected Bank is also directed to provide quarterly reports to the Committee regarding the management of the foreign currency holdings pursuant to paragraph 7 of the Authorization.

6. The Committee directs the Selected Bank to conduct testing of transactions for the purpose of operational readiness in accordance with the provisions of paragraph 9 of the Authorization.

By unanimous vote, the Committee revised its Program for Security of FOMC Information with a set of technical changes to update references to other documents.

In the Committee's annual reconsideration of the Statement on Longer-Run Goals and Monetary Policy Strategy, participants agreed that only a minor revision was required at this meeting, which was to update the reference to the median of FOMC participants' estimates of the longer-run normal rate of unemployment from 4.8 percent to 4.6 percent. All participants supported the statement with the revision, and the Committee voted unanimously to approve the updated statement.

STATEMENT ON LONGER-RUN GOALS AND MONETARY POLICY STRATEGY

(As amended effective January 30, 2018)

The Federal Open Market Committee (FOMC) is firmly committed to fulfilling its statutory mandate from the Congress of promoting maximum employment, stable prices, and moderate long-term interest rates. The Committee seeks to explain its monetary policy decisions to the public as clearly as possible. Such clarity facilitates well-informed decisionmaking by households and businesses, reduces economic and financial uncertainty, increases the effectiveness of monetary policy, and enhances transparency and accountability, which are essential in a democratic society.

Inflation, employment, and long-term interest rates fluctuate over time in response to economic and financial disturbances. Moreover, monetary policy actions

tend to influence economic activity and prices with a lag. Therefore, the Committee's policy decisions reflect its longer-run goals, its medium-term outlook, and its assessments of the balance of risks, including risks to the financial system that could impede the attainment of the Committee's goals.

The inflation rate over the longer run is primarily determined by monetary policy, and hence the Committee has the ability to specify a longer-run goal for inflation. The Committee reaffirms its judgment that inflation at the rate of 2 percent, as measured by the annual change in the price index for personal consumption expenditures, is most consistent over the longer run with the Federal Reserve's statutory mandate. The Committee would be concerned if inflation were running persistently above or below this objective. Communicating this symmetric inflation goal clearly to the public helps keep longer-term inflation expectations firmly anchored, thereby fostering price stability and moderate long-term interest rates and enhancing the Committee's ability to promote maximum employment in the face of significant economic disturbances. The maximum level of employment is largely determined by nonmonetary factors that affect the structure and dynamics of the labor market. These factors may change over time and may not be directly measurable. Consequently, it would not be appropriate to specify a fixed goal for employment; rather, the Committee's policy decisions must be informed by assessments of the maximum level of employment, recognizing that such assessments are necessarily uncertain and subject to revision. The Committee considers a wide range of indicators in making these assessments. Information about Committee participants' estimates of the longer-run normal rates of output growth and unemployment is published four times per year in the FOMC's Summary of Economic Projections. For example, in the most recent projections, the median of FOMC participants' estimates of the longer-run normal rate of unemployment was 4.6 percent.

In setting monetary policy, the Committee seeks to mitigate deviations of inflation from its longer-run goal and deviations of employment from the Committee's assessments of its maximum level. These objectives are generally complementary. However, under circumstances in which the Committee judges that the objectives are not complementary, it follows a balanced approach in promoting them, taking into account the magnitude of the deviations and the potentially different time horizons over which employment and inflation are projected to return to levels judged consistent with its mandate.

The Committee intends to reaffirm these principles and to make adjustments as appropriate at its annual organizational meeting each January.

Developments in Financial Markets and Open Market Operations

The manager of the System Open Market Account (SOMA) provided a summary of developments in domestic and global financial markets over the intermeeting period. Financial conditions eased further over recent weeks with market participants pointing to increasing appetites for risk and perceptions of diminished downside risks as factors buoying market sentiment. In this environment, yields on safe assets such as U.S. Treasury securities moved up some while corporate risk spreads narrowed and equity prices recorded further significant gains. Breakeven measures of inflation compensation derived from Treasury Inflation Protected Securities (TIPS) moved up but remained low. Survey measures of longer-term inflation expectations showed little change. Judging from interest rate futures, the expected path of the federal funds rate shifted up over the period but continued to imply a gradual expected pace of policy firming. The deputy manager followed with a discussion of recent developments in money markets and FOMC operations. Year-end pressures were evident in the market for foreign exchange basis swaps, but conditions returned to normal early in 2018. Yields on Treasury bills maturing in early March were elevated, reflecting investors' concerns about the possibility that a failure to raise the federal debt ceiling could affect the timing of principal payments for these securities. The Open Market Desk continued to execute reinvestment operations for Treasury and agency securities in the SOMA in accordance with the procedure specified in the Committee's directive to the Desk. The deputy manager also reported on the volume of overnight reverse repurchase agreement operations over the intermeeting period and discussed the Desk's plans for small-value operational tests of various types of open market operations over the coming year.

By unanimous vote, the Committee ratified the Open Market Desk's domestic transactions over the intermeeting period. There were no intervention operations in foreign currencies for the System's account during the intermeeting period.

Inflation Analysis and Forecasting

The staff presented three briefings on inflation analysis and forecasting. The presentations reviewed a number of commonly used structural and reduced-form models. These included structural models in which the rate of

inflation is linked importantly to measures of resource slack and a measure of expected inflation relevant for wage and price setting—so-called Phillips curve specifications—as well as statistical models in which inflation is primarily determined by a time-varying inflation trend or longer-run inflation expectations. The briefings noted several factors beyond those captured in the models that appeared to have put downward pressure on prices in recent years. These included structural changes in price setting for some items, such as medical care, and the effects of idiosyncratic price shocks, such as the unusual drop in prices of wireless telephone services in 2017. The staff found little compelling evidence for the possible influence of other factors such as a more competitive pricing environment or a change in the markup of prices over unit labor costs. Overall, for the set of models presented, the prediction errors in recent years were larger than those observed during the 2001–07 period but were consistent with historical norms and, in most models, did not appear to be biased.

The staff presentations considered two key channels by which monetary policy influences inflation—the response of inflation to changes in resource utilization and the role of inflation expectations, or trend inflation, in the price-setting process. In part because inflation was importantly influenced by a number of short-lived factors, the effects of current and expected resource utilization gaps on inflation were not easy to discern empirically. Estimates of the strength of those effects had diminished noticeably in recent years. The briefings highlighted a number of other challenges associated with estimating the strength and timing of the linkage between resource utilization and inflation, including the reliability of and changes over time in estimates of the natural rate of unemployment and potential output and the ability to adequately account for supply shocks. In addition, some research suggested that the relationship between resource utilization and inflation may be nonlinear, with the response of inflation increasing as rates of utilization rise to very high levels.

With regard to inflation expectations, two of the briefings presented findings that the longer-run trend in inflation, absent cyclical disturbances or transitory fluctuations, had been stable in recent years at a little below 2 percent. The briefings reported that the average forecasting performance of models employing either statistical estimates of inflation trends or survey-based measures of inflation expectations as proxies for inflation expectations appeared comparable, even though different versions of such models could yield very differ-

ent forecasts at any given point in time. Moreover, although survey-based measures of longer-run inflation expectations tended to move in parallel with estimated inflation trends, the empirical research provided no clear guidance on how to construct a measure of inflation expectations that would be the most useful for inflation forecasting. The staff noted that although reduced-form models in which inflation tends to revert toward longer-run inflation trends described the data reasonably well, those models offered little guidance to policymakers on how to conduct policy so as to achieve their desired outcome for inflation.

Following the staff presentations, participants discussed how the inflation frameworks reviewed in the briefings informed their views on inflation and monetary policy. Almost all participants who commented agreed that a Phillips curve-type of inflation framework remained useful as one of their tools for understanding inflation dynamics and informing their decisions on monetary policy. Policymakers pointed to a number of possible reasons for the difficulty in estimating the link between resource utilization and inflation in recent years. These reasons included an extended period of low and stable inflation in the United States and other advanced economies during which the effects of resource utilization on inflation became harder to identify, the shortcomings of commonly used measures of resource gaps, the effects of transitory changes in relative prices, and structural factors that had made business pricing more competitive or prices more flexible over time. It was noted that research focusing on inflation across U.S. states or metropolitan areas continued to find a significant relationship between price or wage inflation and measures of resource gaps. A couple of participants questioned the usefulness of a Phillips curve-type framework for policymaking, citing the limited ability of such frameworks to capture the relationship between economic activity and inflation.

Participants generally agreed that inflation expectations played a fundamental role in understanding and forecasting inflation, with stable inflation expectations providing an important anchor for the rate of inflation over the longer run. Participants acknowledged that the causes of movements in short- and longer-run inflation expectations, including the role of monetary policy, were imperfectly understood. They commented that various proxies for inflation expectations—readings from household and business surveys or from economic forecasters, estimates derived from market prices, or estimated trends—were imperfect measures of actual inflation expectations, which are unobservable. That said,

participants emphasized the critical need for the FOMC to maintain a credible longer-run inflation objective and to clearly communicate the Committee's commitment to achieving that objective. Several participants indicated that they viewed the available evidence as suggesting that longer-run inflation expectations remained well anchored; one cited recent research finding that inflation expectations had become better anchored following the Committee's adoption of a numerical inflation target. However, a few saw low levels of inflation over recent years as reflecting, in part, slippage in longer-run inflation expectations below the Committee's 2 percent objective. In that regard, a number of participants noted the importance of continuing to emphasize that the Committee's 2 percent inflation objective is symmetric. A couple of participants suggested that the Committee might consider expressing its objective as a range rather than a point estimate. A few other participants suggested that the FOMC could begin to examine whether adopting a monetary policy framework in which the Committee would strive to make up for past deviations of inflation from target might address the challenge of achieving and maintaining inflation expectations consistent with the Committee's inflation objective, particularly in an environment in which the neutral rate of interest appeared likely to remain low.

Staff Review of the Economic Situation

The information reviewed for the January 30–31 meeting indicated that labor market conditions continued to strengthen through December and that real gross domestic product (GDP) expanded at about a 2½ percent pace in the fourth quarter of last year. Growth of real final domestic purchases by households and businesses, generally a good indicator of the economy's underlying momentum, was solid. Consumer price inflation, as measured by the 12-month percentage change in the price index for personal consumption expenditures (PCE), remained below 2 percent in December. Survey-based measures of longer-run inflation expectations were little changed on balance.

Total nonfarm payroll employment increased solidly in December, and the national unemployment rate remained at 4.1 percent. The unemployment rates for Hispanics, for Asians, and for African Americans were lower than earlier in the year and close to the levels seen just before the most recent recession. The national labor force participation rate held steady in December; relative to the declining trend suggested by an aging population, this sideways movement in the participation rate represented a further strengthening in labor market conditions. The participation rate for prime-age (defined as

ages 25 to 54) men edged up in December, while the rate for prime-age women declined slightly. The share of workers who were employed part time for economic reasons was little changed in December and was close to its pre-recession level. The rates of private-sector job openings and quits were little changed in November, and the four-week moving average of initial claims for unemployment insurance benefits continued to be at a low level in mid-January. Recent readings showed that gains in hourly labor compensation remained modest. Both the employment cost index for private-sector workers and average hourly earnings for all employees rose about 2½ percent over the 12 months ending in December.

Total industrial production increased over the two months ending in December, with broad-based gains in manufacturing, mining, and utilities output. Automakers' schedules indicated that assemblies of light motor vehicles would likely move up over the coming months. Broader indicators of manufacturing production, such as the new orders indexes from national and regional manufacturing surveys, pointed to further solid increases in factory output in the near term.

Real PCE increased strongly in the fourth quarter. Recent readings on key factors that influence consumer spending—including gains in employment, real disposable personal income, and households' net worth—continued to be supportive of further solid growth of real PCE in the near term. Consumer sentiment in early January, as measured by the University of Michigan Surveys of Consumers, remained upbeat.

Real residential investment rose briskly in the fourth quarter after having declined in the previous two quarters. Both starts and issuance of building permits for new single-family homes increased in the fourth quarter as a whole, and starts for multifamily units also moved up. Moreover, sales of both new and existing homes rose in the fourth quarter.

Real private expenditures for business equipment and intellectual property increased at a solid pace in the fourth quarter. Recent indicators of business equipment spending—such as rising new orders of nondefense capital goods excluding aircraft and upbeat readings on business sentiment from national and regional surveys—pointed to further gains in equipment spending in the near term. Firms' real spending for nonresidential structures rose modestly in the fourth quarter, as an increase in outlays for drilling and mining structures was largely offset by a decline in expenditures for other business structures. The number of crude oil and natural gas rigs in operation—an indicator of spending for structures in

the drilling and mining sector—continued to edge up through late January.

Total real government purchases rose modestly in the fourth quarter. Increased federal government purchases mostly reflected a rise in defense spending, and the gains in purchases by state and local governments were led by an increase in construction spending in this sector.

The nominal U.S. international trade deficit widened further in November after widening sharply in October. Exports of goods and services picked up in November, while imports, particularly of consumer goods, increased robustly. Available data for goods trade in December suggested that import growth again outpaced export growth. All told, real net exports were estimated to be a substantial drag on real GDP growth in the fourth quarter.

Total U.S. consumer prices, as measured by the PCE price index, increased about 1¾ percent over the 12 months ending in December. Core PCE price inflation, which excludes changes in consumer food and energy prices, was 1½ percent over that same period. The consumer price index (CPI) rose around 2 percent over the same period, while core CPI inflation was 1¾ percent. Recent readings on survey-based measures of longer-run inflation expectations—including those from the Michigan survey and the Desk's Survey of Primary Dealers and Survey of Market Participants—were little changed on balance.

Incoming data suggested that economic activity abroad continued to expand at a solid pace and that this expansion was broad based across countries. In the advanced foreign economies (AFE), real GDP in the euro area and the United Kingdom expanded at a moderate pace in the fourth quarter. In the emerging market economies (EMEs), Mexico's economy rebounded after being held back by natural disasters in the third quarter. Economic growth remained solid in China but cooled off a bit in some emerging Asian economies after a very strong third-quarter performance. Inflation in both AFEs and EMEs picked up significantly in the fourth quarter, largely reflecting a boost from rising oil prices. Inflation excluding food and energy prices remained well below central bank targets in several economies, including the euro area and Japan.

Staff Review of the Financial Situation

Domestic financial market conditions eased considerably further over the intermeeting period. A strengthening outlook for economic growth in the United States and abroad, along with recently enacted tax legislation,

appeared to boost investor sentiment. U.S. equity prices, Treasury yields, and market-based measures of inflation compensation rose, and spreads of yields on investment- and speculative-grade nonfinancial corporate bonds over those for comparable-maturity Treasury securities narrowed further. In addition, the dollar depreciated broadly amid strong foreign economic data and monetary policy communications by some foreign central banks that investors reportedly viewed as less accommodative than expected.

FOMC communications over the intermeeting period were generally characterized by market participants as consistent with their expectations for continued gradual removal of monetary policy accommodation. The Committee's decision to raise the target range for the federal funds rate at the December meeting was widely expected, and the probability of an increase in the target range for the federal funds rate occurring at the January meeting, as implied by quotes on federal funds futures contracts, remained essentially zero. Over the intermeeting period, the futures-implied probability of policy firming at the March meeting rose to about 85 percent; respondents to the Desk's Survey of Primary Dealers and Survey of Market Participants assigned, on average, similarly high odds to a rate increase at the March meeting. Levels of the federal funds rate at the end of 2018 and 2019 implied by overnight index swap rates moved up moderately.

The nominal Treasury yield curve shifted up over the intermeeting period amid an improved outlook for domestic and foreign economic growth. Yields on both 2- and 10-year Treasury securities moved up about 30 basis points. Measures of inflation compensation based on TIPS fell in response to the soft reading on core inflation in the November CPI release but subsequently moved up against the backdrop of an improving global growth outlook, higher commodity prices, depreciation of the dollar, and the stronger-than-expected reading on core inflation in the December CPI release. On net, inflation compensation moved up at both the 5-year and the 5-to-10-year horizons, and both measures returned to levels seen in early 2017 before the string of generally weaker-than-expected inflation readings.

Broad equity price indexes rose substantially over the intermeeting period, with investors pointing to a stronger global economic outlook and the supportive effect of the recently enacted tax legislation on risk sentiment. The VIX, an index of option-implied volatility for one-month returns on the S&P 500 index, increased but re-

mained low by historical standards. Spreads of both investment- and speculative-grade corporate bond yields over comparable-maturity Treasury yields declined slightly and remained well below their historical averages.

The FOMC's decision at its December meeting to raise the target range for the federal funds rate was transmitted smoothly to money market rates. The effective federal funds rate held steady at a level near the middle of the target range except at year-end. While borrowing costs moved up briefly in offshore dollar funding markets over year-end, conditions in money markets were reported to be orderly. In line with recent year-end experiences, rates and volumes in the federal funds and Eurodollar markets declined, while in secured markets, rates on Treasury repurchase agreements increased. After year-end, pressures in money markets abated quickly and rates and volumes returned to recent ranges.

The broad nominal dollar index declined nearly 4 percent relative to its value at the time of the December FOMC meeting; the decline was most pronounced against AFE currencies, but the dollar depreciated notably against most EME currencies as well. EME equity prices registered substantial gains, in part supported by a significant rise in commodity prices; emerging market bond spreads narrowed moderately, and flows into EME equity and bond funds strengthened substantially.

Market-based measures of policy expectations and longer-term sovereign yields moved up in most AFEs. The Bank of Canada raised its policy rate at its January meeting, largely in response to better-than-expected economic data. The Bank of England, the Bank of Japan, and the European Central Bank (ECB) left their monetary policy stances unchanged, as expected. Nonetheless, the ECB president's optimistic assessment of the euro-area economy at the press conference following the January meeting was interpreted by market participants as a signal that monetary policy would be less accommodative than expected. Following those remarks, the euro appreciated notably against the dollar and core euro-area sovereign yields moved higher. That said, market-based measures of policy expectations continued to indicate that investors anticipate a gradual pace of monetary policy normalization in the euro area.

Financing conditions for nonfinancial businesses and households remained generally accommodative over the intermeeting period and continued to be supportive of economic activity. Respondents to the January Senior Loan Officer Opinion Survey on Bank Lending Practices (SLOOS) reported easing standards and narrowing

loan spreads for large and middle-market firms and attributed this easing to more aggressive competition from other bank or nonbank lenders. Net debt financing by investment-grade nonfinancial corporations turned negative in December, but the weakness appeared to reflect a softening in the demand for credit, possibly related to the anticipation of higher after-tax cash flows and repatriation of foreign earnings. In contrast, gross issuance of speculative-grade bonds and institutional leveraged loans remained strong. Credit market conditions for small businesses remained relatively accommodative despite sluggish credit growth among these firms. Credit conditions in municipal bond markets also remained accommodative.

In commercial real estate (CRE) markets, growth of loans held by banks slowed further in the fourth quarter, though CRE loans held by small banks and some types of CRE loans held by large banks—construction and land development loans in particular—expanded at a more robust pace. Financing conditions in the commercial mortgage-backed securities (CMBS) market remained accommodative as issuance continued at a robust pace and spreads on CMBS remained near their lowest levels since the financial crisis. Credit conditions in the residential mortgage market remained accommodative for most borrowers, though credit standards remained tight for borrowers with low credit scores or hard-to-document incomes. Mortgage rates increased in tandem with rates on longer-term Treasury securities but remained quite low by historical standards.

Conditions in consumer credit markets remained largely supportive of economic activity. Consumer credit increased notably in November, exceeding the more moderate volume of borrowing observed earlier in the year. Revolving credit expanded in November, while nonrevolving credit grew robustly, mainly driven by expansion in student and other consumer loans. In contrast, growth of auto lending slowed in recent months, consistent with the weakening demand for such loans in the fourth quarter as reported in the January SLOOS. For subprime borrowers, conditions remained tight, particularly in the market for credit cards and auto loans.

The staff provided its latest report on the potential risks to financial stability; the report continued to characterize the financial vulnerabilities of the U.S. financial system as moderate on balance. This overall assessment incorporated the staff's judgment that vulnerabilities associated with asset valuation pressures continued to be elevated; asset valuation pressures apparently reflected, in part, a broad-based appetite for risk among investors.

The staff judged that vulnerabilities from leverage in the nonfinancial sector appeared to remain moderate, while vulnerabilities stemming from financial-sector leverage and from maturity and liquidity transformation continued to be viewed as low.

Staff Economic Outlook

The U.S. economic projection prepared by the staff for the January FOMC meeting was stronger than the staff forecast at the time of the December meeting. Real GDP was estimated to have risen in the fourth quarter of last year by somewhat more than the staff had previously expected, as gains in both household and business spending were larger than anticipated. Beyond 2017, the forecast for real GDP growth was revised up, reflecting a reassessment of the recently enacted tax cuts, along with higher projected paths for equity prices and foreign economic growth and a lower assumed path for the foreign exchange value of the dollar. Real GDP was projected to increase at a somewhat faster pace than potential output through 2020; the staff continued to assume that the recently enacted tax cuts would boost real GDP growth moderately over the medium term. The unemployment rate was projected to decline further over the next few years and to continue to run well below the staff's estimate of its longer-run natural rate over this period.

Estimates of total and core PCE price inflation for 2017 were in line with the staff's previous forecast. The projection for inflation over the medium term was revised up slightly, primarily reflecting tighter resource utilization in the January forecast. Total PCE price inflation in 2018 was projected to be somewhat faster than in 2017 despite a slower projected pace of increases in consumer energy prices; core PCE prices were forecast to rise notably faster in 2018, importantly reflecting both the expected waning of transitory factors that held down 12-month measures of inflation in 2017 as well as the projected further tightening in resource utilization. The staff projected that core inflation would reach 2 percent in 2019 and that total inflation would be at the Committee's 2 percent objective in 2020.

The staff viewed the uncertainty around its projections for real GDP growth, the unemployment rate, and inflation as similar to the average of the past 20 years. On the one hand, many indicators of uncertainty about the macroeconomic outlook remained subdued; on the other hand, considerable uncertainty remained about a number of federal government policies relevant for the economic outlook. The staff saw the risks to the forecasts for real GDP growth and the unemployment rate

as balanced. The risks to the projection for inflation also were seen as balanced. Downside risks included the possibilities that longer-term inflation expectations may have edged lower or that the run of soft core inflation readings this year could prove to be more persistent than the staff expected. These downside risks were seen as essentially counterbalanced by the upside risk that inflation could increase more than expected in an economy that was projected to move further above its potential.

Participants' Views on Current Conditions and the Economic Outlook

In their discussion of the economic situation and the outlook, meeting participants agreed that information received since the FOMC met in December indicated that the labor market continued to strengthen and that economic activity expanded at a solid rate. Gains in employment, household spending, and business fixed investment were solid, and the unemployment rate stayed low. On a 12-month basis, both overall inflation and inflation for items other than food and energy continued to run below 2 percent. Market-based measures of inflation compensation increased in recent months but remained low; survey-based measures of longer-term inflation expectations were little changed, on balance.

Participants generally saw incoming information on economic activity and the labor market as consistent with continued above-trend economic growth and a further strengthening in labor market conditions, with the recent solid gains in household and business spending indicating substantial underlying economic momentum. They pointed to accommodative financial conditions, the recently enacted tax legislation, and an improved global economic outlook as factors likely to support economic growth over coming quarters. Participants expected that with further gradual adjustments in the stance of monetary policy, economic activity would expand at a moderate pace and labor market conditions would remain strong. Near-term risks to the economic outlook appeared roughly balanced. Inflation on a 12-month basis was expected to move up this year and to stabilize around the Committee's 2 percent objective over the medium term. However, participants judged that it was important to continue to monitor inflation developments closely.

Participants expected the recent solid growth in consumer spending to continue, supported by further gains in employment and income, increased household wealth resulting from higher asset prices, and high levels of consumer confidence. It was noted that spending on dura-

ble goods to replace those damaged during the hurricanes in September may have provided a temporary boost to consumer spending. In connection with solid growth in consumer spending, a couple of participants noted that the household saving rate had declined to its lowest level since 2005, likely driven by buoyant consumer sentiment or expectations that the rise in household wealth would be sustained.

Participants characterized their business contacts as generally upbeat about the economy; their contacts cited the recent tax cuts and notable improvements in the global economic outlook as positive factors. Manufacturers in a number of Districts had responded to increased orders by boosting production. Against a backdrop of higher energy prices and increased global demand for crude oil, a couple of participants revised up their forecasts for energy production in their respective Districts. Businesses in a number of Districts reported plans to further increase investment in coming quarters in order to expand capacity. Even so, several participants expressed considerable uncertainty about the degree to which changes to corporate taxes would support business investment and capacity expansion; according to these participants, firms may be only just beginning to determine how they might allocate their tax savings among investment, worker compensation, mergers and acquisitions, returns to shareholders, or other uses.

The labor market had strengthened further in recent months, as indicated by continued solid payroll gains, a small increase in average hours worked, and a labor force participation rate that had held steady despite the longer-run declining trend implied by an aging population. Many participants reported that labor market conditions were tight in their Districts, evidenced by low unemployment rates, difficulties for employers in filling open positions or retaining workers, or some signs of upward pressure on wages. The unemployment rate, at 4.1 percent, had remained near the lowest level seen in the past 20 years. It was noted that other labor market indicators—such as the U-6 measure of unemployment or the share of involuntary part-time employment—had returned to their pre-recession levels. A few participants judged that while the labor market was close to full employment, some margins of slack remained; these participants pointed to the employment-to-population ratio or the labor force participation rate for prime-age workers, which remained below pre-recession levels, as well as the absence to date of clear signs of a pickup in aggregate wage growth.

During their discussion of labor market conditions, participants expressed a range of views about recent wage developments. While some participants heard more reports of wage pressures from their business contacts over the intermeeting period, participants generally noted few signs of a broad-based pickup in wage growth in available data. With regard to how firms might use part of their tax savings to boost compensation, a few participants suggested that such a boost could be in the form of onetime bonuses or variable pay rather than a permanent increase in wage structures. It was noted that the pace of wage gains might not increase appreciably if productivity growth remains low. That said, a number of participants judged that the continued tightening in labor markets was likely to translate into faster wage increases at some point.

In their discussion of inflation developments, many participants noted that inflation data in recent months had generally pointed to a gradual rise in inflation, as the 12-month core PCE price inflation rose to 1.5 percent in December, up 0.2 percentage point from the low recorded in the summer. Meanwhile, total PCE price inflation was 1.7 percent over the same 12-month period. Participants anticipated that inflation would continue to gradually rise as resource utilization tightened further and as wage pressures became more apparent; several expected that declines in the foreign exchange value of the dollar in recent months would also likely help return inflation to 2 percent over the medium term. Business contacts in a few Districts reported that they had begun to have some more ability to raise prices to cover higher input costs. That said, a few participants posited that the recently enacted corporate tax cuts might lead firms to cut prices in order to remain competitive or to gain market share, which could result in a transitory drag on inflation.

With regard to inflation expectations, available readings from surveys had been steady and TIPS-based measures of inflation compensation had moved up, although they remained low. Many participants thought that inflation expectations remained well anchored and would support the gradual return of inflation to the Committee's 2 percent objective over the medium term. However, a few other participants pointed to the record of inflation consistently running below the Committee's 2 percent objective over recent years and expressed the concern that longer-run inflation expectations may have slipped below levels consistent with that objective.

Many participants noted that financial conditions had eased significantly over the intermeeting period; these

participants generally viewed the economic effects of the decline in the dollar and the rise in equity prices as more than offsetting the effects of the increase in nominal Treasury yields. One participant reported that financial market contacts did not see the relatively flat slope of the yield curve as signaling an increased risk of recession. A few others judged that it would be important to continue to monitor the effects of policy firming on the slope of the yield curve, noting the strong association between past yield curve inversions and recessions.

Regulatory actions and improved risk management in recent years had put the financial system in a better position to withstand adverse shocks, such as a substantial decline in asset prices, than in the past. However, amid elevated asset valuations and an increased use of debt by nonfinancial corporations, several participants cautioned that imbalances in financial markets may begin to emerge as the economy continued to operate above potential. In this environment, increased use of leverage by nonbank financial institutions might be difficult to detect in a timely manner. It was also noted that the Committee should regularly reassess risks to the financial system and their implications for the economic outlook in light of the potential for changes in regulatory policies over time.

In their consideration of monetary policy, participants discussed the implications of recent economic and financial developments for the outlook for economic growth, labor market conditions, and inflation and, in turn, for the appropriate path of the federal funds rate. Participants agreed that a gradual approach to raising the target range for the federal funds rate remained appropriate and reaffirmed that adjustments to the policy path would depend on their assessments of how the economic outlook and risks to the outlook were evolving relative to the Committee's policy objectives. While participants continued to expect economic activity to expand at a moderate pace over the medium term, they anticipated that the rate of economic growth in 2018 would exceed their estimates of its sustainable longer-run pace and that labor market conditions would strengthen further. A number of participants indicated that they had marked up their forecasts for economic growth in the near term relative to those made for the December meeting in light of the strength of recent data on economic activity in the United States and abroad, continued accommodative financial conditions, and information suggesting that the effects of recently enacted tax changes—while still uncertain—might be somewhat larger in the near term than previously thought. Several others suggested that the

upside risks to the near-term outlook for economic activity may have increased. A majority of participants noted that a stronger outlook for economic growth raised the likelihood that further gradual policy firming would be appropriate.

Almost all participants continued to anticipate that inflation would move up to the Committee's 2 percent objective over the medium term as economic growth remained above trend and the labor market stayed strong; several commented that recent developments had increased their confidence in the outlook for further progress toward the Committee's 2 percent inflation objective. A couple noted that a step-up in the pace of economic growth could tighten labor market conditions even more than they currently anticipated, posing risks to inflation and financial stability associated with substantially overshooting full employment. However, some participants saw an appreciable risk that inflation would continue to fall short of the Committee's objective. These participants saw little solid evidence that the strength of economic activity and the labor market was showing through to significant wage or inflation pressures. They judged that the Committee could afford to be patient in deciding whether to increase the target range for the federal funds rate in order to support further strengthening of the labor market and allow participants to assess whether incoming information on inflation showed that it was solidly on a track toward the Committee's objective.

Some participants also commented on the likely evolution of the neutral federal funds rate. By most estimates, the neutral level of the federal funds rate had been very low in recent years, but it was expected to rise slowly over time toward its longer-run level. However, the outlook for the neutral rate was uncertain and would depend on the interplay of a number of forces. For example, the neutral rate, which appeared to have fallen sharply during the Global Financial Crisis when financial headwinds had restrained demand, might move up more than anticipated as the global economy strengthened. Alternatively, the longer-run level of the neutral rate might remain low in the absence of fundamental shifts in trends in productivity, demographics, or the demand for safe assets.

Committee Policy Action

In their discussion of monetary policy for the period ahead, members judged that information received since the Committee met in December indicated that the labor market had continued to strengthen and that economic

activity had been rising at a solid rate. Gains in employment, household spending, and business fixed investment had been solid, and the unemployment rate had stayed low. On a 12-month basis, both overall inflation and inflation for items other than food and energy had continued to run below 2 percent. Market-based measures of inflation compensation had increased in recent months but remained low; survey-based measures of longer-term inflation expectations were little changed, on balance.

Members expected that, with further gradual adjustments in the stance of monetary policy, economic activity would expand at a moderate pace and labor market conditions would remain strong. In their discussion of the economic outlook, most members viewed the recent data bearing on real economic activity as suggesting a modestly stronger near-term outlook than they had anticipated at their meeting in December. In addition, financial conditions had remained accommodative, and the details of the tax legislation suggested that its effects on consumer and business spending—while still uncertain—might be a bit greater in the near term than they had previously thought. Although several saw increased upside risks to the near-term outlook for economic activity, members generally continued to judge the risks to that outlook as remaining roughly balanced.

Most members noted that recent information on inflation along with prospects for a continued solid pace of economic activity provided support for the view that inflation on a 12-month basis would likely move up in 2018 and stabilize around the Committee's 2 percent objective over the medium term. However, a couple of members expressed concern about the outlook for inflation, seeing little evidence of a meaningful improvement in the underlying trend in inflation, measures of inflation expectations, or wage growth. Several members commented that they saw both upside and downside risks to the inflation outlook, and members agreed to continue to monitor inflation developments closely.

After assessing current conditions and the outlook for economic activity, the labor market, and inflation, members voted to maintain the target range for the federal funds rate at 1¼ to 1½ percent. They indicated that the stance of monetary policy remained accommodative, thereby supporting strong labor market conditions and a sustained return to 2 percent inflation.

Members agreed that the timing and size of future adjustments to the target range for the federal funds rate would depend on their assessments of realized and expected economic conditions relative to the Committee's

objectives of maximum employment and 2 percent inflation. They reiterated that this assessment would take into account a wide range of information, including measures of labor market conditions, indicators of inflation pressures and inflation expectations, and readings on financial and international developments. Members also agreed to carefully monitor actual and expected inflation developments relative to the Committee's symmetric inflation goal. Members expected that economic conditions would evolve in a manner that would warrant further gradual increases in the federal funds rate. They judged that a gradual approach to raising the target range would sustain the economic expansion and balance the risks to the outlook for inflation and unemployment. Members agreed that the strengthening in the near-term economic outlook increased the likelihood that a gradual upward trajectory of the federal funds rate would be appropriate. They therefore agreed to update the characterization of their expectation for the evolution of the federal funds rate in the postmeeting statement to point to "further gradual increases" while maintaining the target range at the current meeting. Members continued to anticipate that the federal funds rate would likely remain, for some time, below levels that were expected to prevail in the longer run. Nonetheless, they again stated that the actual path for the federal funds rate would depend on the economic outlook as informed by the incoming data.

At the conclusion of the discussion, the Committee voted to authorize and direct the Federal Reserve Bank of New York, until it was instructed otherwise, to execute transactions in the SOMA in accordance with the following domestic policy directive, to be released at 2:00 p.m.:

"Effective February 1, 2018, the Federal Open Market Committee directs the Desk to undertake open market operations as necessary to maintain the federal funds rate in a target range of $1\frac{1}{4}$ to $1\frac{1}{2}$ percent, including overnight reverse repurchase operations (and reverse repurchase operations with maturities of more than one day when necessary to accommodate weekend, holiday, or similar trading conventions) at an offering rate of 1.25 percent, in amounts limited only by the value of Treasury securities held outright in the System Open Market Account that are available for such operations and by a per-counterparty limit of \$30 billion per day.

The Committee directs the Desk to continue rolling over at auction the amount of principal payments from the Federal Reserve's holdings

of Treasury securities maturing during each calendar month that exceeds \$12 billion, and to re-invest in agency mortgage-backed securities the amount of principal payments from the Federal Reserve's holdings of agency debt and agency mortgage-backed securities received during each calendar month that exceeds \$8 billion. Small deviations from these amounts for operational reasons are acceptable.

The Committee also directs the Desk to engage in dollar roll and coupon swap transactions as necessary to facilitate settlement of the Federal Reserve's agency mortgage-backed securities transactions."

The vote also encompassed approval of the statement below to be released at 2:00 p.m.:

"Information received since the Federal Open Market Committee met in December indicates that the labor market has continued to strengthen and that economic activity has been rising at a solid rate. Gains in employment, household spending, and business fixed investment have been solid, and the unemployment rate has stayed low. On a 12-month basis, both overall inflation and inflation for items other than food and energy have continued to run below 2 percent. Market-based measures of inflation compensation have increased in recent months but remain low; survey-based measures of longer-term inflation expectations are little changed, on balance.

Consistent with its statutory mandate, the Committee seeks to foster maximum employment and price stability. The Committee expects that, with further gradual adjustments in the stance of monetary policy, economic activity will expand at a moderate pace and labor market conditions will remain strong. Inflation on a 12-month basis is expected to move up this year and to stabilize around the Committee's 2 percent objective over the medium term. Near-term risks to the economic outlook appear roughly balanced, but the Committee is monitoring inflation developments closely.

In view of realized and expected labor market conditions and inflation, the Committee decided to maintain the target range for the federal funds rate at $1\frac{1}{4}$ to $1\frac{1}{2}$ percent. The stance of monetary policy remains accommodative,

thereby supporting strong labor market conditions and a sustained return to 2 percent inflation.

In determining the timing and size of future adjustments to the target range for the federal funds rate, the Committee will assess realized and expected economic conditions relative to its objectives of maximum employment and 2 percent inflation. This assessment will take into account a wide range of information, including measures of labor market conditions, indicators of inflation pressures and inflation expectations, and readings on financial and international developments. The Committee will carefully monitor actual and expected inflation developments relative to its symmetric inflation goal. The Committee expects that economic conditions will evolve in a manner that will warrant further gradual increases in the federal funds rate; the federal funds rate is likely to remain, for some time, below levels that are expected to prevail in the longer run. However, the actual path of the federal funds rate will depend on the economic outlook as informed by incoming data.”

Voting for this action: Janet L. Yellen, William C. Dudley, Thomas I. Barkin, Raphael W. Bostic, Lael

Brainard, Loretta J. Mester, Jerome H. Powell, Randal K. Quarles, and John C. Williams.

Voting against this action: None.

Consistent with the Committee’s decision to leave the target range for the federal funds rate unchanged, the Board of Governors voted unanimously to leave the interest rates on required and excess reserve balances unchanged at 1½ percent and voted unanimously to approve establishment of the primary credit rate (discount rate) at the existing level of 2 percent.⁵

It was agreed that the next meeting of the Committee would be held on Tuesday–Wednesday, March 20–21, 2018. The meeting adjourned at 10:50 a.m. on January 31, 2018.

Notation Vote

By notation vote completed on January 2, 2018, the Committee unanimously approved the minutes of the Committee meeting held on December 12–13, 2017.

James A. Clouse
Secretary

⁵ The second vote of the Board also encompassed approval of the establishment of the interest rates for secondary and

seasonal credit under the existing formulas for computing such rates.