

RESPONSES TO SURVEY OF PRIMARY DEALERS

Markets Group, Federal Reserve Bank of New York



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The **Survey of Primary Dealers** is formulated by the Trading Desk at the Federal Reserve Bank of New York to enhance policymakers' understanding of market expectations on a variety of topics related to the economy, monetary policy and financial markets. The questions involve only topics that are widely discussed in the public domain and never presume any particular policy action. FOMC participants are not involved in the survey's design.

For most questions, median responses across dealers, along with the 25th and 75th percentiles, are reported.¹ For questions that ask respondents to give a probability distribution, the average response across dealers for each potential outcome is reported. Brief summaries of the comments received in free response form are also provided.

Responses were received from 23 primary dealers. Except where noted, all 23 dealers responded to each question. In some cases, dealers may not have provided complete responses (e.g. may not have provided forecasts extending to the same time horizon as requested in the survey). In these instances, the number of respondents who answered all parts of the question is indicated.

¹ Answers may not sum to 100 percent due to rounding.

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- 1a)** Provide below your expectations for changes, if any, to the language referencing each of the following topics in the June FOMC statement.

Current economic conditions:

Many dealers indicated that they expected the Committee to note a decline in the unemployment rate in its characterization of current economic conditions. In addition, many indicated that they expected the Committee to acknowledge an acceleration in household spending, with several indicating that they expect this acceleration to be described as a rebound from the first quarter. Finally, several dealers indicated that they expected the Committee to upgrade its assessment of economic activity, and several indicated that they expected language regarding inflation to be unchanged.

Economic outlook:
(22 responses)

Some dealers indicated that they expected no material change to the Committee's characterization of the economic outlook, while several indicated that they either expected or saw as possible a reference to global developments.

Communication on the expected path of the target fed funds rate:

Several dealers indicated that they expected the Committee to remove the clause "the federal funds rate is likely to remain, for some time, below levels that are expected to prevail in the longer run", and several dealers indicated that they expected the existing characterization of the stance of policy as "accommodative" to be modified. Finally, several other dealers indicated that they expected no material changes to this section of the statement.

Other:
(13 responses)

Several dealers indicated that they expected the announcement of a technical adjustment to the interest on excess reserves (IOER) rate.

- 1b)** What are your expectations for the medians of FOMC participants' economic projections in the Summary of Economic Projections (SEP)?

Many dealers indicated that they expected a downward revision to the medians of participants' unemployment rate forecasts, with several indicating that they expected a downward revision to the median 2018 unemployment rate forecast in particular. Several dealers indicated that they either expected or saw a risk of a downward revision to the median longer-run unemployment rate forecast. Some dealers indicated that they expected an upward revision to the medians of participants' inflation forecasts, with several indicating that they expected an upward revision to the

median 2018 headline PCE inflation forecast in particular, while several indicated that they did not expect revisions to median forecasts for core PCE inflation. Finally, several dealers indicated that they expected no change to participants' median real GDP growth forecasts, while several others indicated that they either expected or saw a risk of an upward revision to the median 2018 real GDP growth forecast.

- 1c)** What are your expectations for the most likely levels of the medians of FOMC participants' target federal funds rate projections in the SEP?
(22 responses)

	Year-end 2018	Year-end 2019	Year-end 2020	Longer Run
25th Pctl	2.13%	2.88%	3.38%	2.88%
Median	2.13%	2.88%	3.38%	2.88%
75th Pctl	2.38%	2.88%	3.38%	2.88%

Please comment on the balance of risks around your expectations.
(22 responses)

Many dealers indicated that they viewed the balance of risks around median target federal funds rate projections as tilted to the upside, with some indicating that they saw upside risk to the year-end 2018 median projection in particular and several noting that an increase in only one individual projection was necessary for the year-end 2018 median to change. On the other hand, several dealers indicated that they viewed the balance of risks at some point over the forecast horizon as tilted to the downside.

- 1d)** Additionally, please describe any expected changes to the distributions of FOMC participants' target rate projections, if applicable.
(20 responses)

Several dealers indicated that they expected the distribution of participants' target federal funds rate projections to narrow. Several dealers indicated that they expected no material change in the distributions of projections, while several others indicated that they expected the average of participants' projections for either year-end 2020 or the longer run to decline.

- 1e)** What are your expectations for the Chairman's press conference?

Many dealers indicated that they expected Chairman Powell to discuss trade-related risks during his press conference. Several indicated that they expected the Chairman to indicate that the gradual removal of monetary policy accommodation remains appropriate, and several indicated that they expected him to note recent improvement in economic activity data. Finally, several dealers indicated that they expected the Chairman to discuss the

potential technical adjustment to IOER that was discussed in the May FOMC minutes.

2a) Provide your estimate of the most likely outcome (i.e., the mode) for the target federal funds rate or range, as applicable, immediately following the FOMC meetings and at the end of each of the following quarters and half years below. For the time periods at which you expect a target range, please indicate the midpoint of that range in providing your response.

	Jun. 12-13 2018	Jul. 31 - Aug. 1 2018	Sep. 25-26 2018	Nov. 7-8 2018	Dec. 18-19 2018	Jan. 29-30 2019	Mar. 19-20 2019
25th Pctl	1.88%	1.88%	2.13%	2.13%	2.13%	2.13%	2.38%
Median	1.88%	1.88%	2.13%	2.13%	2.38%	2.38%	2.63%
75th Pctl	1.88%	1.88%	2.13%	2.13%	2.38%	2.38%	2.63%
# of Responses	23	23	23	23	23	23	23
	2019 Q2	2019 Q3	2019 Q4	2020 Q1	2020 Q2	2020 Q3	2020 Q4
25th Pctl	2.63%	2.63%	2.88%	2.88%	2.88%	2.88%	2.88%
Median	2.88%	2.88%	2.88%	3.00%	3.13%	3.13%	3.13%
75th Pctl	2.88%	3.13%	3.13%	3.13%	3.38%	3.38%	3.25%
# of Responses	23	23	23	18	18	17	17

2b) In addition, provide your estimate of the longer run target federal funds rate and your expectation for the average federal funds rate over the next 10 years.

	Longer Run	10-yr Average FF Rate
25th Pctl	2.50%	2.00%
Median	2.75%	2.50%
75th Pctl	3.00%	2.76%

2c) Please indicate the percent chance that you attach to the following possible outcomes for the Committee's next policy action between now and the end of 2018.

	Next Change is Increase in Target Rate or Range	Next Change is Decrease in Target Rate or Range	No Change in Target Rate or Range Through the End of 2018
Average	96%	1%	3%

2d) Conditional on the Committee's next policy action between now and the end of 2018 being an increase in the target federal funds rate or range, please indicate the percent chance that you attach to the following possible outcomes for the timing of such a change. Only fill out this conditional probability distribution if you assigned a non-zero probability to the Committee's next policy action between now and the end of 2018 being an increase.

	Increase Occurs at June FOMC meeting	Increase Occurs at Jul./Aug. FOMC meeting	Increase Occurs at September FOMC Meeting or later
Average	94%	2%	3%

2e) Please indicate the percent chance that you attach to the target federal funds rate or range falling in each of the following ranges at the end of 2018, conditional on the following possible scenarios for the direction and timing of the Committee's next policy action between now and the end of 2018. Only fill out the conditional probability distributions for which you assigned a non-zero probability to the conditioning event occurring. If you expect a target range, please use the midpoint of that range in providing your response.

Next change is an increase, occurs at Jul./Aug. FOMC meeting or earlier								
	≤ 1.00%	1.01 - 1.25%	1.26 - 1.50%	1.51 - 1.75%	1.76 - 2.00%	2.01 - 2.25%	2.26 - 2.50%	≥ 2.51%
Average	1%	1%	2%	4%	10%	32%	45%	6%

Next change is an increase, occurs at Sep. FOMC meeting or later								
	≤ 1.00%	1.01 - 1.25%	1.26 - 1.50%	1.51 - 1.75%	1.76 - 2.00%	2.01 - 2.25%	2.26 - 2.50%	≥ 2.51%
Average	1%	2%	3%	10%	32%	41%	9%	2%

Next change is a decrease								
	< 0.0%	0.00 - 0.25%	0.26 - 0.50%	0.51 - 0.75%	0.76 - 1.00%	1.01 - 1.25%	1.26 - 1.50%	≥ 1.51%
Average	4%	17%	11%	12%	14%	20%	22%	1%

2f-i) Please indicate the percent chance that you attach to the target federal funds rate or range falling in each of the following ranges at the end of 2019 and 2020, conditional on **not** moving to the zero lower bound (ZLB) at any point between now and the end of 2020. If you expect a target range, please use the midpoint of that range in providing your response.

(21 responses)

Year-end 2019							
	≤ 1.00%	1.01- 1.50%	1.51- 2.00%	2.01- 2.50%	2.51- 3.00%	3.01- 3.50%	≥ 3.51%
Average	3%	4%	8%	16%	32%	28%	9%

Year-end 2020							
	≤ 1.00%	1.01- 1.50%	1.51- 2.00%	2.01- 2.50%	2.51- 3.00%	3.01- 3.50%	≥ 3.51%
Average	6%	7%	10%	14%	24%	25%	14%

2f-ii) Please indicate the percent chance that you attach to moving to the ZLB at some point between now and the end of 2020.

Probability of Moving to ZLB at Some Point between Now and the End of 2020	
25th Pctl	15%
Median	20%
75th Pctl	25%

2f-iii) Please indicate the percent chance that you attach to the target federal funds rate or range falling in each of the following ranges at the end of 2019 and 2020, conditional on moving to the ZLB at some point between now and the end of 2020. Only fill out these conditional probability distributions if you assigned a non-zero probability to moving to the ZLB at some point between now and the end of 2020. If you expect a target range, please use the midpoint of that range in providing your response. (21 responses)

Year-end 2019								
	< 0.00%	0.00-0.25%	0.26-0.50%	0.51-1.00%	1.01-1.50%	1.51-2.00%	2.01-2.50%	≥ 2.51%
Average	9%	42%	19%	13%	9%	4%	1%	2%

Year-end 2020								
	< 0.00%	0.00-0.25%	0.26-0.50%	0.51-1.00%	1.01-1.50%	1.51-2.00%	2.01-2.50%	≥ 2.51%
Average	15%	48%	21%	11%	4%	1%	1%	0%

2f-iv) What is your estimate of the target federal funds rate or range at the effective lower bound?

Level of Target Fed Funds Rate or Range at ELB	
25th Pctl	-0.25%
Median	0.00%
75th Pctl	0.13%

2g) For parts a-f, please explain the factors behind any change to your expectations, where applicable, since the last policy survey. (18 responses)

Several dealers indicated that there had been no material change to their expectations.

3a) Provide your estimate of the most likely outcome for the 10-year Treasury yield at the end of each period below. In addition, provide your estimate of the longer-run level of the 10-year Treasury yield.

	2018 Q2	2018 Q3	2018 Q4	2019 Q1
25th Pctl	2.90%	2.95%	2.90%	3.00%
Median	3.00%	3.05%	3.20%	3.25%
75th Pctl	3.07%	3.20%	3.25%	3.35%
# of Responses	23	23	23	23

	2019 Q2	2019 H2	2020 H1	2020 H2
25th Pctl	3.00%	2.88%	2.94%	2.87%
Median	3.25%	3.30%	3.35%	3.28%
75th Pctl	3.40%	3.50%	3.60%	3.68%
# of Responses	21	19	16	16

Longer Run	
25th Pctl	3.00%
Median	3.25%
75th Pctl	3.50%
# of Responses	21

3b) Provide your estimate of the most likely outcome for the 30-year fixed primary mortgage rate at the end of each period below. In addition, provide your estimate of the longer-run level of the 30-year fixed primary mortgage rate.

	2018 Q2	2018 Q3	2018 Q4	2019 Q1
25th Pctl	4.40%	4.50%	4.50%	4.50%
Median	4.60%	4.70%	4.75%	4.80%
75th Pctl	4.65%	4.80%	4.90%	5.00%
# of Responses	19	19	19	19

	2019 Q2	2019 H2	2020 H1	2020 H2
25th Pctl	4.65%	4.54%	4.51%	4.51%
Median	4.85%	4.90%	5.00%	4.90%
75th Pctl	5.11%	5.30%	5.40%	5.55%
# of Responses	17	16	15	15

Longer Run	
25th Pctl	4.51%
Median	4.90%
75th Pctl	5.20%
# of Responses	17

- 4a)** Please indicate the percent chance that you attach to the following possible outcomes for the par value of the SOMA portfolio at the end of 2020, conditional on **not** moving to the ZLB at any point between now and the end of 2020. For reference, the level of the SOMA portfolio on May 23rd, 2018 was \$4143 billion, including inflation compensation and settled and unsettled agency MBS, according to the most recent H.4.1 release. Levels referenced below are in \$ billions.

	≤ 3000	3001 - 3500	3501 - 4000	4001 - 4500	≥ 4501
Average	21%	47%	24%	7%	1%

- 4b)** Please indicate the percent chance that you attach to the following possible outcomes for the par value of the SOMA portfolio at the end of 2020, conditional on moving to the ZLB at any point between now and the end of 2020. Only fill out this conditional probability distribution if you assigned a non-zero probability to moving to the ZLB at some point between now and the end of 2020 in question 2. Levels referenced below are in \$ billions.

(22 responses)

	≤ 4000	4001 - 4500	4501 - 5000	5001 - 5500	≥ 5501
Average	21%	35%	26%	12%	5%

- 5a)** During 2018 to date, the average size of the Federal Reserve System's balance sheet was \$4398 billion, and was composed roughly as follows:

Assets*			Liabilities and Capital*		
	Level (\$ Bn)	Share		Level (\$ Bn)	Share
US Treasuries	2422	55%	Federal Reserve Notes	1583	36%
Agency MBS	1759	40%	Reserves	2145	49%
All Other Assets**	217	5%	Deposits in Treasury General Account (TGA)	271	6%
Total Assets	4398	100%	Reverse Repos with Private Counterparties	28	1%
			Reverse Repos with Foreign Official Accounts	239	5%
			Other Deposits***	85	2%
			All Other Liabilities and Capital	46	1%
			Total Liabilities and Capital	4398	100%

*Individual categories rounded to the nearest \$ billion.

**Includes net unamortized premiums and discounts on securities held outright, repos, and other assets.

***Includes balances held by designated financial market utilities (DFMUs), government sponsored entities (GSEs) and international and multilateral organizations.

The figures above refer to averages of Wednesday levels from 2018 H.4.1 releases through 5/24.

Please indicate your expectations for the composition of the Federal Reserve System's balance sheet, on average, in 2025, conditional on not moving to the ZLB at any point between now and the end of 2025. Please provide your responses in levels (\$ billions); the total levels and shares will automatically populate so as to aid responding. Please ensure total assets are equal to total liabilities plus capital.

(22 responses)

Assets				Liabilities and Capital			
		Level	Share			Level	Share
US Treasuries	25th Pctl	2270	73%	Federal Reserve Notes	25th Pctl	1860	56%
	Median	2780	77%		Median	2189	61%
	75th Pctl	3150	80%		75th Pctl	2450	67%
Agency MBS	25th Pctl	500	16%	Reserves	25th Pctl	550	15%
	Median	638	18%		Median	660	18%
	75th Pctl	786	22%		75th Pctl	1000	27%
All Other Assets*	25th Pctl	100	3%	Deposits in Treasury General Account (TGA)	25th Pctl	300	8%
	Median	199	6%		Median	325	9%
	75th Pctl	250	7%		75th Pctl	400	11%
				Reverse Repos with Private Counterparties	25th Pctl	10	0%
					Median	29	1%
					75th Pctl	100	3%
				Reverse Repos with Foreign Official Accounts	25th Pctl	145	4%
					Median	213	6%
					75th Pctl	300	7%
				Other Deposits**	25th Pctl	50	2%
					Median	85	2%
					75th Pctl	110	3%
				All Other Liabilities and Capital	25th Pctl	46	1%
					Median	50	1%
					75th Pctl	60	2%

*Includes net unamortized premiums and discounts on securities held outright, repos, and other assets.

**Includes balances held by designated financial market utilities (DFMUs), government sponsored entities (GSEs) and international and multilateral organizations.

	Total Assets	Total Liabilities and Capital
25th Pctl	3250	3250
Median	3600	3600
75th Pctl	4052	4052

- 5b)** Please describe the assumptions that underlie your expectations in part a, including any regarding the Committee’s long-run operating framework.
(21 responses)

Under the conditions described in question 5a, several dealers noted that they expected the Fed would operate using a “floor system.” Also, several noted that they expected the balance sheet would contain a higher level of Treasury securities than it does at present.

- 5c)** Please explain changes to your expectations in part a since the policy survey on December 4, 2017, where applicable.
(19 responses)

Several dealers indicated that there were no material changes to their expectations. Compared to their response in the December 2017 survey, several dealers noted that they assumed a faster pace of currency growth, and several indicated that their expectation for the level of reserves had increased.

- 6a)** Provide your estimate of the most likely outcome for output, inflation, and unemployment.
(16 responses)

		Q4/Q4 2018	Q4/Q4 2019	Q4/Q4 2020	Longer Run
Real GDP	25th Pctl	2.70%	2.10%	1.70%	1.70%
	Median	2.83%	2.40%	1.80%	1.80%
	75th Pctl	3.00%	2.60%	2.20%	2.00%
Core PCE Inflation	25th Pctl	1.90%	2.00%	2.00%	-
	Median	2.00%	2.10%	2.00%	-
	75th Pctl	2.10%	2.20%	2.20%	-
Headline PCE Inflation	25th Pctl	2.00%	1.90%	2.00%	2.00%
	Median	2.20%	2.00%	2.00%	2.00%
	75th Pctl	2.30%	2.10%	2.20%	2.00%
Unemployment Rate*	25th Pctl	3.60%	3.20%	3.50%	4.30%
	Median	3.60%	3.30%	3.70%	4.50%
	75th Pctl	3.80%	3.80%	4.10%	4.80%

**Average level of the unemployment rate over Q4.*

- 6b)** Provide your estimate of the most likely outcome for the U.S. federal fiscal deficit (as a percent of GDP) for fiscal years 2018, 2019 and 2020.
(18 responses)

	FY 2018	FY 2019	FY 2020
25th Pctl	3.75%	4.65%	5.00%
Median	4.00%	4.90%	5.09%
75th Pctl	4.10%	5.20%	5.20%

6c) Please explain changes to your estimates in parts a and b since the last policy survey, where applicable. (19 responses)

Some dealers noted changes in their economic forecasts and fiscal deficit expectations due to recent economic data releases and market developments. Several indicated that they increased their headline PCE inflation forecasts due to higher energy prices. Several also noted that they lowered their forecasts for the unemployment rate, and several noted that they increased their real GDP growth forecasts.

7a) For the outcomes below, provide the percent chance you attach to the annual average CPI inflation rate from June 1, 2018 – May 31, 2023 falling in each of the following ranges. Please also provide your point estimate for the most likely outcome.

	≤ 1.00%	1.01-1.50%	1.51-2.00%	2.01-2.50%	2.51-3.00%	≥ 3.01%
Average	3%	11%	24%	43%	14%	5%

Most Likely Outcome	
25th Pctl	2.10%
Median	2.20%
75th Pctl	2.30%

7b) For the outcomes below, provide the percent chance you attach to the annual average CPI inflation rate from June 1, 2023 – May 31, 2028 falling in each of the following ranges. Please also provide your point estimate for the most likely outcome.

	≤ 1.00%	1.01-1.50%	1.51-2.00%	2.01-2.50%	2.51-3.00%	≥ 3.01%
Average	4%	10%	28%	40%	13%	5%

Most Likely Outcome	
25th Pctl	2.00%
Median	2.20%
75th Pctl	2.30%

7c) For the outcomes below, provide the percent chance you attach to the PCE inflation rate from June 1, 2020 – May 31, 2021 falling in each of the following ranges. Please also provide your point estimate for the most likely outcome.

	≤ 0.75%	0.76-1.25%	1.26-1.75%	1.76-2.25%	2.26-2.75%	2.76-3.25%	≥ 3.26%
Average	3%	8%	23%	45%	16%	4%	2%

	Most Likely Outcome
25th Pctl	1.90%
Median	2.00%
75th Pctl	2.10%

8a) What percent chance do you attach to the U.S. economy **currently** being in a recession**?

8b) What percent chance do you attach to the U.S. economy being in a recession** **in 6 months**?

8c) What percent chance do you attach to the global economy being in a recession*** **in 6 months**?

	Currently in U.S. Recession	U.S. Recession in 6 Months	Global Recession in 6 Months
25th Pctl	0%	25th Pctl 5%	25th Pctl 5%
Median	2%	Median 10%	Median 10%
75th Pctl	5%	75th Pctl 10%	75th Pctl 15%

**NBER-defined recession

***Previous IMF staff work has suggested that a "global recession" can be characterized as a period during which there is a decline in annual per-capita real global GDP, backed up by a decline or worsening in one or more of the following global macroeconomic indicators: industrial production, trade, capital flows, oil consumption and unemployment.

8d) Please explain the factors behind any change to your expectations in parts a-c since the last policy survey.

(14 responses)

Several dealers indicated that there had been no material change to their recession probabilities.