

“The Bumpy Road to 2 Percent: Managing Inflation in the Current Economy”

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Introduction

Thank you for that kind introduction and warm welcome. Good afternoon, everyone. The Commonwealth Club’s history of providing forums for healthy public debate is well known, not only in the Bay Area but across the country. So it’s a real honor to be addressing you today.

I became President and CEO of the Federal Reserve Bank of San Francisco just about six months ago. The monetary policy decisions we make at the Federal Open Market Committee eight times a year have wide-ranging implications. In fact, our work touches the lives of every American and countless global citizens. So this is a responsibility I take very seriously. And I’m here this afternoon to talk about how I see our economic landscape and what I’ll be paying attention to in the year ahead.

But first, I need to issue the standard disclaimer: the remarks I’m about to deliver are my own, and do not necessarily reflect the views of anyone else within the Federal Reserve System.

Current Conditions

Let me begin by telling you about the Federal Reserve's mission, and how we judge success. Our job is to promote a healthy and stable economy, and we do this by pursuing two goals.

The first goal is maximum employment. This generally means that everyone who wants a job can get one. The second goal is price stability, which the Federal Reserve defines as an inflation rate of 2 percent.¹ This allows the dollar in your pocket to hold its value over time. Taken together, we call this our dual mandate: maximum employment and price stability.

So given that mandate and our two goals, it's reasonable to ask, how's the Fed been doing?

Let's start with the overall health of the economy. We're on track to set a record for the longest period without a recession in U.S. history. It will extend past the 10-year mark this summer. The economy looks to have grown just over 3 percent in 2018, well above its sustainable pace. And while I see some signs of slowing on the horizon this year, I expect annual growth will come in around 2 percent—in line with its long-run trend.²

The strength of the economy has led to a robust labor market. In fact, the performance of the labor market has been nothing short of extraordinary. For example, last year we saw nearly 2.7 million jobs added to the payrolls. In addition to being a big number, that's more than twice the amount we need to keep pace with new entrants and reentrants coming in to the labor force.³ Meanwhile, unemployment remains near its 50-year low.

¹ Board of Governors (2012).

² Fernald (2019).

³ Bidder, Mahedy, and Valletta (2016).

Economic models—as well as historical data—tell us that a prolonged economic expansion and a very tight labor market should be pushing inflation up to, or even above, our 2 percent goal. But that’s not what we’re experiencing today. Inflation has remained low—lower than our 2 percent target—for most of the past decade. We’ve grazed 2 percent here and there, including briefly last year. But it hasn’t been sustainable.

So on our dual mandate report card, I feel good about where we are on employment—but a little less so about inflation.

Disrupted Links

So what’s up with inflation? Is it time to throw out our models and start from scratch? Have the fundamental laws of supply and demand broken down? And what does all of this mean for monetary policy? That’s what I’m going to spend the rest of my time today addressing—the inflation puzzle and what we should make of it.

Let’s start by considering how the links between employment and inflation have traditionally functioned. To do that, we have to go back to Econ 101, and review how monetary policy affects the economy.

In short, the Federal Reserve sets interest rates. These interest rates determine borrowing costs. Borrowing costs drive consumer and business spending, which in turn determines the level of economic activity. When economic activity is high, the labor market heats up. A hot labor market allows workers to demand higher wages. And employers pass these wage gains on to consumers in the form of higher prices.

Those are the basics of how things work—in theory, at least. But as a policymaker, I have to focus on the practical. And in the real world, things crop up that disrupt the simple linkages between monetary policy and the economy. Because I’m an economist, I like to call these things “wedges.” And understanding these wedges goes a long way toward understanding the inflation puzzle we’re facing.

Wage and Price Wedges

While there are several wedges that complicate the simple theory connecting monetary policy to the economy, the ones I will focus on today relate to employment, wages, and prices.

As a Reserve Bank President, I spend a lot of time talking to businesses, workers, and community members about what they're experiencing. And what's loud and clear these days is that the labor market is changing.

An example I hear again and again is the increasing demand from employees for alternative forms of compensation. Employers are being asked to provide benefits like free transportation, flexible workweeks, unlimited time off, and help with things like student loan repayment and even housing. Many employers are providing these benefits in an effort to attract and retain talent. And for some firms, they've become a meaningful part of employee compensation packages.

The challenge for policymakers is that these alternative forms of payment aren't being captured in the traditional measures we use to track wages and salaries.

This creates a wedge between the strong labor market we observe and our available indicators of wage growth, and it mutes the signal we're receiving about the strength of the economy.

Another important wedge that's been evolving over several decades is the loss of worker bargaining power.⁴ Declining unionization—along with increased automation and globalization—have made it harder for workers to push for higher pay, even in very healthy job markets.⁵ This weakens the link between employment and wage growth.

Of course, workers aren't the only group affected by these changing dynamics. Many firms have lost pricing power in a global marketplace, facing ever-increasing

⁴ Krueger (2018) and Farber et al. (2018).

⁵ Haldane (2018).

competition to hold onto customers.⁶ This means they have a harder time passing along rising costs, such as wages, to final goods prices.

All of these wedges are contributing to the situation we have today: a strong economy with a tight labor market—but muted inflation.⁷

The Fed Wedge

There's another wedge weakening the link between economic activity and inflation, and it might surprise you. It's the Fed.

The actions of the Federal Reserve—and the success of its monetary policymaking decisions—have played an important role in keeping inflation tethered around 2 percent, in good times and bad.

To explain how, we need to go back to one of those bad times. In the 1970s, a series of economic shocks hit. One shock was an oil embargo that pushed up oil prices. Because of the cost-of-living adjustments written into many workers' contracts, this automatically translated into wage increases. These wage increases led to price increases. And when the Fed didn't react aggressively enough to stem the rising inflation, a vicious cycle began.

People started to think high inflation was just a fact of life. Inflation eventually peaked in the double digits. It wasn't until the Fed raised interest rates dramatically that inflation finally started to decline. But, as some will remember, that was a painful process.

Once inflation was under control, the Fed committed to keeping it that way. This commitment became a well-known and accepted position that people could depend on. And it ushered in the conditions that dominate today—the era of well-anchored inflation expectations.

⁶ Cavallo (2018), Guerrieri, Gust, and López-Salido (2010), and Rogoff (2006).

⁷ Hooper, Mishkin, and Sufi (2019), Galí and Gambetti (2018), Leduc and Wilson (2017), Blanchard (2016), and Coibion and Gorodnichenko (2015).

We see this shift in the data. Inflation expectations—of both businesses and consumers—started trending down in the late 1980s, and have remained close to the Fed’s 2 percent target since the mid-1990s.⁸

Well-anchored inflation expectations have great benefits. When people know that the Fed is committed to keeping inflation at 2 percent, they’re more likely to see inflation fluctuations as temporary, and stop short of building them into contracts like wage and rental agreements.

In other words, when the Fed is credible, it’s easier for the economic system to absorb shocks. This keeps inflation from plummeting when the economy is weak, and a lid on inflation when the economy is strong.⁹

But here’s the twist. When the Federal Reserve is doing its job well, the link between economic activity and inflation is weaker—much like we see today. This is the essence of the “Fed wedge.”

Maintaining Credibility in a Low-Inflation Environment

So what does all of this mean for monetary policy?

As I mentioned earlier, inflation has generally been low for the past decade. In fact, for the past seven years, inflation has consistently come in below our 2 percent target.

This may not seem like much of a problem at first glance. After all, isn’t it a good thing when prices stay roughly the same?

But too-low inflation has its own risks. It makes the chance of deflation—or negative inflation—more likely. And it makes it harder for the Fed to adjust interest rates in the face of economic shocks.¹⁰

⁸ Andreasen and Christensen (2016), Nechio (2015), and Williams (2006).

⁹ Jordà et al. (2019).

¹⁰ Bernanke (2002).

The bigger problem is that the Fed has explicitly stated that 2 percent is our goal, and that this goal is symmetric. This means we care just as much about long periods of *too-low* inflation as we do about long periods of *too-high* inflation.¹¹

Inflation consistently below target tugs at inflation expectations. While there is no sign today that the anchor has drifted down significantly, we are seeing signs that inflation expectations are edging lower.¹² This bears close watching.

We need to be vigilant on this front, and work to deliver 2 percent inflation on a sustained basis. The Federal Reserve's continued credibility with consumers and businesses depends on it.

Conclusion

Let me end with a few closing thoughts. The Federal Reserve's credibility is one of our most important assets. It isn't just about having people believe the things we say—though of course that's important. Fed credibility is the foundation of our ability to make effective monetary policy.

The American people put a lot of trust in the Federal Reserve System. We worked hard to earn that trust. We intend to keep earning it every day.

Thank you.

¹¹ Board of Governors (2019).

¹² Daly (2019), Williams (2019), and Cao and Shapiro (2016).

References

- Andreasen, Martin M., and Jens H.E. Christensen. 2016. “TIPS Liquidity and the Outlook for Inflation.” *FRBSF Economic Letter* 2016-35 (November 21). <https://www.frbsf.org/economic-research/publications/economic-letter/2016/november/tips-liquidity-and-the-outlook-for-inflation/>
- Bernanke, Ben S. 2002. “Deflation: Making Sure ‘It’ Doesn’t Happen Here.” Remarks before the National Economists Club, Washington, DC, November 21. <https://www.federalreserve.gov/boarddocs/speeches/2002/20021121/>
- Bidder, Rhys, Tim Mahedy, and Rob Valletta. 2016. “Trend Job Growth: Where’s Normal?” *FRBSF Economic Letter* 2016-32 (October 24). <https://www.frbsf.org/economic-research/publications/economic-letter/2016/october/trend-job-growth-where-is-normal/>
- Blanchard, Olivier. 2016. “The Phillips Curve: Back to the ‘60s?” *American Economic Review* 106(5), pp. 31–34.
- Board of Governors of the Federal Reserve System. 2012. “Federal Reserve issues FOMC statement of longer-run goals and policy strategy.” Press release, January 25. <https://www.federalreserve.gov/newsevents/pressreleases/monetary20120125c.htm>
- Board of Governors of the Federal Reserve System. 2019. “Federal Reserve issues FOMC statement.” Press release, March 20. <https://www.federalreserve.gov/newsevents/pressreleases/monetary20190320a.htm>
- Cao, Yifan, and Adam Hale Shapiro. 2016. “Energy’s Impact on Inflation Expectations.” *FRBSF Economic Letter* 2016-19 (June 20). <https://www.frbsf.org/economic-research/publications/economic-letter/2016/june/energy-prices-and-inflation-expectations/>
- Cavallo, Alberto. 2018. “More Amazon Effects: Online Competition and Pricing Behaviors.” Federal Reserve Bank of Kansas City 2018 Economic Policy Symposium, Jackson Hole, WY, August 25. [https://www.kansascityfed.org/~media/files/publicat/sympos/2018/amazon%20effect_cavallo_final.pdf](https://www.kansascityfed.org/~/media/files/publicat/sympos/2018/amazon%20effect_cavallo_final.pdf)
- Coibion, Olivier, and Yuriy Gorodnichenko. 2015. “Is the Phillips Curve Alive and Well after All? Inflation Expectations and the Missing Disinflation.” *American Economic Journal: Macroeconomics* 7(1), pp. 197–232.
- Daly, Mary C. 2019. “Prospects for Inflation in a High Pressure Economy: Is the Phillips Curve Dead or Is It Just Hibernating?” Slides presented at the 2019 U.S. Monetary Policy Forum, New York, February 22. <https://www.frbsf.org/our-district/press/presidents-speeches/mary-c-daly/2019/february/prospects-for-inflation-in-a-high-pressure-economy-is-the-phillips-curve-dead-or-is-it-just-hibernating/>

- Farber, Henry S., Daniel Herbst, Ilyana Kuziemko, and Suresh Naidu. 2018. “Unions and Inequality over the Twentieth Century: New Evidence from Survey Data.” NBER Working Paper 24587.
- Fernald, John. 2019. “FedViews, March 22.” Federal Reserve Bank of San Francisco. <https://www.frbsf.org/economic-research/publications/fedviews/2019/march/march-14-2019/>
- Galí, Jordi, and Luca Gambetti. 2018. “Has the U.S. Wage Phillips Curve Flattened? A Semi-Structural Exploration.” Forthcoming in *Changing Inflation Dynamics, Evolving Monetary Policy*, eds. J. Gali and D. Saravia. Santiago: Central Bank of Chile. http://www.crei.cat/wp-content/uploads/2019/03/ggchile_october2018-1.pdf
- Guerrieri, Luca, Christopher Gust, and J. David López-Salido. 2010. “International Competition and Inflation: A New Keynesian Perspective.” *American Economic Journal: Macroeconomics* 2(4), pp. 247–280.
- Haldane, Andrew G. 2018. “Market Power and Monetary Policy.” Speech delivered at the Federal Reserve Bank of Kansas City 2018 Economic Policy Symposium, Jackson Hole, WY, August 24. <https://www.kansascityfed.org/~media/files/publicat/sympos/2018/papersandhandouts/market-power-and-monetary-policy-speech-by-andy-haldane.pdf>
- Hooper, Peter, Frederic S. Mishkin, and Amir Sufi. 2019. “Prospects for Inflation in a High Pressure Economy: Is the Phillips Curve Dead or Is It Just Hibernating?” Paper presented to the U.S. Monetary Policy Forum, New York, February 22. <https://research.chicagobooth.edu/igm/usmpf/usmpf-paper>
- Jordà, Òscar, Chitra Marti, Fernanda Nechio, and Eric Tallman. 2019. “Inflation: Stress-Testing the Phillips Curve.” *FRBSF Economic Letter* 2019-05 (February 11). <https://www.frbsf.org/economic-research/publications/economic-letter/2019/february/inflation-stress-testing-phillips-curve/>
- Krueger, Alan B. 2018. “Reflections on Dwindling Worker Bargaining Power and Monetary Policy.” Luncheon address to the Federal Reserve Bank of Kansas City 2018 Economic Policy Symposium, Jackson Hole, WY, August 24. <https://www.kansascityfed.org/~media/files/publicat/sympos/2018/kcfedlunchremarks-aspreparedfordeliveryv2.pdf>
- Leduc, Sylvain, and Daniel J. Wilson. 2017. “Has the Wage Phillips Curve Gone Dormant?” *FRBSF Economic Letter* 2017-30 (October 16). <https://www.frbsf.org/economic-research/publications/economic-letter/2017/october/has-wage-phillips-curve-gone-dormant/>
- Nechio, Fernanda. 2015. “Have Long-Term Inflation Expectations Declined?” *FRBSF Economic Letter* 2015-11 (April 6). <https://www.frbsf.org/economic-research/publications/economic-letter/2015/april/low-long-term-inflation-survey-based-forecast/>
- Rogoff, Kenneth. 2006. “Impact of Globalization on Monetary Policy.” In *The New Economic Geography: Effects and Policy Implications*, proceedings of the 2006 Economic Policy Symposium, Jackson Hole, WY. Kansas City: Federal Reserve Bank of Kansas City, pp. 265–305. <https://www.kansascityfed.org/Publicat/Sympos/2006/PDF/19Rogoff.pdf>

Williams, John C. 2006. "Inflation Persistence in an Era of Well-Anchored Inflation Expectations." *FRBSF Economic Letter* 2006-27 (October 13).

<https://www.frbsf.org/economic-research/publications/economic-letter/2006/october/inflation-persistence-in-an-era-of-well-anchored-inflation-expectations/>

Williams, John C. 2019. "Discussion of 'Prospects for Inflation in a High Pressure Economy: Is the Phillips Curve Dead or Is It Just Hibernating?' by Peter Hooper, Frederic S. Mishkin, and Amir Sufi." Remarks at the U.S. Monetary Policy Forum, New York, February 22.

<https://www.newyorkfed.org/newsevents/speeches/2019/wil190222>