# FRBSF Economic Letter

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# U.S. Monetary Policy: An Introduction

### Part 2: What are the goals of U.S. monetary policy?

This is the second of four consecutive issues devoted to our updated and expanded Q&A on monetary policy: (1) "How is the Federal Reserve structured?" and "What are the tools of U.S. monetary policy?" (2) "What are the goals of U.S. monetary policy?" (3) "How does monetary policy affect the U.S. economy?" and (4) "How does the Fed decide the appropriate setting for the policy instrument?" The revised text will appear in a pamphlet soon.

Monetary policy has two basic goals: to promote "maximum" sustainable output and employment and to promote "stable" prices. These goals are prescribed in a 1977 amendment to the Federal Reserve Act.

### What do maximum sustainable output and employment mean?

In the long run, the amount of goods and services the economy produces (output) and the number of jobs it generates (employment) both depend on factors other than monetary policy. These factors include technology and people's preferences for saving, risk, and work effort. So, maximum sustainable output and employment mean the levels consistent with these factors in the long run.

But the economy goes through business cycles in which output and employment are above or below their long-run levels. Even though monetary policy can't affect either output or employment in the long run, it can affect them in the short run. For example, when demand weakens and there's a recession, the Fed can stimulate the economy—temporarily—and help push it back toward its long-run level of output by lowering interest rates. That's why stabilizing the economy—that is, smoothing out the peaks and valleys in output and employment around their long-run growth paths—is a key short-run objective for the Fed and many other central banks.

## If the Fed can stimulate the economy out of a recession, why doesn't it stimulate the economy all the time?

Persistent attempts to expand the economy beyond its long-run growth path will press capacity constraints and lead to higher and higher inflation, without producing lower unemployment or higher output in the long run. In other words, not only are there no long-term gains from persistently pursuing expansionary policies, but there's also a price—higher inflation.

#### What's so bad about higher inflation?

High inflation is bad because it can hinder economic growth, and for a lot of reasons. For one thing, it makes

it harder to tell what a change in the price of a particular product means. For example, a firm that is offered higher prices for its products can have trouble telling how much of the price change is due to stronger demand for its products and how much reflects the economy-wide rise in prices.

Moreover, when inflation is high, it also tends to vary a lot, and that makes people uncertain about what inflation will be in the future. That uncertainty can hinder economic growth in a couple of ways—it adds an inflation risk premium to long-term interest rates, and it complicates further the planning and contracting by businesses and households that are so essential to capital formation.

That's not all. Because many aspects of the tax system are not indexed to inflation, high inflation distorts economic decisions by arbitrarily increasing or decreasing after-tax rates of return to different kinds of economic activities. In addition, it leads people to spend time and resources hedging against inflation instead of pursuing more productive activities.

Another problem is that a surprise inflation tends to redistribute wealth. For example, when loans have fixed rates, a surprise inflation redistributes wealth from lenders to borrowers, because inflation lowers the real burden of making a stream of payments whose nominal value is fixed.

#### So should the Fed try to get the inflation rate to zero?

Actually, there's a lot of debate about that. While some economists have suggested zero inflation as a target, others argue that an inflation rate that's too low can be a problem. For example, if inflation is very low or close to zero, then short-term interest rates also are likely to be very close to zero. In that case, the Fed might not have enough room to lower short-term interest rates if it needed to stimulate the economy. Of course, the Fed could conduct policy using more unconventional methods (such as trying to reduce long-term interest rates), but it's not clear that those methods would be as easy to

use or as effective. Another problem is that, when inflation is very close to zero, there's a bigger risk of deflation.

#### What's so bad about deflation?

First, let's talk about the difference between disinflation and deflation. Disinflation just means that the rate of inflation is slowing—say, from 3% a year to 2% a year. Deflation, in contrast, means that there's a fall in prices; and it's not just a fall in prices in some sectors—like the familiar falling prices of a lot of computer equipment. Rather, in a deflation, prices are falling throughout the economy, so the inflation rate is negative. That may sound good, if you're a consumer.

But, in fact, deflation can be as bad as too much inflation. And the reasons are pretty similar. For example, to go back to the case of the fixed-rate loan, a surprise deflation also redistributes wealth, but in the opposite direction from inflation, that is, from borrowers to lenders. The reason is that deflation raises the real burden of making a stream of payments whose nominal value is fixed.

A substantial, prolonged deflation, like the one during the Great Depression, can be associated with severe problems in the financial system. It can lead to significant declines in the value of collateral owned by households and firms, making it more difficult to borrow. And falling collateral values may force lenders to call in outstanding loans, which would force firms to cut back their scale of operations and force households to cut back consumption.

Finally, in a deflationary episode, interest rates are likely to be lower than they are during periods of low inflation, which means that the Fed's ability to stimulate the economy will be even more limited.

#### So that's why the other goal is "stable prices"?

Yes. Price "stability" is basically a low-inflation environment where people and firms can make financial decisions without worrying about where prices are headed. Moreover, this is all the Fed can achieve in the long run.

#### If low inflation is the only thing the Fed can achieve in the long run, why isn't it the sole focus of monetary policy?

Because the Fed can determine the economy's average rate of inflation, some commentators—and some members of Congress as well—have emphasized the need to define the goals of monetary policy in terms of price stability, which is achievable.

But the Fed, of course, also can affect output and employment in the short run. And big swings in output and employment are costly to people, too. So, in practice, the Fed, like most central banks, cares about both inflation and measures of the short-run performance of the economy.

#### Are the two goals ever in conflict?

Yes, sometimes they are. One kind of conflict involves deciding which goal should take precedence at any point in time. For example, suppose there's a recession and the Fed works to prevent employment losses from being too severe; this short-run success could turn into a long-run problem if monetary policy remains expansionary too long, because that could trigger inflationary pressures. So it's important for the Fed to find the balance between its short-run goal of stabilization and its longer-run goal of maintaining low inflation.

Another kind of conflict involves the potential for pressure from the political arena. For example, in the day-to-day course of governing the country and making economic policy, politicians may be tempted to put the emphasis on short-run results rather than on the longer-run health of the economy. The Fed is somewhat insulated from such pressure, however, by its independence, which allows it to strive for a more appropriate balance between short-run and long-run objectives.

### Why don't the goals include helping a region of the country that's in recession?

Often, some state or region is going through a recession of its own while the national economy is humming along. But the Fed can't concentrate its efforts on expanding the weak region for two reasons. First, monetary policy works through credit markets, and since credit markets are linked nationally, the Fed simply has no way to direct stimulus only to a particular part of the country that needs help. Second, if the Fed stimulated whenever any state had economic hard times, it would be stimulating much of the time, and this would result in excessive stimulation for the overall country and higher inflation.

But this focus on the well-being of the national economy doesn't mean that the Fed ignores regional economic conditions. It relies on extensive regional data and anecdotal information, along with statistics that directly measure developments in regional economies, to fit together a picture of the national economy's performance. This is one advantage to having regional Federal Reserve Bank Presidents sit on the FOMC: They're in close contact with economic developments in their regions of the country.

Why don't the goals include trying to prevent stock market "bubbles" like the one at the end of the 1990s?

In theory, stock prices should reflect the value of firms' "fundamentals," such as their expected future earnings. So it's hard to come up with logical explanations for why they would get out of line, that is, why a bubble

would form. After all, U.S. stock markets are among the most efficient in the world—there's a lot of information available and the trading mechanisms function very smoothly. And stock market analysts and others devote huge amounts of resources to figuring out what the appropriate price of a stock is at any point in time.

Even so, it's hard to deny the evidence of *mispricing* from episodes like the rise and fall of the Nasdaq over the last decade or so: it went from a monthly average of a little more than 750 in January 1995 to a peak of just over 4,800 in March 2000, before falling back to roughly 1,350 in March 2003. Unfortunately, evidence of a bubble is easy to find after it has burst, but it's much harder to find as the bubble is forming. The reason is that policymakers—and other observers—can find it hard to tell whether stock prices are moving up because fundamentals are changing or because prices are out of line with fundamentals.

Even if the Fed *suspected* that a bubble had developed, it's not clear how monetary policy should respond. Raising the funds rate by a quarter, a half, or even a full percentage point probably wouldn't make people slow down their investments in the stock market when individual stock prices are doubling or tripling and even broad stock market indexes are going up by 20% or 30% a year. It's likely that raising the funds rate enough to burst the bubble would do significant harm to the economy. For instance, some have argued that the Fed may have worsened the Great Depression by trying to deflate the stock market bubble of the late 1920s.

#### Should the Fed ignore the stock market then?

Not at all. Stock markets provide information about the future course of the economy that the Fed may find useful in conducting policy. For instance, a sustained increase in the stock market is likely to make households feel wealthier, which tends to make them increase their consumption. And if the economy were already at full capacity, this would cause inflationary pressures. So a sustained increase in the stock market could lead the Fed to modify its inflation and output forecasts and adjust its policy response accordingly.

Beyond concerns about the economy, the Fed also pays attention to the stock market because of its concerns about financial market stability. A good example of this is what happened after the stock market crash of 1987. At that time, the Fed cut interest rates and stated that it was ready to supply the liquidity needs

of the market because it wanted to ensure that markets would continue to function.

#### Suggested reading

For further discussion of the topics in this article, see the following issues of the FRBSF Economic Letter.

- 93-21 "Federal Reserve Independence and the Accord of 1951," by Carl Walsh. http://www.frbsf.org/publications/economics/letter/1993/el93-21.pdf
- 93-44 "Inflation and Growth," by Brian Motley. http://www.frbsf.org/publications/economics/letter/1993/el93-44.pdf
- 94-05 "Is There a Cost to Having an Independent Central Bank?" by Carl Walsh. http://www.frbsf.org/publications/economics/letter/1994/el94-05.pdf
- 94-25 "Should the Central Bank Be Responsible for Regional Stabilization?" by Timothy Cogley and Desiree Schaan. http://www.frbsf.org/publications/economics/letter/1994/el94-25.pdf
- 95-16 "Central Bank Independence and Inflation," by Robert T. Parry. http://www.frbsf.org/publications/ economics/letter/1995/el1995-16.pdf
- 97-01 "Nobel Views on Inflation and Unemployment," by Carl Walsh. http://www.frbsf.org/econrsrch/wklyltr/el97-01.html
- 97-27 "What Is the Optimal Rate of Inflation?" by Timothy Cogley. http://www.frbsf.org/econrsrch/wklyltr/el97-27.html
- 98-04 "The New Output-Inflation Trade-off," by Carl Walsh. http://www.frbsf.org/econrsrch/wklyltr/wklyltr98/el98-04.html
- 99-04 "The Goals of U.S. Monetary Policy," by John Judd and Glenn Rudebusch. http://www.frbsf.org/econrsrch/wklyltr/wklyltr99/el99-04.html
- 2000-24 "Should Central Banks Stabilize Prices?" by Carl Walsh. http://www.frbsf.org/econrsrch/wklyltr/ 2000/el2000-24.html
- 2001–03 "Inflation: The 2% Solution," by Milton Marquis. http://www.frbsf.org/publications/economics/letter/ 2001/el2001–03.html

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