# Unconventional Behavior

## Innovative balance sheet policies of central banks helped during the recession, but they should be used only in exceptional circumstances

Mark Stone, Kenji Fujita, and Kotaro Ishi

N early 2009 the U.S. Federal Reserve was in a quandary. The United States was locked in the second year of a recession, and things were not improving. The standard action would have been to reduce short-term interest rates to stimulate consumer and business demand. But the crisis had brought short-term interest rates to near zero, and they could go no lower.

So the Fed, as the U.S. central bank is called, turned to a policy it had not used since World War II. It bought long-term public bonds directly for its portfolio in exchange for newly created reserve money, expanding its balance sheet to fight the recession (see "Uncharted Territory," F&D, June 2009).

A large-scale bond purchase program, often called quantitative easing, was perhaps the best known of a number of unconventional ways central banks in advanced economies used their balance sheets during the global crisis to deal with a substantial risk of deflation when monetary policy was unable to lower rates further. Faced with profound and varied disruptions to financial markets and real economies, several advanced economy central banks also launched various liquidity provision programs, including ones to keep markets open, to rescue banks and nonbank financial institutions, and to supply needed foreign exchange. These policies also swelled the size of central bank balance sheets to unprecedented levels.

Overall, the balance sheet policies can be deemed a success, at least in preventing the downward spiral of financial and economic crises. Growth has resumed—albeit at an anemic rate in most advanced economies. But that success does not mean these policies should become part of the standard central bank arsenal. The crisis called for measures that pose risks to financial markets and even to the central banks themselves that are too big to take on except in exceptional circumstances.

#### Policies for macroeconomic stability

For at least a generation, the Fed had used its ability to control short-term interest rates to smooth the U.S. economy. It controlled the short-term interest rate that prevails in the money markets by withdrawing or injecting reserve money that banks are required to keep on deposit with the Fed. Changes in the so-called federal funds rate (at which banks short of reserves borrow overnight from banks with excess reserves) translate into changes in other short-term, as well as longer-term, interest rates that affect the cost of borrowing for households and businesses.

But with the federal funds rate near zero, the Fed had run out of traditional options. So it bought long-term public bonds-trying to boost the economy by directly lowering long-term interest rates. When the Fed buys long-term bonds from banks or other financial institutions in exchange for newly created dollars (in the form of reserves), it reduces the market supply of those bonds. That raises the price of the bonds remaining in the market—and reduces their yield. Yields on other long-term securities go down in concert with government bond yields, making borrowing less expensive. The aim is to raise the potential of banks to lend and boost asset values, thereby lifting domestic demand and boosting economic growth. The Fed conducted two rounds of largescale bond purchase programs: one from March 2009 to May 2010, the other from November 2010 to June 2011. There is considerable evidence that the bond purchase program (at least the first round) lowered yields and probably furthered the U.S. recovery. Because of the importance of the U.S. economy, the program almost surely moderated the global downturn. The Bank of England also undertook a bond purchase program although it stopped earlier than did the Fed.

The impact of the bond purchase program on Fed asset holdings is much more significant than that of its conventional operations. The overall amount of reserves does not change much in the Fed's traditional monetary operations to target the federal funds rate. But the bond purchase program changed the size and composition of its balance sheet.

#### Policies for financial stability

It is the power of central banks to create unlimited amounts of reserves—the most liquid of all assets—that gives them the unique capacity to prevent liquidity problems in the financial sector from carrying over to the real economy—that is, to maintain systemic financial stability. Traditionally, central banks have served as a lender of last resort to solvent but cash-short banks and, if necessary, to the banking system as a whole. During the recent crisis the central bank role of providing liquidity to ensure financial stability greatly expanded. Not only did the central banks aid commercial banks, they also lent to large nonbank financial institutions. A few major central banks—especially the Fed—also became market makers of last resort by accepting as collateral securities that could not be sold in the market in exchange for central bank loans. Even more out of the ordinary, many central banks supplied foreign exchange, mainly U.S. dollars, to local banks having difficulties raising funds in foreign currencies. The measures, aimed at supporting important financial markets and preserving financial stability, for the most part did ease liquidity constraints and support asset prices.

As the crisis receded, central banks began to undo many of the unconventional balance sheet operations. However, several advanced economy central banks—notably the Fed, the Bank of England, and the Bank of Japan—continue to carry large balance sheets.

### **Evaluating the policies**

Even though unconventional central bank balance sheet policies appear to have helped the U.S. and other advanced economies recover, they also may have had unintended consequences—some argued that they induced unwanted capital flows to some emerging market economies and helped cause commodity inflation. But these balance sheet policies also created risks to the central bank and to markets.

Injecting cash to support markets inherently involves credit risk that could cause losses for the central bank. Extensive central bank liquidity support can raise expectations of support in the future, and lead market players to make riskier decisions because they believe they will be bailed out if things go badly again. Extensive central bank injection of liquidity into a money market could also reduce the incentives of market players to trade among themselves, thereby diminishing the interbank and money markets, and eventually lead to a weak market infrastructure after the central bank exits.

A central bank can minimize these risks. For example, to contain credit risks it can value the collateral it accepts

based on appropriate risks. Balance sheet policies can also be implemented on a conditional basis for a limited duration and with a clearly communicated exit strategy to avoid unintended side-effects.

Large-scale bond purchases also carry potentially serious costs and risks. If bond yields rise, the central bank would suffer losses on the securities it owns. The bond purchase program may leave the central bank exposed to pressure from vested interests that benefit from bond purchases. And a strategy for selling the bonds or reducing bond holdings must be carefully designed, because it might cause a sharp increase in long-term yields, thus bringing about unintended monetary tightening effects. Perhaps most important, the bond purchase program can create the perception that the central bank is actually "monetizing" government debt, that is, permanently exchanging newly created money for government bonds. For example, the bond purchase program may be welcome by the government at its outset, as lower yields contribute to public finance saving, but once the central banks' policy focus shifts to tightening, there could be a conflict of interest between the central banks and government.

To address these risks, the objectives and broad framework of the bond purchase program should be established early on. In particular, central bank autonomy should be fully respected, and policymakers should have a clear understanding that central banks' bond purchases are not part of government spending and taxing policies and will be terminated and eventually unwound when monetary policy objectives are reached.

These considerations suggest that balance sheet policies will not lead to a new way of central banking in normal times. It is no coincidence that only highly credible central banks leaned heavily on these policies, most of which involved large increases in domestic liquid assets. And even for the highly credible central banks, balance sheet policies should be used only in special circumstances—such as when the economy is facing financial problems severe enough to disrupt the real sector, and the policy interest rate is stuck at the lower bound.

Unconventional balance sheet policies likely played an important role in helping economies recover from the most severe downturn since the Great Depression. Central banks showed creativity and no small degree of daring. Although the risks were probably worth taking, these policies should be used only by the most credible central banks—and then only rarely. It is important to remember that central bank policies are not a panacea, especially when the underlying problem is solvency. There is also a risk that central bank policies would reduce incentives for policymakers to tackle the underlying solvency problems.  $\blacksquare$ 

Mark Stone is a Deputy Division Chief and Kenji Fujita is a Senior Economist in the IMF's Monetary and Capital Markets Department. Kotaro Ishi is a Senior Economist in the IMF's European Department.

This article is based on "Should Unconventional Balance Sheet Policies be Added to the Central Bank Toolkit? A Review of the Experience So Far," an IMF Working Paper by Mark Stone, Kenji Fujita, and Kotaro Ishi issued in June 2011.