Thank you Mr. Chairman, Ranking Member Moore, and members of the committee.

The ability to pay interest on reserves is an important policy tool, and Congress’ authorization of these payments in 2006 was a welcome development.

In the aftermath of the financial crisis, the Fed has come to rely more heavily on this tool than was previously anticipated.

Because paying interest on reserves is still relatively new in the U.S., there is naturally some uncertainty in the minds of both the public and policy makers about the implications of this tool.

In my comments today, I will argue that continuing to pay interest on both required and excess reserves is not only essential for the implementation of monetary policy, but also sound economic policy.

I will focus on 4 key points.

1) *Paying interest on excess reserves has no cost to the taxpayer.*

To understand this statement, it is helpful to walk through the mechanics of how bank reserves are created using a simple example.

Imagine we start with a situation in which I personally own a U.S. Treasury bond. Then the U.S. government regularly pays interest on this bond to me.

Now suppose that I decide to sell this bond and that the Fed purchases my bond. When this transaction takes place, the Fed credits my bank with reserves equal to the value of the bond, and my bank credits my account with the same amount.

In this new situation, the Treasury pays interest on the bond to the Fed, the Fed pays interest on the reserves to my bank, and my bank pays interest on my deposit to me.
In other words, the Fed paying interest on reserves is a link in a chain of payments that replaces interest payments the Treasury would otherwise be making directly to bondholders.

Seen this way, the operation clearly creates no new cost to the taxpayer. In fact, since the interest rate on excess reserves is generally lower than the interest rate on longer-term Treasury bonds, the operation creates a net gain for the taxpayer.

2) **Paying interest on excess reserves is not a subsidy to banks.**

Suppose I keep the money I received from the sale of the bond in my savings account. Then my bank would be earning 50 basis points on the newly-created reserves, but it would be paying me approximately 30 basis points on my new deposit.

My deposit also increases the bank’s costs indirectly, by raising the deposit insurance fees it must pay to the FDIC and by increasing its leverage.

Overall, the bank may make a small profit on this transaction, but to a first approximation it will roughly break even.

So, taking into account the costs as well as the benefits of my deposit shows that earning interest on its excess reserves does not represent a subsidy to the bank.

3) **Policy should be designed to encourage banks to hold excess reserves.**

Bank reserves are the lifeblood of our nation’s payments system. Every business day, more than $3 trillion of payments are made over the Fed’s large-value network.

Banks make these payments on behalf of their customers using the reserves they hold on deposit at the Fed.

Given this enormous volume of payments, the potential arises for bottlenecks, delays, and increased risks when there are insufficient reserves available for making them.

Prior to 2008, when no interest was paid on reserves, the Fed needed to create a scarcity of reserves to keep market interest rates positive.

In fact, reserves were so scarce that our payments system could not adequately function using those reserves alone.

Instead, the Fed permitted banks to run overdrafts in their reserve accounts for a few hours each day solely for the purpose of allowing the payments system to function effectively.

These overdrafts were large at times, with an average daily peak of more than $180 billion in 2007.
One byproduct of the large expansion of bank reserves that has occurred over the past few years is that these intraday overdrafts have fallen by more than 90%.

In addition, payments are, on average, being sent significantly earlier in the day, reducing delays and enhancing the resilience of the payments system.

This brings me to my final point:

4) The Fed’s balance sheet should remain larger than its pre-crisis level.

While the Fed’s balance sheet should and will shrink substantially from its current level, it would be a mistake to return to the pre-crisis approach of creating a scarcity of bank reserves to control interest rates.

There have been substantial changes in the financial system since 2008, including a greater awareness of liquidity risks and new regulations that are increasing banks’ demand for safe, liquid assets such as reserves.

Going back to the old approach of controlling interest rates by creating a scarcity of reserves not only runs counter to the goals of the new regulations, but also would likely be less effective in achieving the desired level of market interest rates than in the past.

In contrast, holding a moderately larger balance sheet large and relying primarily on the interest rate on excess reserves to steer market rates would be:

- a more effective way to implement monetary policy going forward

- while simultaneously promoting safety and efficiency in the payment network that underlies our financial system.

Thank you again for this opportunity to testify before you today. I would be happy to answer any questions.