1. Introduction

Thank you. I’m delighted to be here in northwest Indiana. This area has always been an important part of the regional economy — sort of an economic barometer for the industrial sector. So for someone like me who needs to keep up-to-date on the economy, it’s always useful to spend some time here. I’m particularly happy to be here tonight to help celebrate Purdue/Calumet’s 50th anniversary. I always welcome the chance to take part in a program involving a university. As you just heard, I spent a number of years in academia, most recently as a professor at Northwestern… a year I really enjoyed. The Chicago Fed has many other academic connections — as part of our various research efforts we work with a number of Midwestern universities. Maybe our strongest connection is with Purdue. One of our directors, Charlene Sullivan, is a professor at the Krannert Graduate School of Management at West Lafayette. Charlene offers a lot of valuable insights as a director — she’s one of the nation’s leading experts on consumer issues.

In spite of our academic orientation tonight, I decided against presenting a scholarly discussion of the latest advances in econometrics modeling. So in case any of you are thinking about slipping out the back door, I just want you to know ahead of time that I filed away my 150 dusty overheads… full of detailed equations.

Instead, I thought I’d try a less complicated approach. We’re here to celebrate Purdue/Calumet’s 50-year anniversary. Purdue/Cal is to be congratulated on reaching this historical milestone. Fifty years ago it was a small college without a building to call its own. Today, it’s a major university. In keeping with the occasion, I’d like to take an informal look back at the last five decades. Specifically, I’d like to discuss how the economy and the Federal Reserve as an economic policy maker have changed over the years. The Fed, like Purdue/Calumet, has learned and evolved. The Fed is very much a student, just like everyone else involved in determining economic policy. There’s always more to discover. But we have learned a valuable lesson during the past fifty years that I’d like to share with you a little later.

First, a bit of background. The Fed, of course, is the nation’s central bank. Our mission is to foster a safe and sound financial system and a healthy, growing economy with stable prices. More specifically, we formulate monetary policy… we supervise and regulate banks and bank holding companies… and we provide financial
services to banks and thrifts and the U.S. government. The Chicago Fed carries out these activities in a five-state region. That's most of Illinois, Indiana, Michigan, and Wisconsin, and all of Iowa. We have a head office in Chicago, branch in Detroit, regional offices in Indianapolis, Des Moines, and Milwaukee, and a new facility in Peoria.

The Fed's a relative newcomer in the central banking community. We're only 82 years old... a youngster compared with the other central banks of the major industrial nations. But we still had some three decades of experience by the time Purdue Cal was founded. Even so, we were still feeling our way — trying to figure out the proper role for the central bank. In fact, 1946 was an interesting time for the Fed because it was going through a bit of an early mid-life crisis.

II. 1946 to 1955

Actually, 1946 was quite a year for everyone... not just the Fed. The war had ended... it was an exciting, somewhat anxious, time for the nation. What happened that year?

- President Truman created the Atomic Energy Commission.
- Winston Churchill warned of an iron curtain descending over Europe.
- Scientists at the University of Pennsylvania introduced the first electronic computer, called ENIAC.
- A young musician named Alan Greenspan toured with a jazz band, the Henry Jerome Orchestra.
  Band members later noted that Greenspan was a pretty good saxophone player, but did an even better job as the band's bookkeeper.
- A highly decorated infantry commander who had served in the China-Burma Theater by the name of Norman Ross finished up his war service.
- And the Cubs finished a disappointing third place after having gone to the World Series the previous year.

Of course, people on the street were talking about the end of the war. We had 12 million GIs in service on VJ day. Only 3 million were still in uniform by August 1946. Many of these former servicemen went on to attend college, thanks in large part to the GI Bill. In fact, Purdue/Calumet was established to meet the needs of returning servicemen. Purdue/Cal had 50 students during its first school year. All but one were veterans enrolled under the GI Bill.

Many were concerned that we would fall back into a depression with the end of the war. The economy seemed sure to slow down... there was no more war production and millions of ex-GIs were looking for work.

There were a lot of questions. Congress provided part of the answer. It passed the Employment Act of 1946. The Act established the four goals of economic policy — economic growth, low inflation, high employment, and a reasonable balance in foreign trade. All admirable goals... the problem was trying to achieve them all at the same time. The Fed would struggle with how to achieve healthy, sustainable economic growth during the next 50 years.
The end of the war also triggered the Fed’s mid-life crisis, I mentioned before. The Fed played a key role in financing the war effort by buying bonds from the Treasury at a pre-determined price. This helped us win the war, but basically eliminated monetary policy. The only thing affecting the economy was fiscal policy… decisions made by Congress and the President. After the war, the question was the proper role of the Fed… whether monetary policy should be used to help the economy. The Employment Act of 1946 didn’t settle the question. It established policy goals but not how to accomplish these goals.

It was quite a debate. In fact, a young student at Princeton by the name of Paul Volcker contributed to the discussion. Volcker wrote in his undergraduate thesis that the Fed might as well be part of the Treasury if it wasn’t going to be responsible for monetary policy. By the way, someone dug up that paper when Volcker was Fed chairman and asked him why he no longer thought the Fed should be folded into the Treasury. Volcker replied, "One grows wiser with the years."

The debate was settled in 1951. The Treasury and the Fed reached what is known as the “Accord.” The Treasury agreed that fiscal policy and monetary policy would have a role. The Fed would be responsible for determining monetary policy.

After the Accord, the Fed focused on moderating the swings in the economy… smoothing the effects of the business cycle. Fed Chairman William McChesney Martin called this policy “leaning against the wind.” The Fed's role, he once said, was to “take the punch bowl away just as the party is getting started.”

As it turned out, we shouldn't have worried about the economy in 1946. We generally experienced prosperity and growth during the next ten years. In retrospect, some have called this the beginning of a golden era for the economy… and for monetary policy.

III. 1956 to 1965

The nation generally continued to prosper during the next decade of 1956 to 1965. Looking back, we tend to think of 1956 as a simpler time… a time of “Leave it to Beaver” and “Ozzie and Harriet.” But quite a bit occurred that year.

- President Eisenhower sent federal troops into Little Rock, Arkansas, to enforce desegregation efforts.
- Senator Joe McCarthy died.
- The Soviet Union launched Sputnik.
- Dr. Seuss published “The Cat in the Hat.”
- Purdue/Cal continued to grow, and now had two relatively new campus buildings. And the Cubs finished in eighth place, 33 games behind the pace.

On the economic front, it was a decade of prosperity and stable banking conditions. The Fed continued its education in the relatively new art of monetary policy. In general, both monetary policy and fiscal policy were designed to encourage growth.
We did experience some rocky times. There was a recession in 1957 and another in 1960. But then the U.S. went eight years without a recession. That was the longest peace-time expansion in history up to that point. Interest rates were remarkably stable and inflation was moderate. By 1965, though, the U.S. began a rapid escalation in Vietnam. This started to put pressure on the nation's resources. It was the beginning of a hard lesson we would learn in the next decade. The golden era was coming to an end.

IV. 1966 to 1975

Moving now to the next decade, 1966 through 1975. 1966 was a difficult time in many ways, both for the nation and the economy.

- The city of Los Angeles tried to recover from the riots in Watts that led to 35 dead and 4,000 arrests.
- LBJ was in his second term as president.
- Miniskirts were in fashion.
- Transistor radios were playing “Strangers in the Night” and “The Ballad of the Green Berets.”

Students demonstrated against the Vietnam War, although things were relatively quiet at Purdue/Cal. In fact, a few years later the White House issued a letter of praise to the Purdue/Cal student body for their peaceful protest of budget cuts. And the Cubs hired a new manager, Leo Durocher. Leo declared in spring training that the Cubs weren’t an eighth place team, despite their record in 1965. And he was right — the Cubs finished in tenth place.

We saw the build-up in Vietnam and high and persistent inflation during the decade. We tried to have a “guns and butter economy”… fighting the North Vietnamese overseas and declaring a war on poverty at home.

The result was not a surprise. In its annual report in 1967, the Chicago Fed noted the potential problems of a “greatly expanded military effort being superimposed on a booming private economy.” By 1968, the Chicago Fed was reporting that “interest rates were at a new high in the experience of today’s generation.” As it turned out, we hadn’t seen anything yet.

In 1973, OPEC announced an oil embargo… the latest in a series of severe blows to the economy. We ended up with a double whammy of high inflation and slow economic growth. Economists coined a new word to describe the phenomenon — stagflation. The old idea of trading off some inflation for more jobs was not working. Instead, we had the worst of both worlds.

We tried to restrain inflation by using wage and price controls in 1971. This is one area where I had some personal experience. I began working in government after teaching college economics for a number of years. I eventually became involved in containing inflation as director of the Council on Wage and Price Stability.

Well, the wage and price controls were a dismal failure. If nothing else, the experience provided me with a real-life verification of my academic training. One always hopes to play some role in an important event, but this wasn't exactly what I had in mind when I moved to government. It was like trying to tape gravy to the
Despite our best intentions to seal and patch, inflation oozed out. It highlighted to me how complex our economy is. It also highlighted the futility of relying on gimmicks to contain inflation. The importance of stopping inflation before it got out of hand was very clear. Once the genie is out of the bottle, it's difficult to squeeze back in.

The Fed also recognized that controls were not the answer. Fed Chairman Arthur Burns testified that the “painful” 1974-75 recession “could have been avoided if inflation had not gotten out of control.” If the economy had not grown so fast that it moved beyond what was sustainable — above its potential — then inflationary pressures could have been contained. But that's not what happened, and policy makers learned an important lesson during this historical episode.

V. 1976 to 1985

That brings us to the next decade — 1976 through 1985. We entered our bicentennial year uncertain about the economy. It was another year of many changes.

- Jimmy Carter was elected president.
- The United States and the Soviet Union signed a treaty limiting underground nuclear explosions.
- North and South Vietnam were combined after 22 years of separation.
- The U.S. celebrated the bicentennial, with more than six million watching the tall ships from 31 nations parade up the Hudson River.
- And Purdue/Cal continued to grow, with enrollment now over 4,000.

There was one area where things did not change — the Cubs finished in fourth place …26 games behind the pace.

The economy also continued to struggle. In 1979, the U.S. was hit by another oil embargo …inflation hit 13 percent. Something needed to be done. Inflation was feeding on itself. By this time I was in the private sector. I saw first-hand how inflation distorted judgments. Discipline in cutting costs flew out the window because it was easier to recoup costs by raising prices. I guess we reached the high point, or low point, when the price of silver peaked at over $50 an ounce.

A dramatic move was needed. Paul Volcker had been appointed Fed chairman in July of 1979. Volcker called an emergency meeting of the FOMC for Saturday, October 6, 1979. The FOMC, the Fed's most important policy making body, gathered in Washington, D.C. Members were located in different hotels around the city to avoid publicity. Volcker announced a dramatic change in the Fed's operating procedures after the meeting. The Fed would set a target for growth of the money supply instead of targeting a specific level for interest rates. The change indicated the Fed's determination to squeeze inflation from the economy once and for all. The response in the marketplace was an immediate sharp increase in the entire spectrum of interest rates.
The economy slowed and the U.S. entered into a sharp recession… one that was particularly painful for the Midwest. But inflation did begin to subside. The economy recovered. By 1983, Volcker was able to report to Congress that the “inflation tide has turned in a fundamental way.”

The Fed had broken the back of inflation, though at a high cost. The economy went on to grow for nine years without a recession… the longest peace-time expansion in history. The Fed had always been aware of the problems of inflation. But our experience in the late 1970s reinforced the dangers of allowing inflation to get out of hand. We learned a hard lesson.

VI. 1986 to 1995

That bring us to 1986. The quick pace of events continued.

- President Reagan met with Mikhail Gorbachev in Iceland to discuss arms reductions.
- The nuclear disaster at Chernobyl shook the world.
- An oil surplus forced prices down to $10 a barrel.
- The Chicago Bears won the Super Bowl.
- Purdue/Cal celebrated its fortieth anniversary, with 7,400 students enrolled in a wide variety of academic programs.
- And the Cubs, well, the Cubs finished in fifth place, 33 games behind the pace.

In 1986, we were in the middle of the nine-year expansion. We had moderate inflation, which provided a foundation for healthy growth. But all was not well. Our economy was becoming leveraged… consumers, businesses, and government were all piling up record levels of debt. Eventually the bill became due. The war in Kuwait triggered a relatively mild but persistent recession in 1990 and '91. The economy's progress was staggered by powerful headwinds — the efforts of people and businesses to cut back their spending. The Fed responded aggressively and eased monetary policy. The economy recovered over time and began to build a head of steam.

By 1994 we faced a different problem. We were growing too fast — our growth wasn't sustainable. We were like a runner who had just finished a long sprint. Our resources were stretched. It was time to catch our breath and grow at a pace that we could sustain over the long haul. So the Fed tightened policy during 1994, limiting inflationary pressures that were building up in the economy.

This was a fairly controversial move at the time… somewhat of a new approach. I wasn't at the Fed at the time, but I think it was absolutely the right move. The Fed moved to head off inflationary pressures even though inflation couldn't be seen in the data yet. The Fed preferred to slowly deflate these pressures instead of waiting and bursting the inflationary balloon after the fact.
Taking this forward-looking approach is necessary because of the lags in monetary policy. Policy is like a time release capsule… it takes many months or a year to cure the economy. So it’s essential to stay ahead of the curve. If we don't react until a serious problem shows up, then it's already too late. Acting in a preemptive fashion is difficult but it certainly can be done… as we saw in 1994. The Fed needed to act decisively to prevent any possibility of inflation getting out of hand.

VII. Conclusion

That brings us to 1996. It's easy to evaluate the situation at Purdue/Cal after fifty years. It's a successful, respected university that offers an outstanding education to 9,000 students. The state of the economy is a bit tougher. What do we foresee for the economy during 1996? It's always difficult to forecast. As you here tonight know, there are three rules of thumb for a forecaster:

- One, never give a forecast unless you have to.
- Two, if you have to forecast, do it often.
- And three, give either a number or a date …but never both.

Given the spirit of this evening, I’m going to bend these rules. We anticipate that we’ll have real G.P. growth of two percent or slightly higher during 1996. That's approximately the growth we can sustain without sparking an increase in inflation. The Consumer Price Index should come in at about two and three-fourths percent. And the unemployment rate should end the year at close to its current levels. I guess you could say I’m guardedly optimistic. I have to admit that ever since I took my oath as a central banker, I find myself using phrases like “guardedly optimistic.” I suppose that's why we're called the Federal Reserve.

I'd like to conclude by offering three lessons that we can learn from the past five decades.

**Number one** — Think it over carefully before you bet on the Cubs.

**Number two** — A small urban college can grow from modest beginnings into an outstanding institution.

**And number three** — A central banker has to focus on inflation.

Certainly, the Fed hasn't learned everything about monetary policy. Trying to figure out the economy is a never-ending task. But we did learn an important lesson during the past 50 years... the best way to accomplish our mission is to keep inflation in check. As we saw in the 1970s, the end result of runaway inflation is low employment and stagnant growth. The cure is a painful one that's best avoided... prevention is the best medicine. Ignoring inflation may seem to be an easy way to boost growth... but it's a macroeconomic Ponzi scheme. In the long run you need a foundation of stable prices to achieve sustainable growth. Low, stable inflation is the way to go... it's a goal we should all share. Working together toward this objective is the best way we can assure a healthy, vibrant economy for many decades to come.

Thank you.