S. HRG. 104—324

THE HUMPHREY-HAWKINS ACT AND THE ROLE OF THE FEDERAL RESERVE

HEARING

before the

JOINT ECONOMIC COMMITTEE

CONGRESS OF THE UNITED STATES

ONE HUNDRED FOURTH CONGRESS

FIRST SESSION

March 16, 1995

Printed for the use of the Joint Economic Committee

U.S. GOVERNMENT PRINTING OFFICE

WASHINGTON: 1996

89-805CC

For sale by the U.S. Government Printing Office
Superintendent of Documents, Congressional Sales Office, Washington, DC 20402
ISBN 0-16-052414-8

JOINT ECONOMIC COMMITTEE

[Created pursuant to Sec. 5(a) of Public Law 304, 79th Congress]

SENATE

CONNIE MACK, Florida,
Chairman
WILLIAM V. ROTH, JR., Delaware
LARRY E. CRAIG, Idaho
ROBERT F. BENNETT, Utah
RICK SANTORUM, Pennsylvania
ROD GRAMS, Minnesota
JEFF BINGAMAN, New Mexico
PAUL S. SARBANES, Maryland
EDWARD M. KENNEDY, Massachusetts
CHARLES S. ROBB, Virginia

HOUSE OF REPRESENTATIVES

JIM SAXTON, New Jersey,
Vice Chairman
THOMAS W. EWING, Illinois
JACK QUINN, New York
DONALD A. MANZULLO, Illinois
MARK SANFORD, South Carolina
MAC THORNBERRY, Texas
PETE STARK, California
DAVID R. OBEY, Wisconsin
LEE H. HAMILTON, Indiana
KWEISI MFUME, Maryland

ROBERT N. MOTTICE, *Executive Director*
BRIAN S. WESBURY, *Chief Economist*
LEE PRICE, Minority Staff Director

Prepared by COLLEEN J. HEALY

CONTENTS

OPENING STATEMENTS OF MEMBERS

WITNESSES

Panel I

Panel II

Panel III

SUBMISSIONS FOR THE RECORD

THE HUMPHREY-HAWKINS ACT AND THE ROLE OF THE FEDERAL RESERVE

Thursday, March 16, 1995

CONGRESS OF THE UNITED STATES,
JOINT ECONOMIC COMMITTEE,
WASHINGTON, D.C.

The Committee met, pursuant to notice, at 9:31a.m., Russell Senate Office Building, Room 385, the Honorable Connie Mack, Chairman of the Committee, presiding.

Present: Senators Mack, Bennett and Sarbanes.

Staff Present: Melissa Cortese, Brian Wesbury, Robert Mottice, Stacey Smith, Reed Garfield, Lee Price, Bill Spriggs, Bill Buechner, Colleen J. Healy and Juanita Y. Morgan.

OPENING STATEMENT OF SENATOR CONNIE MACK, CHAIRMAN

Senator Mack. I think we will go ahead and get started. I suspect that at some point during the morning my colleagues will begin to show up. I cannot help but look at the number of people who are in the audience this morning and be reminded of a conversation that I had with former President Richard Nixon a number of years ago. I will not go into the whole thing, but he basically said that he found that when he was out on the stump, that speaking about economics was boring. I suggest from the crowd that is behind you that a lot of people think that, unfortunately, because the decisions we make with respect to economic policy significantly affect the lives of all Americans every single day.

But again I want to express my appreciation, as I just did, to each of the panelists for taking the time to be with us this morning. I will make introductions after opening remarks.

The purpose of our hearing today is to examine The Full Employment and Balanced Growth Act of 1978, better known as the Humphrey-Hawkins Act. Specifically we are interested in the role of the Federal Reserve System and how the Humphrey-Hawkins Act might push the Fed to follow policies that, contrary to our intentions, are not good for the economy.

On December 7, 1994, Alan Greenspan, the Chairman of the Federal Reserve System, testified before this Committee. I asked him directly whether the Humphrey-Hawkins Act forced him to follow policies in the short run that hurt the economy in the long-run. His answer was simple and straightforward. "Yes," was his response. My view is that the Federal Reserve can best facilitate -- these are my comments now, not his -- economic growth by following policies based on sound money. By contrast, Humphrey-Hawkins requires the Fed to focus on other factors which can lead to higher and more volatile interest rates.

Recent events in our hemisphere highlight the importance of sound monetary policy based on price level stability. I am referring to the financial meltdown in Mexico. The problems in Mexico resulted from runaway peso printing and a monetary policy gone awry. Some say that the Mexican Central Bank forgot its role as defender of the monetary order. Instead, the Central Bank focused on short- run policies designed to offset the damage done by events outside of its control. The long-run damage to the Mexican economy is yet to be fully realized.

We in the United States are facing our own problems with currency instability. The dollar has fallen dramatically, reaching historic lows against the Deutsche mark and the yen. This decline in the value of our currency reduces our citizens' purchasing power in world markets, lowers living standards, and introduces an increased uncertainty into financial transactions that can only hinder our long-term competitiveness, not help.

In today's global marketplace, stable and sound monetary policy is rewarded by increased investor confidence and thus increased investment in jobs. By contrast, uncertain monetary policy leads to loss of confidence and declining investments and jobs.

I could not say it any better than Chairman Greenspan did last December. He said -- and again I quote -- "I personally believe that a stable price level contributes very forcefully to long-term economic stability and maximum sustainable economic growth. And that is what economic policy is all about."

As we look into the future, the increased integration of our economy with the rest of the world demands that we create a stable environment for our businesses, workers, and families. Without a stable environment, we force our businesses to operate hampered by financial market uncertainty. A stable monetary system is essential to expanding and extending economic opportunity to all Americans.

A stable monetary system should be the right of every citizen and government should protect that right. Ludwig Von Mises, one of the

most prominent economists of the 20th Century, said it best when he wrote -- and again I quote -- "It is impossible to grasp the meaning of the idea of sound money if one does not realize that it was devised as an instrument for the protection of civil liberties. Ideologically it belongs in the same class with political constitutions and bills of rights."

The sound money issue is central to the role of the Federal Reserve in the economy. The Federal Reserve was designed to be independent from the political process because central banks have often been used throughout history for political manipulation of economies. When government interferes so much that the economy sags under the burden, many call on the Fed to prop it up. However, printing money and artificially lowering interest rates can only hurt the economy in the long-run. Any signs of economic growth will be short-lived, eventually becoming lost amid a declining exchange rate, rising long-term interest rates, inflation, and volatile, uncertain financial markets.

I am convinced that moving toward a goal of price level stability for the Fed will produce confidence and certainty among investors throughout the world. I believe this confidence will lead to the highest possible employment levels, to the greatest increase in standards of living, and to the strongest competitive position for the United States.

A goal of price level stability will bring down interest rates to their lowest possible levels, no longer influenced by uncertainty over future inflation, and this will reduce the deficit by lowering the cost of financing government debt, keeping the cost of capital low, and extending economic opportunity to as many citizens as possible.

Giving the Fed a goal of price level stability will help ensure that inflation becomes a non-factor in our economy. The value of our insurance policies, savings bonds, and pension funds will be secure. Reforming Humphrey-Hawkins and giving the Fed a clear mandate of sound money is a critical step in that direction. At this point I will introduce our distinguished panelists.

[The prepared statement of Senator Mack appears in the Submissions for the Record.]

John Rutledge is Chairman of Rutledge & Company, Inc., a private merchant banking firm specializing in corporate buyouts and direct equity financing of companies. Dr. Rutledge is also the founder of Claremont Economics Institute and is on the board of directors of several corporations. He received his doctorate from the University of Virginia in 1973, and in 1981 he was one of the principal architects of President Reagan's transition team. Dr. Rutledge writes a column for Forbes

Magazine. He is author of the book, *A Monetarist Model of Inflationary Expectations*, and is co-author of *Rust to Riches* published in 1989. We are delighted to welcome Dr. Rutledge this morning.

Robert Eisner is the William R. Kenan Professor Emeritus at Northwestern University. He received his doctorate from Johns Hopkins University in 1951. Dr. Eisner is a member of *The Los Angeles Times* Board of Advisors, and he writes periodic essays on the economy for the *Times* syndicate. The latest of his three books, *The Misunderstood Economy: What Counts and How to Count It*, was published in April 1994. In addition, Dr. Eisner has appeared on a variety of television talk programs, including William F. Buckley's Firing Line, MacNeil-Lehrer News Hour, and Money Line. We are anxious to hear what you have to say this morning, and we welcome you as well.

Arthur Laffer has a distinguished career both in and outside of Government. He formerly was a member of President Reagan's Economic Policy Advisory Board, served as a consultant to the Secretaries of Treasury and Defense from 1972 to 1977, and was the Chief Economist for the Office of Management and Budget from 1970 to 1972. Dr. Laffer has an M.B.A. and a Ph.D. in economics from Stanford University and has been on the faculty of the University of Chicago since 1967. In 1990, Dr. Laffer was listed by *The Los Angeles Times* as one of "A Dozen Who Shaped the 1980's." In 1989, *The Wall Street Journal* chose to include him in its feature, "A Gallery of the Greatest People Who Influenced Our Daily Business." Dr. Laffer is currently chairman and founder of A.B. Laffer and V.A. Canto and Associates, an economic research and financial consulting firm. We welcome you as well, Dr. Laffer.

Lawrence Kudlow is currently Economics Editor for the National Review magazine and he is a regular on CNBC's weekend talk program, Strictly Business. In the 1980's, he served President Reagan as Associate Director for Economics and Planning in the Office of Management and Budget. Mr. Kudlow went on to become Chief Economist and Senior Managing Director of Bear, Stearns & Company in New York. He recently served as co-chairman of the Economic Recovery Council in New Jersey Governor Christine Whitman's election campaign, and he also served on Governor Whitman's transition budget task force. Mr. Kudlow is a frequent guest commentator on the McLaughlin Group, the MacNeil- Lehrer Report, and CNN's Moneyline, among others. In addition, Mr. Kudlow often contributes op-ed pieces to *The Wall Street*

Journal, *The New York Times*, and other notable publications. Thank you also for joining us.

Again, I appreciate the four of you contributing your time this morning, and at this point we will start with Dr. Rutledge. John, if you will go ahead.

PANEL I

STATEMENT OF JOHN RUTLEDGE, CHAIRMAN, RUTLEDGE & COMPANY

Mr. Rutledge. Thank you, Mr. Chairman. It is very nice to be with you today. In 1888 Anton Chekhov wrote "to know your Bulgarians, you have to visit them. You cannot just go by the newspapers." Earlier this week when your chief economist called and asked me to appear today, I was in Argentina seeing their financial crisis firsthand. So, one thing I am happy to report, is that from an Argentine perspective, the U.S. looks like a bedrock of stability even in monetary matters.

But sometimes even a relative bedrock of stability can do better as the dollar-yen and the dollar-Deutsche mark show over the last few weeks. So, what we are talking about today is what we can do to create a stable monetary environment for the U.S. over the very long term.

As you have mentioned in your introduction, I have one foot in the ivory tower and the other in the real world. As chairman of an advisory business, I worry about monetary matters, but as the chairman of a company that buys U.S. private industrial companies, I am very concerned about long-run investment matters as well. In my opinion it is only in as monetary affects the lives of people and businesses that we really are concerned about it, and there is the problem because to buy a business today, I have to make guesses and estimates about that business' future over the next 10, 15, 20 years. To make a capital investment decision, we have to look at analyses showing the dollar returns on those investments over 20, 30, maybe 50 years. If you cannot forecast what the price level is going to be or what the purchasing power of the country's money is going to be, that exercise is almost hopeless. As a result, the risk premium people attach to investments goes up, the amount of capital spending goes down, and in a phrase, we are eating the seed corn. We are under-investing because of monetary uncertainties.

Analytically what I would like to see is a system where the price level in the year 2095 is going to be exactly the same as the price level in 1995. The sole job of the Federal Reserve is to guarantee that the price

level 100 years ahead is always equal to the current price level. That is their function.

There are really only two determinants of living standards: work and tools. Work is a subject that is really best treated directly through tax policy and through regulatory and other issues. Monetary policy's main influence is exerted through the balance sheet. Balance sheets are very large and very cumbersome, and if you are not careful, you can tip them over. Once you initiate a stimulus to the balance sheet, it can echo on for years and years after that. Monetary policy is just not suited to doing laser surgery on short-term adjustments to the economy. It is a blunt instrument that acts slowly over many, many years.

The framework I used to analyze this is a very simple one. It says, first of all, that the economy most people write about is interesting but not very important. In 1993, for example, the GDP of the United States was just over $6.3 trillion, which sounds like a big number, but the balance sheet of the United States in 1993 was $54.5 trillion, and that is not surprising. The balance sheet contains all the economic activity that has ever happened, minus what we have so far consumed. It is the legacy of all of our past. The balance sheet is huge.

The most important distinction in that balance sheet regarding monetary policy is the distinction between financial and tangible assets. The Fed's power is to grow the money supply and create an artificial stream of capital gains on the stock of real goods, real estate, houses, inventories, and so forth.

For example, if you raise the price of a house 10 percent a year and it is a $100,000 house, the Federal Reserve is giving you a 10 percent subsidy per year to own that house. Well, that $54 trillion balance sheet I mentioned a while ago is broken down roughly into $36 trillion worth of paper and $19 trillion worth of real assets. That $19 trillion of real assets, which today is 34.3 percent of the balance sheet, is the part of the balance sheet where the Fed exerts its direct influence in contrast to most of what is written about the Fed influencing interest rates. The Fed controls the rate of return on the stock of real goods.

By doing that, they also can influence the relative returns of real goods and securities. So, for example, during the 1970s when the Federal Reserve printed enough money to push the inflation rate on land up toward 10, 12, 14 percent, people found it in their interest to shift some of their net worth out of securities and into real estate and other real assets.

That shift means that on net everyone in the country at the same time was trying to sell their stocks and bonds, and the question we should ask is to whom. Everyone was simultaneously trying to buy properties, gold, commodities, and other real assets, and the question should be from whom. In both cases the answer is from each other. The only thing that gives in that kind of a story is the prices in the short-term.

So, by manipulating the relative returns of assets on the balance sheet, the Federal Reserve unleashes tidal waves of portfolio adjustments in the private sector. That can create real estate booms and speculative bubbles like we saw in the 1970s or bust-ups in the stock and bond market, or in the 1980s, in the reverse, tremendous booms in securities markets and busts in real estate. I would argue that neither one of those situations are very healthy for the long-term of the United States.

The objective for policy should be to make it impossible for people to make money by doing anything other than work, save, and take business risks. What that means is that you want to wipe out all of these artificial subsidies and penalties in the balance sheet. The only way I know to do that is to guarantee that the rate of return on the $19 trillion of real assets in the public's balance sheet is zero. That means zero inflation.

Between 1981 and 1993, the public reduced the percentage of its net worth held in real assets from 46 percent to 34 percent. That is a net shift of over $7 trillion, or more than one year's GDP out of real estate into securities. This shift has had massive effects on different industries. It means when you run a business, you are writing off your balance sheet and under margin pressure at the same time. So, as I say, this is a practical matter for real people.

So, to get from that to a policy statement, essentially what you would like to do is to remove these stimuli. From 1989 till 1992, land prices deflated at 8 percent a year in the United States destroying $1.3 trillion worth of net worth, undermining the capital of the banking system, and throwing the country into a recession. That whole thing could have been avoided by avoiding the inflation/deflation bust in the asset markets.

So, the easy conclusion of this is that we should stop inflating and deflating the real asset markets, which means we should have a zero inflation target as the single and only target objective of the Federal Reserve System. The more tricky question is what inflation level should you target. Well, the answer is zero. That is the only one that wipes out the stimulus, and you should measure inflation not by the CPI, which is a more interesting political number, but by the prices of the existing real goods that people can, in fact, own instead of securities. Those real

goods on the balance sheet are more than half made up of property. We have $19 trillion of these things, and $9.7 trillion of it is land and housing. $5.5 trillion is the capital stock, plant and equipment for industry. Three and one-half trillion dollars is basically used cars and refrigerators and commodities.

By essentially creating a price index for this balance sheet and targeting that price index at zero inflation, we could move to something more like a gold standard than we have had. In fact, it would almost be at least half a land standard, which means stabilizing land values, which is the single most important component of household net worth, is a near cousin to stable money and purchasing power stability. That is the monetary policy that falls out of this analysis to me.

If you want to want to look at it in standard terms in terms of real interest rates, what the equivalent analysis would say is that real interest rates ought to be calculated not as a CPI inflation rate, taken away from an interest rate, because the CPI is more than half services. You do not own and hold haircuts and guitar lessons. You own land, you own inventories, you own buildings. Real interest rates ought to be calculated using the rate of change of the price level the real balance sheet of the economy, or of net worth, price as the inflation measure.

Senator Mack. John, if I can get you to wrap up.

Mr. Rutledge. If you did that, you would show that real interest rates in the late end of the 1980s were 15 percentage points, not five percentage points, and we went through the highest real rate period in our history. Avoiding these big swings in real rates in money growth, booms and busts in inflation, land and security markets is what you would get by targeting sound money only for the Fed.

Thank you very much.

[The prepared statement of Mr. Rutledge appears in the Submissions for the Record.]

Senator Mack. Thank you. Dr. Eisner?

STATEMENT OF ROBERT EISNER, PROFESSOR OF ECONOMICS, NORTHWESTERN UNIVERSITY

Mr. Eisner. Thank you very much, Mr. Chairman. I appreciate your invitation to be here.

I must suggest that I disagree with a fair amount of what you just heard and we will perhaps get into that in the discussion of the questions.

I would like to emphasize what should be fundamental in any analysis of the economy. "What counts" is what I call it, and what counts is real output, the goods and services which the people of the United States can enjoy. We call that usually the gross domestic product.

What counts is the amount of that product that we are investing for our future because it is not that we merely want to live well now, but we want our children and our grandchildren to live well.

And finally what counts is employment and unemployment. Employment counts in part because it contributes to that product, but it counts in very large part as well because without a job, without employment in this country, perhaps anywhere in the world, a person is nothing. I do not think many of us fail to recognize the huge losses to society, to all of us, to people who are unemployed who have no stake in the economy or in civilized society.

As for prices and inflation, I know it is commonplace to say we are all against inflation, we are all against high prices, but in themselves it is not clear that either high prices or modest inflation are any great evil. Nobody likes to pay a high price, but how about selling for a high price? There are always two sides to a transaction. People complain about high prices of houses if they are buying them. They are delighted to sell their houses for high prices.

I have to add, despite what has just been said, that there is no clear relationship between the rate of inflation and the rate of growth of productivity. In fact, the great free market economist Milton Friedman made this point many years ago. You can be against inflation for a number of reasons, but I challenge anybody to find the data, information that at least modest inflation has much to do, certainly anything to do negatively, with output or with investment. Indeed, I think I could readily show that periods of modest inflation have tended to encourage investment, have been periods when the real rate of interest, which is what is relevant, has been lower, and there has been more investment in housing, more investment by business, more provision for our future.

Having said that, I would like to remind all of us that talking about inflation and fighting inflation, worrying about a stable price level now is really fighting a battle of the past. There is hardly any inflation in this economy. For some four years, the rate of inflation, as measured by the Consumer Price Index, has been at 3 percent or below, and I think there is widespread recognition now, correctly, that the Consumer Price Index is overstating inflation. So, when you take away the one or even two

percentage points of overstatement from that 2.7 percent inflation in the CPI that we are observing now, we have virtually no inflation.

Now, to the extent you are concerned about inflation, the way to fight it is not to slow the economy by tight money, by urging the Fed to focus on trying to keep the economy slow. The way to fight it is by trying to promote a maximum of competition. I am always really struck by the people in public life or who are outside who tell you, oh, we have to fight inflation. That is terrible, and then tell you, oh, we have to fight against getting cheap products from Mexico or Japan or China or anywhere else.

If you really want to fight inflation, let me say bluntly to anybody concerned, put your policies where your mouth is. Make sure that we are not trying to keep out cheap foreign goods. Make sure that we are not trying to give price supports in agriculture. Make sure that we are not trying to prevent competition at home, domestic competition.

I would like to suggest as one topical matter, perhaps we ought to remove the antitrust exemption for major league baseball. I note that in the State of the Chairman, Florida, they have just had to pay about $130 million and perhaps somewhat more eventually simply to get a major league franchise. Now, you know where that $130 million is going to come: out of the people who will be paying higher ticket prices to go.

Senator Mack. Dr. Eisner, I might say that I find it comforting that you and I agree at least on that subject.

Mr. Eisner. Yes, well, I hoped we would. I am very glad to hear that, Mr. Mack.

Now, I might point to a few figures and get to some elementary economics, if you wish, supply and demand. I have a little figure here. I know the cameras will see it, a supply and demand curve, reminding you that if you want the Federal Reserve to try to lower prices, you get them to do it -- and Mr. Greenspan will explain -- by taking measures that raise interest rates, that slow the economy, that reduce demand. But then as you move your demand curve from the high demand curve in my figure to a low demand curve, you do lower prices, but you also lower output. You lower q, quantity. We teach that in Economics 101, or whatever you want to call it, and there is no way of trying to get the Federal Reserve or anybody else who is trying to lower prices by slowing demand, by reducing demand to do it without also hurting output, investments, and employment.

Monetary policy affects real output and employment, not just prices. Unfortunately, there are some circles in the economics profession that

have been telling us that the Federal Reserve and monetary policy affects only prices. It has no effect on real output. For other reasons, Dr. Rutledge has just acknowledged it does affect real output by his claims by perhaps making prices stable or unstable, but I would suggest -- and the evidence is very clear. You go back to every recession, fluctuations we had where the Federal Reserve has tried to act, to the extent it does have any effect, it has effect not just on prices, but on real output.

I might argue that the real problem we have at this point is that the Federal Reserve and policymakers generally are not focused appropriately on one of the main objectives of the Humphrey-Hawkins Act, or The Full Employment and Balanced Growth Act. It goes back to The Employment Act of 1946, and that is this real thing I am talking about to try to maintain maximum employment and minimum unemployment. The Humphrey-Hawkins Act set a target of 4 percent unemployment. I think it is disgraceful that administration after administration, Federal Reserve Boards after Federal Reserve Boards, Congress after Congress have largely ignored that objective of 4 percent unemployment, and we just let it go.

Indeed, the Federal Reserve, if you ask Mr. Greenspan again when he comes here, will quickly acknowledge that they have a different idea. They think there is a natural rate of unemployment which we economists sometimes call the NAIRU, the non-accelerating inflation rate of unemployment, and they say you cannot let unemployment get too low. Low unemployment is a bad thing. Conservatives say you cannot let it get below 6.5 or 7 percent, as Martin Feldstein, President Reagan's Chairman of the Council of Economic Advisers, says. As Alan Blinder, a moderate or liberal appointed by the President to the Federal Reserve Board as Vice Chairman, will tell you, this natural rate is perhaps 5.5 or 6 percent. But there is this wide agreement then, if you cause unemployment to get too low, you are going to cause inflation to get higher and higher and higher.

I have been challenging that argument. I can give you papers and data against it. But this notion of a natural rate is really preventing us from trying to get unemployment as low as it should be gotten in accordance with the Humphrey-Hawkins Act.

I have another figure here, Figure 2 in my prepared statement, which shows you that in fact unemployment has bounced around, all around this so-called natural rate of unemployment, or NAIRU. It is a very poor guide then to policy. Indeed, unemployment has been as low as 1.2 percent in World War II and in the 3 percent range in the Vietnam War,

and I challenge people to explain why in our economy we have to have wars to get to full employment. Of course, the explanation is really simple and that is that in wartime, we have the government buying enough goods and services, supplying enough purchasing power, enough aggregate demand for businesses to feel free to produce all that they can and, therefore, hire all the people available to produce all they can.

Now, just to get this in further perspective, because I think it would be a terrible mistake to amend the Humphrey-Hawkins Act to instruct the Federal Reserve to look only at prices and inflation and not at the matter of unemployment which has been its assignment as well. Each percentage point of unemployment, by virtually all estimates, would cost the economy about $70 billion of goods and services. One percentage point of unemployment will be associated with a two percentage point loss in output. I can go into the explanation for that. You can perhaps quibble a little bit whether it is 2 percent or 1.5 percent or what, but that is a huge loss of output. The Congress sits and wrestles about $10 billion, $20 billion of taxes that got into a budget. What really counts are these goods and services. If you take action to insist to the Fed, "Forget about unemployment, just keep prices stable," and particularly in view of this confusion about the Consumer Price Index -- they would actually be making prices go down -- then you would find that they would be creating unemployment at a huge cost to the economy.

Senator Mack. If I could, Dr. Eisner, ask you to wrap?

Mr. Eisner. All right. I will wind up rather quickly then.

The fact is that high unemployment does go with lower inflation which guides the Fed, but it also is true that low unemployment may not raise inflation.

I might then conclude by simply reminding you that you already have a situation where, with this I think exaggerated concern about budget deficits, we are trying to reduce purchasing power by cutting the budget deficit. That leaves people, the public, with less to spend. That runs the danger of slowing the economy. If you add to that an injunction to the Federal Reserve to also insist that they have to slow the economy as the one guarantee of preventing prices from going up, then you really risk a serious increase in unemployment, loss in output, loss in investment for the future, and a tremendous loss for the economy.

[The prepared statement of Mr. Eisner appears in the Submission for the Record.]

Senator Mack. Thank you, Dr. Eisner. Dr. Laffer?

STATEMENT OF ARTHUR LAFFER, CHAIRMAN, A.B. LAFFER, V.A. CANTO AND ASSOCIATES

Mr. Laffer. Thank you very much, Senator. It is a real pleasure to be here. What a shock for me, to have Chairman Mack with Brian --

Senator Mack. It is a shock for me too. (Laughter.)

Mr. Laffer. Well, I know -- with Brian Wesbury as one of your advisers, and Larry Kudlow and myself and John Rutledge. Bob, you have been here with other administrations, but it is amazing all of us being here. It is sort of a shock and a nice, pleasant one for me.

Mr. Eisner. I want you to know that I get invited by both the majority and the minority. So there.

(Laughter.)

Mr. Laffer. And it stands to reason.

You do not have to apologize for some of the Members not being here. I am used to that, by the way. I was a professor most of my life.

(Laughter.)

Mr. Laffer. The Federal Reserve is independent to a large extent from the rest of government. The Federal Reserve has exercised that independence. The Federal Reserve Governors have 14-year terms. The Fed Chairman has a four-year term, which has been set in such a way as to maximize the insulation of the Fed Chairman from the Congress and the Administration.

The Fed has always acted upon multiple policy objectives. Just recently I testified on the first day of hearings before the House Banking and Financial Services Committee on the Mexican loan guarantee. Chairman Greenspan perhaps invented that concept, and this area is way outside of his official purview.

When I was in the White House with George Schultz, I can remember Arthur Burns in his Pepperdine speech talking about wage and price controls. He single-handedly pushed the United States into wage and price controls, literally, because he had an independent base from which to tout the position with no possible recourse. He was immune from all possible criticism. In fact, the final irony of it all was that when Chairman Burns finally did get everyone to accept wage and price controls, he was able to exempt interest rates because, frankly, he gave the best speech for free markets I have ever heard.

Whenever you have multiple objectives in an independent organization, you have no oversight whatsoever of that organization.

Period. So, in my view, the fewer the number of objectives, the better the chance that Congress can provide some oversight of the Fed.

When you talk about the goal of price stability as being correct, I could not agree with you more. Just imagine a world with no inflation. Imagine if you and I and everyone else knew with perfect certainty that a dollar 30 years from now would be worth exactly what a dollar is worth today. Imagine if everyone knew there would be no inflation for the next 30 years. Can you imagine what long-term interest rates would look like? Two, 2.5, 3 percent? Can you imagine what the economy would look like? Output, employment, production, the dollar in the foreign exchanges? You would have one of the most powerful engines for prosperity ever imagined. I agree totally with John Rutledge on this issue. Price stability is the key, and my view is that you should do as much as you can to get Congress to accept a single objective for the Federal Reserve Board.

Now, on other issues, when you look at inflation, I do not agree with Professor Eisner. I do agree with him on the budget totally, but I do not agree with him that inflation is a thing of the past, not something to worry about, and that in fact everything is hunky-dory right now. I do not believe that this is true.

As we all know, interest rates are the best harbingers of inflation known in the market. The 91-day Treasury bill, is literally is the market's expected nominal rate of return over the next 91 days, which is primarily inflation. All the studies I know show that short-term interest rates are the best forecasters of inflation around, and lately short-term interest rates in the United States have risen dramatically. They really are projecting that inflation is going to and is right now starting on an upward trend, and I believe those market interest rates are correct.

Everyone knows that we live in a world community, Senator, and that the price of a product, whether it be in the United States or in Berlin or in Argentina, wherever, is really world-determined. The price of a ton of steel in the United States is the same dollar price whether that steel is produced in Germany or the United States, and when that arbitrage occurs, it means that the mark price of a ton of steel times the dollar price of a mark must equal the dollar price of a ton of steel. It has got to be that way. Arbitrage guarantees it.

So, when the dollar devalues against the mark, as it has in the last two months by 10 percent, you know that mark prices relative to dollar prices are going to fall by 10 percent to bring that back into purchasing power parity. Whenever a country devalues its currency against another

country, the devaluing country's currency prices will rise relative to the prices in the currency against which it is devalued by the full amount of the devaluation. My best guess is with the dollar's collapse in the foreign exchanges, you can expect higher inflation in this country and it is not going to be long in coming. That's this person's view of the world.

The growth of the monetary base relatively to M1 in the last few months has been outrageously high. The Fed does not control M1 or M2, but the Fed does control, with perfect certainty, the monetary base, and yet in recent times, the Fed has allowed the monetary base to expand far more rapidly than M1, which is really pushing the supply of money out, not letting the money supply grow on its own. That to me is another major harbinger of inflation coming. That's this person's view of the world. The issue of monetary base relative to M1 is the single most serious threat we have in the United States today for inflation in the near term.

The last issue is -- and I guess I am going to agree with Professor Eisner on this -- you cannot really show a clear relationship between unemployment and inflation. The chart of the relationship looks like a Rorschach test.

My view of growth in the economy, if it has any effect on inflation, is that the more rapidly the economy grows, the lower inflation will be. Slowdowns in the economy cause high inflation. Rapid growth causes low inflation. This is intuitive. The two fastest growing countries in the post- war period were West Germany and Japan. The two lowest inflation countries were also West Germany and Japan. Did Italy and the UK grow slow enough for most of us? Did they have high enough inflation? Sure they did.

The go-go 1960s under John F. Kennedy had very low inflation. Under Johnson, Nixon, Ford, and Carter, you had very slow growth and very high inflation. I can remember Walter Heller writing a piece about me in *The Wall Street Journal* in 1980. John, you may remember that one. He said these Kemp-Reagan-Laffer tax cuts are going to stimulate the economy, but they are going cause hyperinflation, maybe 30, 40, even 50 percent rates of inflation because they are going to be overly stimulative. This is not true. If you have a bumper crop in apples, the price of apples goes down. The price does not go up. If you have a shortage of apples the price of apples goes up. I am very worried about growth in the economy in the near term, and I believe the economy is going to slow down over the next year-and-a-half or so and that this slowdown too will lead to more inflation.

The bottom line, Senator, is that I think you ought to hold the Fed's feet to the fire. I think you ought to give them one goal, one objective, one mission, and hold them accountable to the people of the United States. And price stability is that objective. That is the way you should go on this one. My view of the world.

Thank you.

[The prepared statement of Mr. Laffer appears in the Submission for the Record.]

Senator Mack. Dr. Laffer, thank you. Mr. Kudlow?

STATEMENT OF LAWRENCE KUDLOW, ECONOMICS EDITOR, NATIONAL REVIEW

Mr. Kudlow. Thank you, Mr. Chairman, and thank you and your staff for having me at this hearing on the Federal Reserve and possible reforms in the Humphrey-Hawkins Act.

I am quite critical of Fed policy and procedures and particularly with respect to the public which is, after all, what matters. Money is the most grassroots populaced area of economics. One way or another we all hold some money in our wallets, and money affects savings incentives. It affects work incentives, and of course, it affects interest rates and financial markets.

I think the Fed is dead wrong to inform the public that strong economic growth and low unemployment causes higher inflation. I think they are dead wrong. I find myself more in sorrow than anger looking askance at all the Federal Reserve Open Market Committee directives in the last 12 to 14 months. They have repeatedly raised interest rates in response to stronger than expected economic and lower than expected unemployment, and I think this is dead wrong. I think to the American public it is baffling to suggest that the Nation's Central Bank believes that more people working and more prosperity is bad.

I commend you and a number of your statements as a member of the Banking Committee and the JEC for raising this issue. I only wish that many of your other colleagues would follow through.

I believe the Humphrey-Hawkins Act should be reformed substantially. I think that this Congress, this new Republican Congress, which is trying to attempt a revolution in fiscal policy direction, should be equally determined to effect a revolution in monetary policy direction. It is a congressional function, and I believe that you and others can clarify and reduce the uncertainty and speak directly to the public that the

job of the Fed is not to centrally plan or centrally fine tune a slow economy. The job of the Fed is to stabilize prices and protect the purchasing power of the money we all hold, what I call domestic price stability. I think if you can clarify that through legislation or some other advisory mechanisms, you will have done an enormous -- enormous -- service.

In fact, I agree with much of what Mr. Eisner said on this particular point. I am a student of John Rutledge and I am a student of Arthur Laffer, but I think Mr. Eisner's point on jobs and growth is exactly right. If there is common ground between, shall we say, neoclassical economists in one party and more traditional Keynesians in another, this is where we will make that common ground, and it is a great place to start. I think some bipartisanship here would be not only helpful but productive.

Now, insofar as my criticism of the Fed, I do not see the data historically to suggest that when growth is rising, inflation rises. In fact, I believe it is quite the reverse. I believe economic history shows clearly that during relatively long and significantly measurable periods, rising or rapid economic growth is generally accompanied by low inflation and low economic growth is generally accompanied by rising inflation. So, I am here to argue that Mr. Greenspan and Mr. Blinder are dead wrong. Their analysis is wrong. Their facts are wrong, and they are misinforming the public.

Just some simple numbers. In the 1960s -- Art referred to the 1960s -- when the dollar was as good as gold, from 1961 to 1967, before we broke off the discipline of Bretton Woods, real growth was 4.9 percent at an annual rate, inflation was 2.4 percent at an annual rate, and unemployment was 4.4 percent at an annual rate. So, I agree with Mr. Eisner. Why have we given up?

Now, the Fed should not be concerned. I believe that money drives inflation, and I believe that spending and taxing and regulations drive the economy through the incentives structure.

But my point is the evidence shows from the 1960s -- now, in what I call the age of stagflation, from the late 1960s to the early 1980s, when everything ran amuck, when all the Keynesian models broke down, inflation rose from 2.5 percent to 7.2 percent. Growth fell from 4.9 to 2.1. So, that is a direct rebuttal of the Greenspan/Blinder hypothesis that the Phillips curve works, that there is a tradeoff between growth and inflation.

Finally, in the 1980s, as we have gradually conquered inflation and restructured our economy, growth improved from 2.1 to 3.3, and the inflation dropped from 7 percent to 3.5 percent.

In fact, just to have some fun, since I am an amateur historian, as well as an amateur economist, I go back into the 19th century. The strongest period of prosperity in this country roughly spanned the post-Civil War to pre-World War I period. That is roughly 1875 to 1910. That was a period when one of my favorite underrated Presidents, Ulysses S. Grant, returned us to the gold standard after the Civil War inflation. We had no income tax in those days, and we had very small amounts of government spending and regulation. The American economy for more than 40 years grew at better than 4 percent in real terms at an annual rate, and the inflation rate declined by roughly 1 percent a year. The GDP deflator reconstructed declined by 1 percent a year. So, we had deflationary growth, and that was a period that America became the strongest economic and military power in the world. We can learn from that.

So, I expressed my disagreement with the Fed's view on the Phillips curve on the supposed tradeoff between inflation and growth.

I believe we should look at the Fed not as the temple of money, but as the department of money. I believe that the Federal Reserve and other central banks around the world are prehistoric dinosaurs from an age when we really believed in central monetary planning and central fiscal planning. I believe the 21st Century will disabuse us of this. The late 20th Century has already proven that markets dominate, not governments, and that ultimately markets call the tune, not central banks or any other areas of government policy. I abhor all manner of fine tuning. I abhor all manner of central planning.

I think the Federal Reserve in this country has slipped into a number of bad habits, and I would also add in the last seven years our economy has slumped to 2.3 percent growth and 3.8 percent inflation under Mr. Greenspan's tenure. 3.8 percent inflation was higher than what Reagan and Volcker produced, and 2.3 percent real growth is much lower than what Reagan and Volcker produced. So, I believe we are slipping into the wrong direction of policies.

Furthermore, Mr. Greenspan's insistence on targeting the Federal Funds rate is a throwback to the late 1960s and 1970s. Virtually all conservative economists, whether they are supply-siders or monetarists or whatever, believe that the Central Bank cannot and ought not to control interest rates. Interest rates are set by the market, and the linkage

between interest rates and particularly the Fed Funds rate and GNP, as an instrument of economic planning, is virtually nonexistent.

So, we are lapsing backwards. We are going back to the kinds of Fed Funds fine tuning policies that created the demise of the Bretton Woods system and helped contribute to the inflationary surge of the 1970s. I regret that.

I think since Mr. Manley Johnson and Mr. Wayne Angell left the Federal Reserve Board, the center of gravity has shifted away from market price targeting and back toward interest rate targeting. The center of gravity has shifted away from economic growth and toward slow growth.

I think the Fed should be guided by world market prices. Without any disrespect, I believe markets have more information than even the brightest Ph.D. economists at the Federal Reserve Board or anywhere else, and in particular, I think the evidence shows that the price of gold, the level of various commodity indexes, the level of the dollar exchange rate, and the level of long-term interest rates are particularly useful in determining whether the Fed is inflating or deflating, too loose or too tight, far more than the unemployment rate, far more than the real GDP, far more than capacity utilization. They should be looking at these inflation sensitive open market prices. Liberate the Fed Funds rate. Be guided by the world markets' information signals through the price mechanisms.

Also a slightly different kind of balance sheet than my friend, John Rutledge. The Fed has its own balance sheet. I actually brought it here. There have been a lot of reference points to this in the newspapers. It is called the H41. It is released every week. This is from February 23, 1995.

The balance sheet is primarily the Fed's sum total of its loans and investments, just like any commercial bank. By far, however, the largest share of the balance sheet is the Fed's investments in U.S. Treasury securities. The total of this is called reserve bank credit, and just like a bank provides a loan to the economy, the Fed provides loan to the banking system. That is how it creates money. It buys and sells Treasury bills, and it is all shown on their balance sheet.

Now, I am not going to make a monetarist case that there is one number for the growth of Federal Reserve credit or, as Art said, monetary base, although Fed credit is the source of the monetary base. I will, however, say a reform that the Fed should undertake is to use this balance sheet, which is a good proxy for the supply of dollars the Fed is creating,

and then use the world markets for gold and bonds and exchange rates to suggest the demand for dollars. If the world markets are signaling a plummeting dollar price or a rise in gold price, then that suggests the Fed has got to rein in its balance sheets or its footings, just as any commercial banker would if lending conditions deteriorate. This is a far more promising method, in my opinion, than controlling the Federal Funds rate. This is the one thing the Fed controls, its own balance sheet. So, that is my recommendation.

I might add since 1990 in the last four years or 50 months, the Fed has expanded its balance sheet by nearly 50 percent. It is a little known factoid. That comes to 10 percent at an annual rate. They have increased $140 billion. When I worked on Wall Street as a forecaster, I used to say whenever the Fed is bullish and is buying, markets become very bearish and they start selling.

I am not sure the inflation threat is over. I find myself rather leaning toward Art Laffer's position that there is an inflation threat out there. The Fed has been adding a lot of money, buying a lot of government securities, and they should not.

What is the economic future? Well, today we have a Consumer Price Index number. We now appear to have a whiff of inflation in the air. I will note this. The CPI in the last three months is 3.4 percent at an annual rate. The producer price index in the last three months is 4.1 percent at an annual rate. Both of those are well above their year-on-year trends. So, we seem to have a high frequency movement on the margin tailing up.

Meanwhile, the economy is slumping in my judgment. In the last three months, retail sales have grown by less than 1 percent. The peak last October was 15 percent. In the last three months, housing starts have fallen 45 percent, including today's big decline. In fact, I believe in each of the last three months, housing starts have fallen.

So, what I see at least is I see slower growth in the next 12 to 18 months and higher inflation, exactly the reverse of what the Fed is predicting, and I think that Americans are going to be very, very unhappy.

I have other thoughts on the dollar and the budget. Let me just throw one thing out.

Senator Mack. Mr. Kudlow, if I could, let me get you to wrap up.

Mr. Kudlow. Okay. I am going to wrap up. I have talked too much. Reform Humphrey-Hawkins. Narrow the Fed's mandate. They should

not control the economy. They should not be targeting unemployment. They should be targeting open market prices such as gold, exchange rates, commodities, bond yields. As their operating instrument, they should drop the Fed Funds rate target, and instead they should move to much better control of the balance sheet and inform the public.

Finally, I believe if Humphrey-Hawkins is amended along these lines, you should set targets for the Fed. We have fiscal targets. We need the monetary equivalent of a balanced budget amendment. We need the monetary equivalent of a zero deficit by 2002. It is time. Let us make it either through the CPI target or the deflator target or the price of gold or some combination thereof. If the Fed does not make the targets set by the Congress, the Fed should be sanctioned through strict term limits. I do not believe they should escape the will of the people or the views of the Congress.

Thank you very much.

[The prepared statement of Mr. Kudlow appears in the Submission for the Record.]

Senator Mack. Once again I thank all of you for your comments this morning. It was good to see that there were some areas of agreement. Do either of you have an opening statement you would like to make?

Senator Bennett. I have some questions.

Senator Sarbanes. No.

Senator Mack. All right. Then let me go ahead and proceed to some questions.

The Federal Reserve has only one policy tool, the ability to change the supply of money and therefore influence interest rates. Humphrey -Hawkins mandates the multiple policy objectives of low unemployment and inflation. Can the Fed accomplish this mandate with only one policy tool? What goal or goals can the Federal Reserve achieve? I will just toss that out to the panel and whoever wants to respond.

Mr. Eisner. In fact, of course, the Federal Reserve has more than one tool. The tools it has are open market operations and discount rates and reserve requirements. They all, however, point either to increasing purchasing power of the public or decreasing it because, to the extent any of these tools is used to tighten, as we put it, it raises interest rates.

I am astonished by some of the comments on this panel to the effect that the markets control interest rates and the Fed has nothing to do with it. Indeed, I do not think there is an investor on Wall Street that believes

that, at least certainly for the short term. There may be some argument it does not affect real interest rates.

But I think your question, Mr. Chairman, does reflect a certain dilemma and confusion in a way in the Humphrey-Hawkins Act in setting objectives which can be in conflict, and that relates then to just what you are trying to do in changing it. But I think you would be changing it the wrong way.

It is true that to try to combat inflation, as I have suggested, to bring about zero inflation, as the Humphrey-Hawkins Act does specify for a long-run objective, the Fed simply has to keep tightening. I agree very much with Mr. Kudlow that it should not be doing this. It should not be lowering unemployment. It should not be slowing the economy, but there is no escaping it and your question really reflects that.

If you are going to have the objective of trying to keep prices stable, then you have to be willing to let unemployment go where it will go, and there is no question that if there are inflationary pressures and you try to slow the economy by restricting demand, you are going to raise unemployment.

Mr. Kudlow. I just want to clarify a point.

I will agree with my distinguished panelists that interest rates have increased, but I will not agree with the conclusion that, therefore, monetary policy is tight. If monetary policy were tight in the sense that we were creating fewer new dollars, the supply of money was coming down, then we would see lower inflation expectations, lower interest rates -- lower interest rates -- and we would see much lower gold prices and a much stronger dollar.

About a year and a half ago I believe -- let us see. This is almost two years ago. Mr. Greenspan told the Congress in 1993 if we pass the budget package, high tax budget package, that a bunch of things would happen. Number one, he said interest rates would fall. Number two, he said the deficits would fall.

Well, long-term Treasury bonds were 5.5 to 5.75 percent in the summer and early fall of 1993. Today those bonds are 7 and a quarter to 7.5 percent, just about 200 basis points. Short-term rates, Treasury bills were about 3 percent in those days two years ago. Today they are close to 6 percent . So, those promises were broken.

My point is that interest rate targeting by the Fed has no meaning in terms of whether money is loose or tight. Only the Fed's balance sheet and only the open market commodity prices. Now, over time, sure.

Eventually if we have to go back to the bad old days of the 1970s, interest rates will go sky high and then the adjustments are going to be very painful.

But we have got to liberate ourselves from this Fed Funds rate control, and as I think it was Art that said or John Rutledge, we have to promise consumers and holders of dollars and dollar financial assets -- we have to promise them that we will guarantee the value, the current and future value, of the dollar. That will never be done by controlling interest rates. That will only be done if we look at gold and other commodity prices.

Senator Mack. Dr. Laffer?

Mr. Laffer. The Fed cannot control the money supply, M1, M2, or any of those. All the Fed can control is the monetary base. And as such, when you have one policy instrument which is the monetary base, you should match it with one policy objective. Period.

I think it was Senator Bennett, when we were talking about the Mexican loan guarantee, who juxtaposed the two concepts of money. One was John Rutledge's concept; the other one was Professor Eisner's concept. One was that money is a contract between the people, and the government, a bond, that here we as the government are producing this money that we guarantee has a certain value. The other concept of money is that it is a policy instrument. This is Professor Eisner's view. You were completely correct on that one, Senator, that money should be a contract.

What amazes me is how the Democrats, when they controlled the Congress, did not get all excited about this issue themselves. This issue is killing the President, and I don't know why Congress does not do something to really bring the Fed under control. It is just amazing.

Senator Mack. Well, then let me move on to the next question. This may seem like a very technical issue but it is important. What is the difference between price level stability and price stability, and what should the Federal Reserve have as a goal? Does anybody want to respond to that?

Mr. Eisner. Well, I would love to respond to that because it is sort of central. I am sort of startled by all this emphasis upon price stability and we have to keep prices the same. The Russians for years had wonderful price stability. They almost never changed a price. They almost never changed the level of prices. They almost never changed the individual prices, and looked what happened to their economy.

The meaning of a market system is that prices are free to change, and that includes the price of a dollar. There is nothing wrong with the dollar falling. It is very understandable that the dollar has fallen now because we have had an import surplus, dollars are supplied abroad, and that increases the supply, lowers the price. We should not try to maintain the price of a dollar. You let it fall. That is going to be equilibrating.

So, as for stable prices and a stable price level, you certainly do not want to keep individual prices the same, and there is no great reason to keep the price level generally from changing. It has not changed much in this country. We do not have a problem of runaway inflation. We have hardly had any inflation in this country except in time of war or because of supply shocks to oil prices. And I can go into what we should do about that if you would like, but we should not try to keep prices down in that situation either and cause unemployment.

Senator Mack. Anyone else?

Mr. Laffer. I have got to say I just love it when tenured professors talk about competition.

(Laughter.)

Senator Mack. Dr. Rutledge?

Mr. Rutledge. As a short-term matter, the dollar in the marketplace is really a meter that measures the discipline of our Federal Reserve relative to other central banks and it is really not showing a very good performance just at the moment.

But I think both these questions really bear on the issue of what can the Fed really accomplish. The Fed has one tool, its balance sheet, or one way of affecting the market. My view is that it is not they have to choose one or the other of these objectives. When they change monetary policy in a big way, they have very powerful effects on both inflation and growth in the economy.

The one area we all agree on is I think we are all pro-growth. The issue is how to get there. I think it is striking how systematic changes in monetary policy can have very long-lasting relative price effects. In 1981 -- it is not quite true, but almost true -- everyone in America was a real estate agent. In 1993 almost everyone in America is a stock broker. That is because of the Fed. That is not helpful for the long-term interest of the United States to have people flip from one occupation to the other, move back and forth across the country. We need some stability in these relative prices so that the markets that Bob is talking about can do their job, which is to allocate resources at the micro level.

Mr. Kudlow. I just wanted to weigh in on Bob Eisner's points on the price level. Price level stability does not mean wage and price controls as per the Soviet Union. No one is talking about price controls.

Individual prices must always be left free to fluctuate and find levels determined by their markets. That is easy.

But the overall level, the general level of prices must be stabilized. I take great exception to the view that the price level has not risen. The price level has risen substantially all throughout this century and it is still rising. Sometimes its rate of change slows down, so we call that slower inflation. But we have not succeeded in stabilizing the level of prices and I do not believe we ever will succeed until the Fed strictly controls its balance sheet and we use gold as a reference point.

I am old-fashioned. I am very stubborn on the gold part. I would not tie to gold as the only thing in the world, but I would sure keep a sharp eye on gold prices. I am prepared to defend its track record as an inflation forecaster. I would supplement gold, for those people who have tremendous learning disabilities with respect to gold by using exchange rates. John said if the dollar is constantly falling against zero inflation currencies, then that tells you something, and I would supplement it with broad commodity prices and certainly bond yields. So, that is one point.

The second point on the dollar. I think one reason the dollar is too low is our tax policy. I think that taxes and regulations and spending, fiscal policy, affects real exchange rates, and I am indebted to both Mr. Laffer and Mr. Rutledge for this point of view, which I think is the classical view and the right view.

I think the world market is worried right now that we do not have enough fiscal discipline to follow through on either the spending cuts or the tax cuts. I do not happen to buy that. I am more optimistic, but I believe this is a key point.

In the early 1980s, the first half of the 1980s, when the U.S. embarked on a significant tax-cutting policy, lowering tax rates on capital, on labor income, and other business income, the dollar surged, absolutely surged, and the price of gold fell and the inflation rate fell. Then in the second half of the 1980s and the early 1990s the United States started raising tax rates on capital and labor and the dollar has been falling for 10 years. Now, there is a pattern here, and I think monetary policy and fiscal policy are related in that sense, but the Fed does not control tax policy.

Senator Mack. Speaking of discipline, I think I will have to have time discipline and I would ask you all to be somewhat more concise in your remarks. Senator Sarbanes?

Senator Sarbanes. Well, I yield to Senator Bennett. He was here ahead of me.

OPENING STATEMENT OF SENATOR ROBERT BENNETT

Senator Bennett. Well, thank you. I have a whole series of notes of things I want to respond to.

Dr. Rutledge, you say we all used to be real estate agents. Now we are all stock brokers. I was very much aware of that in the private sector. The hot investment was real estate and then suddenly the hot investment was stocks. I suggest that, along with Mr. Kudlow, tax policy had a great deal to do with that, because a lot of people who bought real estate bought it not because it was a good deal, but because it was a good tax dodge. When the Tax Act of 1986 suddenly stripped real estate of its favorable tax treatment, a lot of folks then decided they had to get out of it, plus the fact that the S&L's discovered that their collateral was suddenly worthless. That is an overstatement but nonetheless the S&L crisis was fueled by the tax treatment of real estate.

But coming off of that, I say, all right, if as a smart investor my choice is real estate in one period and then I should shift to stocks in another period, whatever the cause, it is fairly clear, Dr. Eisner, I am not going to put my money in money because of the inflation factor that Mr. Kudlow is talking about. There is no point in saving money if there is no price stability in money. If money is going to lose its value and its purchasing power, there is no point in having any. So, I will look around for the hottest thing to put my money in whether it is real estate or stocks or pork bellies or whatever, but I sure do not want to keep it in money. I think that is one of the main reasons why we have such a low savings rate in this country that everybody comes along and complains about.

Now, from your body language, you want to respond. Go ahead.

Mr. Eisner. Yes, well, you say, Mr. Bennett, hold money. The money is being held by somebody. We have had complaints we have had too much money. Money is increasing. So, people hold the money.

The amount of money that is held really has little to do with what saving takes place. Saving has to be matched by investment, and the real question is then, how much investment will there be, how much business investment, how much investment abroad? The total of our private

investment at home and our investment abroad is the amount of saving. What you have to look at is what these policies are doing for that.

I agree with a fair amount of what Mr. Kudlow has said. You have got to keep your eye on real growth and maximize that. If you have maximum real growth, you will have maximum saving and investment for the future.

Now, how to achieve that is an interesting question, and I keep coming back to the fact that trying to aim at stable prices, which is likely to mean for the Federal Reserve to slow the economy -- and Mr. Kudlow put it very well. He objected to that. If that is what it is going to be, then you are going to ruin the economy.

Senator Bennett. But that is a separate issue I would like to come to.

But we have had conversations about Japan and Germany. I have owned and done business in Japan. It is interesting to go over there, walk into the bank that we were using for our banking connection in Japan and see the little chart that is up there on the counter for the customers of the interest they were paying. This was in the early 1980s. And they were paying 2 percent on savings, and the Japanese savings rate, in terms of the Japanese willing to put money in banks, was substantially higher than the American savings rate at that 2 percent interest rate.

You say, well, there is plenty of money. Maybe there is plenty of money because the money supply keeps growing, but people want to get it out of the form of money just as fast as they can and into something else because they know the money is going to deteriorate. So, they go buy a bigger house than they need. We all saw that in the 1980s.

I remember my real estate agent saying to me in California, Bob, buy this house. It is going to be worth seven figures within a matter of three or four years. I said how do you know that, and he said because it is appreciating at the rate of 20 percent a year. Well, it did not and I never got the seven figures out of it when I sold it.

(Laughter.)

But that was the go-go attitude of that period.

Mr. Eisner. Well, bigger houses and more houses are just what we want. We cannot object to that. In fact, I am not arguing for inflation, but that inflation we had and high nominal interest rates left real interest rates low and did have a considerable amount of investment in housing. That is what counts. That is the real thing we want. We want people to have more houses and bigger houses in which to live.

Senator Bennett. Well, that is a separate issue. We can talk about that. I can tell you in that same period I was running a business and going to the bank and borrowing money at 21 percent, and it was not fun and the business did not survive. I remember the phrase that Jimmy Carter was the only President whose approval rating was lower than the prime rate in our history.

(Laughter.)

And that is where we were.

Let me ask you another question. The Federal Reserve has one of the most important jobs in the world. It also has one of the easiest because it has only one decision to make: do we tighten or do we loosen? It is not complicated. It is very important, not complicated.

Let us assume each of you has been appointed to the Federal Reserve and all of the other members of the Federal Reserve are on an airplane that has just disappeared into the Bermuda Triangle.

(Laughter.)

So, you make the decision by yourself we are either going to loosen or we are going to tighten. You find yourself in a locked room with no communication of any sort with any numbers or any information in order to make that decision except a single envelope is slid under the door with one piece of information for you and you are going to have to make the decision, am I going to tighten or loosen today, on the basis of what is in that envelope. Quickly, each of you down the panel, what would you want to be in that envelope?

Mr. Rutledge. As the airplane disappeared, the dollar would rise.

(Laughter.)

I would choose none of the above. I do not want to loosen. I do not want to tighten. I want to hold the Fed's balance sheet steady for all time, and I would announce that and I would bind that in a straitjacket.

Senator Bennett. So, you would not want an envelope. Okay. Dr. Eisner?

Mr. Eisner. I would take the rate of unemployment.

Mr. Laffer. I would take the 91-day Treasury Bill yield.

Mr. Kudlow. Yes. I would take the price of gold, but I would beg to know what interest rate levels are doing and what the dollar is doing.

Senator Bennett. No, you only get one.

(Laughter.)

Mr. Kudlow. The reason I say that is I wish to note that I do not think we yet know the silver bullet, and as someone who worked in the Fed years and years ago and so forth --

Senator Bennett. I am not asking for a silver bullet.

Mr. Kudlow. I think there are differences between good targets and bad targets that lead us down the right path and the wrong path. I am just not sure about the golden bullet, although I would take gold to answer your question.

Senator Bennett. Thank you, Mr. Chairman.

Mr. Laffer. He is not the professor.

(Laughter.)

Senator Mack. Senator Sarbanes?

OPENING STATEMENT OF SENATOR PAUL S. SARBANES

Senator Sarbanes. Thank you very much, Mr. Chairman. Dr. Laffer, I was a little puzzled by your comment about tenured professors talking about competition, and I guess just to clear up any innuendoes from it, you did not mean to suggest that in that competition Professor Eisner would not be able to come out okay, did you?

Mr. Laffer. Oh, no. In fact, you missed, because you were not here, my compliment to him that he mentioned that he has come through and testified before Republican and Democratic Administrations, and my comment was it is because he deserves it. So, no, far from it. I was having fun with words, Senator.

But it is sort of entertaining, is it not, that tenured professors tout competition?

Senator Sarbanes. Well, I was a little put off by it since Dr. Eisner in his statement talks at some length about the importance of competition. Not having heard the previous comments to which you just alluded, it seemed to me to be a shot at him, and my reaction to that was that he could stand up in any competition you wanted to put him into and stand up very well. You do not, I take it, disagree with that.

Mr. Laffer. No, in fact, just the reverse. I agree very much with your comment. In fact, his work on the budget deficit is classic. We talked about that earlier. I am a fan of Bob Eisner.

Senator Sarbanes. Good. I am glad we have straightened that out.

Let me ask the panel people -- I will take Senator Bennett's sort of hypothetical at the end and develop it a bit. I thought it was an

interesting question, and I was very interested in the responses it provoked which reflected no consensus whatsoever.

What do you think the Fed should be doing? Let us assume you are making the policy for the Fed. What should it be? Let me just move right across the panel on that.

Mr. Rutledge. Fed policy should be to manage their balance sheet so as to create zero inflation for the existing stock of assets.

Senator Sarbanes. Well, right now would you have moved to raise the interest rates as they have done over the last --

Mr. Rutledge. No. I am not going to accept the premise that operating in the way the Fed operates now gives you the appropriate response. The Fed's operating system now is to manage short-run movements in the economy, not long-term price stability. So, I think it is not what they should do, it is what they should not do that really concerns us here. They should not subject the economy to these enormous swings.

They were paying 2 percent in Japan. We have been paying 8, 10 percent on land in the United States, interest, for a long time. That is the problem. We need to avoid that.

Senator Sarbanes. Well, what does that mean? You are on the Board of the Fed. How do you vote on these issues?

Mr. Rutledge. That issue is not going to come up for a vote if I am on the Board of the Federal Reserve.

Senator Sarbanes. So, if you were put on the Board now, then the rates would stay where they are?

Mr. Rutledge. No. What I said is that the rate is not the subject on which the Federal Reserve is going to vote if I am controlling the agenda of the Federal Reserve. The Board is going to vote on the growth rate of the balance sheet of the Federal Reserve System, which is the growth rate of the monetary base.

Senator Sarbanes. Dr. Eisner?

Mr. Eisner. Well, first, I did not agree with any of the Federal Reserve Board rate increases. I would, therefore, move now to reverse them. It has been remarked on this panel that long-term interest rates are now higher than they were. It seems to have been forgotten that when there was apparently an understanding between Mr. Greenspan and President Clinton to be accommodative, interest rates got quite low, including long-term rates. They have gone up as a result of the Federal Reserve increasing the Funds rate and directly increasing interest rates.

Now, there has been a lot of talk on this panel about the monetary base. I think it is hopelessly outdated, as the Federal Reserve realizes. I do not know if the members of the Committee are aware. The monetary base consists of the reserves of the member banks plus the amount of currency outstanding. Now, the currency outstanding is a huge amount of the monetary base. Do you know where it is? It is in Russia. It is in countries all over the world that are holding on to our currency. If we are going to be stuck to trying to control the monetary base, we are either going to be starving the U.S. of money because in the foreign countries people are accumulating more and more dollars in currency, or we are going to let the monetary base go out of sight simply to accommodate that.

I think the Fed realizes that, and all this M1 and monetary base stuff is no longer working. The numbers are moving around. They have to look at interest rates. Now, there may be a disagreement as to whether you want to look at anything or you just want to leave it alone. But they do look at interest rates. That is appropriate. They should not be raising them. I would lower them now.

Mr. Laffer. Senator, I agree here but maybe the direction would be different.

Senator Sarbanes. When you say I agree, I am not sure --

Mr. Laffer. I think you should use interest rates as the target. I was just going to explain that.

The Fed should use interest rates as the target and then operate through the monetary base. The Fed can buy and sell bonds in the open market. Now, when the Fed sells bonds in the open market, it makes the monetary base grow more slowly or actually shrink. When the Fed buys bonds in the open market, the monetary base expands more rapidly or stops shrinking.

Interest rates are the market's forecast of inflation. So, therefore, when the Fed sees short-term interest rates rising or high, the Fed should sell bonds in the open market and contract the rate of growth of the monetary base until those short-term interest rates come back down.

Bob Eisner is totally correct. There are dollars in Russia and that is part of the monetary base. But the Fed operates through the monetary base. The only way the Fed can affect the money supply or the monetary system is by open market operations and also the discount window and borrowing reserve. So, that is how the Fed operates. They cannot control M1 directly. They can only control a part of that, but they should

use interest rates as their target and then they should use the policy instrument of operating through the monetary base.

Senator Sarbanes. Well, what do you think they should be doing right now?

Mr. Laffer. Selling bonds in the open market and contracting the rate of growth of the monetary base.

Mr. Eisner. That will raise interest rates.

Mr. Laffer. No, that will not raise interest rates. That is why I said the difference is in the direction. Slower growth in the rate of growth of the monetary base will lower interest rates. It will not raise interest rates. This person's view of the world. His view is that slower growth in the monetary base will raise interest rates. I do not believe he is correct in that.

Senator Sarbanes. How do you square a contraction of the monetary base with a drop in interest rates?

Mr. Laffer. What?

Senator Sarbanes. As I understand it, you would contract the monetary base.

Mr. Laffer. I would have it grow at a slower rate. Yes, that is correct.

Senator Sarbanes. And you think that would bring interest rates down?

Mr. Laffer. Down, yes.

Senator Sarbanes. Explain that to me.

Mr. Laffer. Well, my view is basically that inflation is too much money chasing too few goods. My view is that interest rates are the best forecasters of inflation. The 91-day Treasury bill is the market's forecast of what the nominal yield will be over the next 91 days, which is primarily inflation. All the research studies I have seen show that the best forecast of what inflation will be is the 91-day Treasury bill, FAMA, and all others.

So, therefore, I would make inflation lower by contracting the rate of growth of the monetary base until those interest rates came down and until the market incorporated it in their forecasts. That is exactly how I would do it.

Mr. Kudlow. Just a couple of points. I am generally in agreement with what Art just said.

I think you asked the right question, if you do contract the base, what happens to rates in the short-run? I would posit a slightly different response. I think short rates would rise. I think medium and longer rates would fall because of the inflation expectations effect, what someone used to call rational expectations. I think within 90 days short rates would retreat. So, it is a very mild adjustment.

But I do not think the Fed should focus on rates. I think they should focus on the balance sheet.

I also wanted to raise a point that Bob Eisner raised. With respect to the monetary base, if I could just clarify this base stuff, the concept of the base was invented many, many, many years ago as a counting mechanism to explain monetary operations of central banks. Most of the literature in the early days was around the Bank of England.

The central bank controls the source of the base. It does not control the use of the base money. What do I mean by that? The central bank can make loans through the rediscounting process and the central bank can add or subtract its investments by buying or selling Treasury paper, Government paper. Now, they can also change reserve requirements, but I want to set that aside for the moment. I want to set that aside.

This is the source of the base. In the Fed's sheet, to which I referred earlier, H41, factors affecting reserve balances, reserve bank credit, which is the formal name for the source of the base, is roughly $404 billion as of the banking week ended February 23, 1995, of which U.S. Government securities comprised about $370 billion. The rest of it is divided into things like float, other Fed assets, the stock of gold, SDR's, things that do not change very much. What changes on the margin is the Fed's holdings of securities. That is the key.

Now, the use of it, what I call the demand for the base, I think Bob Eisner was right. That can either be banks requiring more reserves or individuals requiring more currency, and since we live in an integrated markets, that currency can slip all around the world.

But the point is you have to start someplace. This is an old debate, and to some extent the monetarists -- and really my professor at the University of Rochester, Carl Brunner, along with Alan Meltzer and others. The base is what the Fed controls. The source of the base is what the Fed directly controls. It is all the Fed directly controls. When it provides reserves, it is adding to the source of the base, the supply of new dollars. Only the Fed can create new dollars. There is no magic to this process. The Fed is the bank with monopoly powers. We could change that, but that has been the rules for a long time.

I would sell Treasury bills, shrink the asset side, and I believe that would bring down interest rates.

Senator Mack. Again, I thank all of you for your participation this morning, and I am now going to move to the second panel. Thank you very much.

Mr. Laffer. Thank you for having us.

Senator Mack. Dr. Angell, if you would come forward.

I am especially pleased to introduce Wayne Angell today. In a *Wall Street Journal* survey of 58 private economists in 1994, Dr. Angell proved to be the most accurate forecaster of growth, inflation, and interest rates. Dr. Angell is currently Senior Managing Director and Chief Economist for Bear, Stearns. Prior to joining Bear, Stearns, he served eight years as a member of the Federal Reserve Board. He was chair of the Board's committee on the Federal Reserve Bank activities and chair of the G-10 Committee on Payment and Settlement Systems. A native of Kansas, Dr. Angell, is a former Kansas state legislator and served two terms as Director of the Federal Reserve Bank of Kansas City. He is a widely respected expert on U.S. and global economic trends, and we are especially interested in his insights on today's topic.

Again, I thank you for coming this morning and participating in this hearing. If you will proceed and make your opening statement.

PANEL II

STATEMENT OF WAYNE D. ANGELL, CHIEF ECONOMIST AND SENIOR MANAGING DIRECTOR, BEAR, STEARNS & CO., INC.

Mr. Angell. Thank you, Mr. Chairman and Senator Bennett.

I would appreciate having my remarks enclosed in the record, including "A Single Goal for the Fed," which I included along with my remarks, which ran in *The Wall Street Journal* as an op-ed piece last year.

Senator Mack. So ordered.

Mr. Angell. I want to thank you for the opportunity to discuss and review the multiple goals set for monetary policy in The Full Employment and Balanced Growth Act of 1978. It is important to make it clear that it is entirely appropriate for the government to pursue multiple goals for the economy. Lowering our unemployment rate, increasing our economic growth rate, and maintaining a stable price level are all important goals for government policy. The issue before us today,

however, is which of these goals should be assigned to the Federal Reserve and which should be assigned to other government agencies. In other words, what can and should we ask monetary policy to do and what goals should be assigned to other policy tools?

I have a reputation, it seems, for having a high preference for price level stability and zero inflation. Yet, it is not true that I prefer that goal over economic growth or over low unemployment rates.

Senator Mack. Could I get you to hold for just a moment?

Dr. Angell, go ahead.

Mr. Angell. Our government policy should seek to achieve the maximum sustainable growth rate of the economy and productivity over time since this creates the largest amount of resources for consumer spending and investment for generating tax revenues that can be applied to reducing the Federal budget deficit. It is also a worthy goal to seek the lowest sustainable unemployment rate to ensure the maximum participation of the people of the United States in the gains of economic growth. However, we must ask ourselves, what is it that monetary policy can contribute to achieving these goals?

The growth of the economy is determined by fundamental factors such as saving and investment, growth of the labor force, and technological progress. The unemployment rate is determined by job creation and labor force participation which in turn is influenced by marginal tax rates, including payroll taxes, the structure of welfare benefits, and the skills of the labor force. We need policies that promote saving and investment, encourage labor force participation, and seek to promote a better fit between the skills of the work force and the needs of employers. I suggest that the Joint Economic Committee ask the Council of Economic Advisers to investigate and then produce a report on what policies can be adopted to achieve these goals.

My own belief is that reform of the tax system in the direction of a flat tax on consumption rather than the current income tax system, with its high marginal tax rate on saving, would do much to remove the disincentives to saving and investment. I do not believe that assigning monetary policy to achieve the goals of lower unemployment or faster growth can achieve anything useful. Maintaining the current multiple goals for the Federal Reserve will continue to be counterproductive.

Monetary policy determines the scarcity of money relative to the amount of goods and services in the economy and hence the purchasing power of money. Accommodative monetary policy can temporarily

boost the utilization of resources and hence temporarily lower the unemployment rate, but this is not sustainable and has a cost in terms of higher inflation. A boost to money creation enables producers to raise prices, effectively lowering the real wage of workers. Workers eventually respond by asking for higher wages to catch up for the past increase in prices and also for additional increases to protect against higher expected future inflation. Eventually, unless the Federal Reserve is going to accommodate a permanently higher inflation rate, monetary policy must shift to a restraining mode to lower expectations of future inflation. As the economy adjusts from an accommodative setting for monetary policy to a restrictive setting, a period of economic slowdown and rising unemployment usually ensues. The longer the Federal Reserve accommodates rising prices, the higher the rate of inflation will go and the greater will be the cost of restoring lower inflation in terms of unemployment.

The best contribution that the Federal Reserve can make to a permanently faster growth rate or a lower unemployment rate is by focusing on the single goal of price stability. A stable price level eliminates the inflation tax on saving and investment. The U.S. tax system heavily penalizes saving in a period of inflation since for the purposes of computing taxes neither interest, profits, nor capital gains are adjusted for the erosion of purchasing power of the original investment due to inflation. The higher the inflation rate, the lower the after-tax return to investment. In addition, the uncertainty over the Federal Reserve's determination to pursue price stability under current legislation creates a monetary policy uncertainty premium that boosts interest rates. Moreover, the cyclical swings in resource utilization due to the changes in the stance of monetary policy produce an inefficient usage of resources and depress the demand for capital goods.

This historical evidence that the best contribution that the Federal Reserve can make is pursuing stable prices is clear. During the Bretton Woods era, when monetary policy kept an eye on maintaining the dollar's value in terms of gold, the average annual growth rate of real GDP from 1950 to 1968 was 3.8 percent, while the inflation rate measured by the CPI averaged 2.1 percent. However, after monetary policy lost its anchor and increasingly focused on fine tuning the real economy, the inflation rate moved higher, while the growth rate fell sharply. From 1970 to 1980, the average growth rate fell to 2.8 percent, while the inflation rate moved up to average 7.8 percent. The Federal Reserve's focus on restoring disinflation in the 1980s lowered the average inflation rate to

3.6 percent over the 1983 to 1994 period, while the average growth rate increased to 3 percent. It seems fairly apparent that there is no long-run tradeoff between inflation and growth.

It also seems apparent that the cost of servicing the Federal debt would be reduced if the Federal Reserve were to focus solely on maintaining a stable price level. In my judgment the level of interest rates could fall by at least one percentage point if the Federal Reserve's only goal was price stability. Back in 1968, at the end of the Bretton Woods era, but in a period in which the inflation rate was almost where it is today, the average interest rate paid on the Federal debt was 4.1 percent. Last year that average rate was 5.9 percent. In other words, the average interest rate paid on the Federal debt was about 30 percent lower in 1968 than in 1994. This comparison suggests that the elimination of the inflation and monetary policy uncertainty premiums from interest rates could ultimately lower the funding cost of the Federal debt by about $60 billion a year at current debt levels.

The Federal Reserve needs to be provided with the single goal of seeking and maintaining a stable price level. The transition to a stable price level must be made in the most efficient way possible. We do not want a destabilizing monetary shock. We need the Federal Reserve to carefully plan the transition to a stable price level and then explain that transition to the Congress and the American people. If we had a single goal, then the Federal Reserve could tell us when the current rise in the rate of inflation will come to an end, when the process of disinflation will begin, how fast the inflation rate will come down, and when price stability will be achieved.

Monetary policy can contribute to increasing the potential growth rate of the U.S. economy. If monetary policy focuses solely on a smooth transition to price level stability, then it will be making its maximum contribution to increasing the growth potential of the U.S. economy. If, on the other hand, we ask monetary policy to maximize short-term growth at the sacrifice of price level stability, then monetary policy will contribute to a lower growth rate rather than a higher growth rate. We need to clearly understand that when monetary policy falls into a destabilizing pattern, both actual and potential economic growth fall below optimum rates.

Thank you.

[The prepared statement of Mr. Angell appears in the Submission for the Record.]

Senator Mack. I thank you for your comments, Dr. Angell, and again I welcome you.

I think my first question would be if we are going to give a single objective to the Federal Reserve and that objective is price level stability, what do you use as a guide? What target range are we talking about or are you just talking about zero?

Mr. Angell. Mr. Chairman, my preference is zero. Chairman Alan Greenspan has stated it somewhat differently, but not significantly differently when he says he wants inflation to be so low it will not make any difference. Now, I do not understand why anyone would want to get the inflation rate down so low that it would not make any difference and not go ahead and finish the job, but I think that is a next century debate, not this century.

If $100 fell in purchasing power to only $92 in 40 years, I would agree that is close to not making any difference, but that would be an annual rate of inflation of one-fourth of 1 percent. When you get disinflation underway, you pay for the transition when you do something unexpected, but as long as the Fed continues to pursue the expected policy, then the price has been paid in regard to its credibility. So, there is no reason to stop, it seems to me, at one-fourth of 1 percent, but that is not worth quibbling over.

Senator Mack. Again, what kind of target would you use? What I am trying to get at is, what measure would you use? How do you measure inflation?

Mr. Angell. Mr. Chairman, it seems to me that it is always in our interest in legislation, to have legislation be as simple as possible. I think we will have more congressional staff and more executive branch staff when we have complex legislation. I would prefer to ask the Federal Reserve to tell the Congress what inflation gauge they wish to use in the pursuit of price stability. I would prefer to take the measurement outside the political arena and hand it to the Federal Reserve. I would ask them to report to the Congress as to what measure they have chosen and I would ask them to evaluate that measure in a semi-annual report in the future.

So, it seems to me the Constitution of the United States makes it clear that in the legislative authorization, it says the legislative branch shall have the power to coin money and to protect the value thereof. So, there is a constitutional responsibility of the Congress to have the report.

Now, Senator, I do not quarrel with those who want to go a slightly different way and to specify in legislation. I would prefer to put the onus squarely on the Federal Reserve by asking them to tell us what they mean by price stability and what index they believe should be used and thereby to hold them accountable.

Senator Mack. Now, would you put that in the legislation, that is, whatever they chose, whether it be the price of gold or indexed bonds? If they select a particular measure, would you then write that into the legislation, or would you just leave it up to the Fed to make that determination? Would that determination change from year to year to year?

Mr. Angell. I laid out more precisely in "A Single Goal for the Fed," an op-ed piece in *The Wall Street Journal*, the way I would delegate that decision to the Board of Governors of the Federal Reserve System. I would not expect them to be flitting from one definition to another. I would expect them to remain very responsible, and I would expect them to put the best minds they have to work on that question.

Senator Mack. Well, let me just raise this point. The Federal Reserve Board is a constantly changing board. Right?

Mr. Angell. Yes.

Senator Mack. The Board is appointed by the different Presidents of the United States and therefore it is arguable that the make-up, focus and direction of that Board is going to change over time. I guess my concern is that you could move away from what would be a good measure and a good target because of the change in the makeup of the Board.

Mr. Angell. Yes, sir. I understand that argument and I have some sympathy for it. Maybe as an alumnus of the Federal Reserve I have a lot of confidence in that organization in regard to doing the homework that needs to be done, and I see that as being somewhat advantageous to, in a sense, writing a straitjacket which I think misses the debate.

Now, some would even go farther than your question might suggest and say we should have it in the Constitution because, after all, not only can Fed Board members change, but also Members of the Congress change.

I would prefer to begin with the first step by a vote of confidence in the Federal Reserve because it is the Federal Reserve's credibility that is so important around the world, and I would like the action which could give us immediately the greatest interest rate benefit from the action. I think the world capital markets would be benefitted by a statement of

confidence in the Federal Reserve to define the goal and to tell us the time table for reaching price stability.

Senator Mack. Let me just raise another area and then I will turn to Senator Bennett.

There are those who say that if we move and change the focus of the Federal Reserve, giving it a single objective -- and that single objective is price level stability -- that we would see higher interest rates. Do you believe that is the case?

Mr. Angell. Oh, no. I think we would immediately see lower interest rates because the world's capital markets clearly are focusing on the credibility of monetary policy in the political environment in which the Federal Reserve does its work. Under the current Humphrey-Hawkins law, it just is not clear but what the Federal Reserve right now ought to be pursuing a very expansionist monetary policy to drive the unemployment rate down to 3 percent. Now, if the Federal Reserve tried such an action, we know that the unemployment rate might temporarily dip for several months, though we know the unemployment rate would probably go to 13 percent rather than to 3 percent because it would be a disruptive shock in the confidence of the world's capital markets.

I cannot overemphasize how much the world's capital markets have changed. We have people everywhere, including Americans, that are choosing the currency of choice for them in regard to storing their economic assets, and as long as we have the uncertainty that now exists, then the U.S. dollar suffers enormously and we will not make progress toward getting interest rates down.

I happen to favor low interest rates. I think I have been somewhat misunderstood. People think that I like high interest rates. Nothing could be farther from the truth. I would like legislation in the Humphrey-Hawkins Act that would give us the lowest possible interest rates and the most rapid economic growth. I am a growth economist.

Senator Mack. In your response you said that interest rates would fall if we targeted price level stability. Were you referring to short-term or long-term or to both?

Mr. Angell. I am referring to both. You see, what happens is that monetary policy creates expectations on the part of the people of the world as to whether it is better to hold dollar financial assets or to hold real assets. The balance has tipped to where the world believes it is better to hold real assets. When people in the world want to hold real assets, producers want to produce real assets, and we end up with a

capital goods shortage. That pulls the whole yield curve of interest rates higher. The world expects high rates of return on capital -- and certainly it does -- because last year, in 1994, capital goods imports ran 27 percent higher than they did in 1993.

Now, the fellow from Texas talked about a sucking sound. He was right. There would be a sucking sound, but he was wrong in regard to designating the factor. It was not labor, but it was capital. The sucking sound we are hearing is a very vibrant U.S. economy, and at these exchange rates, the rate of return on capital goods in the United States will remain much higher than anywhere around the world. And so the Federal Reserve may be tempted to artificially hold the Fed funds rate low, but attempts to do that only make the Fed funds rate go higher.

So, the way to get the Fed funds rate low is to have absolute confidence that the Federal Reserve has the support of the Congress and of the American people in regard to providing them with sound money, and if we do that for American citizens, we will not even think about or worry about the exchange value of the dollar abroad.

Senator Mack. Let me just try one more time here. There are those who believe that there would be an interim period once the legislation was passed, in which you would see a jump in rates as a result of the Fed's efforts to reach this price level stability. What is your reaction to that?

Mr. Angell. My reaction is we could have two alternatives to look at. We could require the Federal Reserve to immediately pursue a zero inflation target or price stability and require them to abandon everything else and to produce a monetary policy shock. If we did that, short-term rates would temporarily rise, but those rates might go so high that they would rather quickly come down.

But I do not favor such a monetary shock transition. I favor a program that will enlist the American public's desire for sound money, but we do not want to give them sound money by taking them across a dirt path and down ditches and through the streams in order to get where we want to be. So, I would prefer that we make the transition by delegating the responsibility to the Federal Reserve for indicating the way it will go. You see, I believe that the rate of inflation in 1996 already is in the pipeline higher than 1995. The Federal Reserve can in no way, without producing a real shock, get 1996's inflation rate down.

Senator Mack. So, you are suggesting there is a transition period here.

Mr. Angell. I am suggesting there is a transition period, and it does not do us good to know where we want to be and to wreck the ship on getting there. So, transition is very, very important.

Senator Mack. Do you have a sense about how long that transition period should be?

Mr. Angell. Well, my guess frankly is that the best the Federal Reserve can now do is to insure that 1997's inflation rate is not higher than 1996. So, I think it is 1998 before we can have a smooth transition to disinflation.

Now, I think it is very important that the Federal Reserve make it clear what its plan is and that it market its plan to this Committee and to the Congress, and that it then has that support and proceeds so that people can act with more certainty.

We have seen, when our friends in Mexico have taken a course of monetary policy uncertainty, that it is not just inflation that drives interest rates up, but it is monetary policy uncertainty. U.S. interest rates did not rise in 1994 because inflation had moved up that much. It arose because there is uncertainty as to what the Federal Reserve goal is. If we just knew what it was -- and, of course, the Congress has every right to ask the Fed to tell us.

Senator Mack. Thank you very much. Senator Bennett?

Senator Bennett. Thank you, Mr. Chairman.

I agree with you, Dr. Angell, that the Congress should not set the measure of price stability and that the Fed should set it. But I am now going to put you back on the spot that the Chairman tried to put you on and that you so adroitly got away from.

You have served as a Member of the Fed. Let us assume Congress has passed the law, you are back on the Fed in the Fed's discussion of what it is going to recommend to Congress. What would you recommend to the Fed?

Mr. Angell. Senator Bennett, I certainly do not wish to dodge that. I would recommend commitment to price level stability which is even a higher commitment than zero inflation. Price level stability suggests that if there are temporary shocks that drive the price level up or down, the Federal Reserve policy should commit itself to taking the price level back to where it was before.

Senator Bennett. What measure would you use? You are in the same room I put the other four in I think. What do you want to be in that envelope?

Senator Mack. He was not here when you asked that.

Senator Bennett. Oh, I am sorry. Were you here when I asked that question about --

Mr. Angell. No, I was not, but I can guess, Senator.

Senator Bennett. Okay. Specifically I guess I am asking, do you want to peg price level stability to gold? Do you want to peg it to the CPI? Do you want to peg it to a basket of goods? Do you want to peg it to some combination?

Mr. Angell. My preference as a member of the Board of Governors was to look at the CPI year over year rate of change, which this morning was announced at 2.9 percent, up from the 2.3 percent that was achieved in April of 1994. So, we are already seeing the CPI inflation rate move upward.

Now, I share with Chairman Greenspan some questions in regard to the accuracy of the CPI measurement, and if I were on the Federal Reserve Board, I would want the best index that has the best credibility you can have. So, I think it would be necessary to put the resources to work to give us exactly the right index.

But I would prefer, if I were a member of the Board, not to predetermine the outcome of the research effort. I would want to have the best people I can get in the Federal Reserve System and the best people outside the Federal Reserve System and to concentrate on doing it just right because it is very important.

Now, the price of gold I find to be a very helpful indicator property in regard to judging monetary policy. When we were in the Bretton Woods system and the price of gold was locked at $35, we had no indicator property in regard to gold and we were not operating with automaticity in regard to gold flows. So, we were neither fish nor fowl.

Now, I believe in a transition environment, it is very helpful to have gold, along with the foreign exchange value of the dollar and along with commodity prices as forward-looking indicators to help make the transition as smooth as possible.

Now, I just do not have as much wisdom as some of my friends have who seem to know precisely what the price of gold should be, and I do not know that answer and I am not sure that the price of gold, if we were targeting it, would be the same as if we were not targeting it. That is, I think we would need to proceed to price level stability and, as we do, to watch gold and other commodity prices carefully, and then I think the price of gold will tell us its proper level in case someone wishes to be so

encouraged by the economic growth improvement and in lowering the unemployment rate that we can when we have the proper focus so as to take the next step.

I would prefer to take the step with a managed system with new instructions. I believe that central banks around the world that have very clear instructions and support of the people of the country, that they do better than we do if we have to dance after one goal and then another. So, I feel so strongly the Humphrey-Hawkins Act must be changed. I feel so strongly we have to get away from the monetary policy uncertainty penalty on interest rates whenever the Federal Reserve says we are independent within government.

Now, frankly, Senators, it always caused me to cringe when people at the Fed said we were independent within government. I always thought, gee, that means we are getting ready to do something very wrong. You see, what that means is if you have got the present Humphrey-Hawkins Act specifying 3 percent unemployment and you have an election that is about jobs, jobs, jobs, there is a feeling at the Fed that the Fed ought not to be indifferent to that, and so the Fed gets caught under the statute interpreted as most Members interpret it. They get caught trying to go after this goal and trying to go after that goal. That produces economic instability that is very, very costly for this Nation.

I am sorry to be so roundabout. I guess your question bothered me.

Senator Bennett. Well, good.

(Laughter.)

But what I hear in your answer is that you would ask the Fed staff to construct a measuring device that we currently do not have, that does not exist, and then you would use the price of gold as an indicator of how well that was working instead of using the price of gold as the device itself. Is that a fair summary?

Mr. Angell. That is a fair summary, and there is an additional explanation, Senator. I certainly know that the world's performance was improved when the gold standard was there that gave us much less inflation trends, very shallow and very slow, and much slower and shallower deflation trends. But I do not believe that any country ever succeeded in legislating the gold standard into place until it was already an accomplished fact.

Senator Bennett. I see.

Mr. Angell. The world got to the gold standard not because government in the United Kingdom, in England, was so smart. It was not

that at all. We got to the gold standard because the private Bank of England found it to be in its best interest to keep its promise, and they kept it while holding a very little bit of gold. But they held such little bit of gold and every once in a while there would be a run on gold and we would have a temporary economic crisis event, but they never lasted very long. So, it was a private motive that produced the gold standard.

We in the United States in 1900, after we had already accomplished the deflation from 1865 to 1890, then wrote into the code the gold standard, after we had already achieved it.

Senator Bennett. I see. You achieve it first and then --

Mr. Angell. I believe you have to achieve it and then you realize that transition choice.

Now, I am not far-seeing enough to know what it might seem like to us in the year 2000 in regard to, again, looking at this choice. I hope -- and I would be a part of an advocacy of always having the gold choice alternative in front of us, but I prefer to proceed in a different way than to assume that all of a sudden we can get the number of votes in the United Sates Congress to do what I have a hunch might be very good for this Nation.

Senator Bennett. I see. Let me go back to my other discussion with the previous panel, and I think you hit on it when you said people have to decide whether they want to put their resources into money assets or physical assets. Of course, that is a decision we make all the time. In a time of hyperinflation, obviously, you do not want any of your resources in money assets. So, anybody who opens a savings account in the Deutschebank in 1932 or the height of the hyperinflation that occurred in Germany -- I may have my years wrong, but in the 1930s prior to the arrival of Adolf Hitler -- is obviously nuts. You do not want to put any money in a savings bank in that situation. You want to run right down to the grocery store because they are raising prices so rapidly that if you buy something in the afternoon, you are going to pay more for it than if you bought in the morning.

We got into that discussion with the previous panel. I posited the hypothesis that if we got price stability to the point where people would assume there would be no erosion in the purchasing power of the money, that our savings rate as a nation would go up fairly substantially. People would be willing to invest in a savings account as opposed to a house or a share of stock.

There were some members of that panel who did not like that suggestion at all. I would like your comment on it. Do you think, in fact, price stability would produce increased savings in the country?

Mr. Angell. Price stability over time will produce a dramatic preference for saving that now does not exist. You see, what we fail to get emphasized is when we take marginal tax rates high, it is the people in the highest income categories that have the most potential to save a lot of money, but when you are in a 42 percent Federal income tax bracket and at 10 percent with deductibility state income tax and maybe a local income tax, you end up at 48 percent marginal tax rates. When the rate of inflation moves above 3 percent, the rate of return on savings and money market mutual funds and banks goes below zero. That is, the rate of return, when you get the inflation rate above 3, goes below zero, and individuals are very foolish, given our tax laws and our high marginal tax rates, to save.

Now, saving, Senator, is something that we know is somewhat of a habit pattern kind of an event. So, we cannot change the event without a change in our tax laws. Now, if we had a change in our tax laws, we could change behavior more dramatically, but when we change monetary policy behavior, there will always be those out there who will say, oh, come on now. They will get back at it again. Or there will be those who will say, well, the budget deficit is still large. The Fed will have to monetize it. There will be all the stories out there.

Now, if we can get savings down, then we will provide incentives to --

Senator Bennett. Get savings down?

Mr. Angell. I am sorry. If we get inflation down, we will provide the incentives to save even with a very unfortunate tax code. Saving, of course, is the solution to our problem. We cannot be a powerful Nation politically, militarily, and economically if we have ourselves hostage to bribing the people around the world to hold money in the United States to counteract the fact that our inflation rate may be unpredictable. It is a very bad thing to try to bribe people to hold your currency.

Senator Bennett. And you do that with high interest rates.

Mr. Angell. And you do that with high interest rates, and we can see examples around us of how punitive that is and how that slows growth and how that causes unemployment to rise.

Senator Bennett. I see. Thank you. I appreciate that.

Senator Mack. I really have only one additional question that I would like to raise.

Are there any special circumstances under which a price level stability target should be ignored? What escape clauses might be needed in any law focusing the Federal Reserve on price level stability?

Mr. Angell. Mr. Chairman, I am glad you asked that question. Being a student of U.S. financial history and world financial history, I have noted that quite often monetary policies ignored the rules in times of war. Now, my strong preference is never ignore the rules in times of war. Economic stability will always make the system more efficient, and so you do not want to ignore the rules in times of war. That is, economic growth will work better -- shipping the resources out of private goods production to defense production works better if we have prices giving us clear signals. Inflation runs the evil of covering up what we call relative price changes. If this country has a new emphasis it wishes to make, that will cause a change in relative prices. That is the way the system works. If we want more of something, we bid up the prices. What we want to have is we want to have people know, well, wait a minute, that change in prices is not just inflation. So, thereby we do not get the incentives to respond if it is thought that it is just inflation. So, my preference would be to make no exceptions and to always expect that whatever we are doing, that sound money is the wise course.

I have said at times, Senator, that Adam Smith, when he wrote his *Wealth of Nations*, had a missing book from the *Wealth of Nations*. The book was missing because under the Bank of England's commitment to honoring its promise, there was not any inflation and Adam Smith wrote about the invisible hand in an environment of sound money. So, sound money is one of the greatest blessings a country can ever have, and I appreciate your interest and support of this effort.

Senator Mack. Well, again, I thank you for coming this morning. I thank you for your comments and appreciate your being here.

We will move now to the third panel. Well, again, let me express my appreciation to the three panelists. First we have Thomas Havrilesky who is a Professor of Economics at Duke University. He has published extensively, authoring over 100 articles and 11 books. Dr. Havrilesky serves as a consultant to a number of textbook publishers, banks, savings and loan associations, and trade associations. In the past decade, he has been invited to present his research papers before 14 different educational institutions, and although Congress is not an educational institution, we

are eager to hear what conclusions Dr. Havrilesky can share from his research on the monetary system.

Jerry Jasinowski is President of the National Association of Manufacturers, (NAM), the largest broad-based industry trade association in the United Sates. NAM represents more than 13,000 manufacturing firms and subsidiaries located in every state. Mr. Jasinowski has been with NAM for 15 years. He was Executive Vice President and Chief Economist for 10 years before being promoted to President in 1990. Prior to his tenure at NAM, Mr. Jasinowski served in the Carter Administration's economic transition team. From there he went on to be an Assistant Secretary of Policy in the U.S. Commerce Department. In the early 1970s, he worked for this very Committee and we welcome you back to the Committee today.

David Meiselman is a Professor of Economics and Director of the Graduate Economics Program in Northern Virginia at Virginia Polytech Institute and State University. He is a leading authority and scholar in economics and finance, author of five books and over 100 articles. Dr. Meiselman has done extensive research in monetary policy, inflation, interest rates, and numerous related public policy issues. He is a founder and former member of the board of directors at the Manhattan Institute. Dr. Meiselman is an Adjunct Scholar of The Heritage Foundation, the American Enterprise Institute, and The Cato Institute. He has served as a consultant to the Secretary of the Treasury, the World Bank, the New York Stock Exchange, and several Wall Street firms.

Again, I thank all three of you, and Dr. Havrilesky, why do we not start with you.

PANEL III

STATEMENT OF THOMAS HAVRILESKY, PROFESSOR OF ECONOMICS, DUKE UNIVERSITY

Mr. Havrilesky. Beginning with the work of Milton Friedman about 40 years ago and intensified by the rational expectations revolution in the 1970s and 1980s, and supported by recent empirical work, a stream of economic research indicates that insulating the central bank from political pressure will improve inflation performance.

The attainment of zero inflation will reallocate resources away from speculation and price searching and repricing. Also, it will reduce uncertainty, thereby encouraging long-term planning. It will encourage saving and investment. Thereby, it will increase efficiency, boost economic growth, and raise wealth. The benefits are even greater when

one considers that our major trading partners are currently moving toward restructuring their central banks in ways which will improve their inflation performance. If their inflation performance improves and ours does not, our international competitiveness will suffer.

In order to gain the benefits of price stability, some may contend that we must sacrifice the ability of the Federal Reserve to manipulate real interest rates, real exchange rates, output, and employment. However, modern economic theory shows that such leverage is only temporary, predicated on monetary surprises.

Monetary surprises lead invariably to higher inflation. Moreover, they require that a shroud of uncertainty surround the monetary policy process. This converts monetary policy into an arena for political jousting, involving vested interests, Fed watchers, and an assortment of groups which might gain from monetary manipulation. This environment also virtually requires that the Federal Reserve invest taxpayers' resources in shielding its policy moves. Moreover, all of these activities consume resources that otherwise might be productively employed.

Finally, we should not overlook the fact that when monetary policy is so politicized, it advances coercion and threat at the expense of market exchange as a social organizer. In this era of social disarray and disruption of community fabric, the atmosphere of order and trust that is associated with a stable monetary environment should not be lightly regarded.

Now I want to talk about my empirical research on political influences on monetary policy.

My research that is pertinent to these matters falls into two areas. The first area involves measuring the effect of political pressures on monetary policy. I have a number of items listed in my statement here which covers that area of research. It derives from 40 years of investigation of *Wall Street Journal* articles in which any person in the Administration -- if ever anyone in the Administration had anything to say about monetary policy, I coded that article plus, minus, or zero, indicating whether the Administration spokesperson wanted easier money, tighter money, or no change. I did that for 40 years.

In the past 30 years, the observations after the early 1960s, the amount of political pressure so measured on monetary policy intensified, which confirms a lot of suspicions. Using that measure on a weekly basis, I found about 15 ways to Sunday that short-term interest rates, basically the Federal Funds rate, responded within 3 weeks to those signals. That

series is called SAFR, that acronym SAFR standing for signals from the Administration to the Federal Reserve.

Now, what is more important is that when I break this data down into particular subperiods, they show that under no Federal Reserve Chairman in the past 25 years, with the exception of the curious and brief tenure of G. William Miller, has the Federal Reserve not at some time or other been responsive to Administration pressure. These results suggest that compliance takes place whenever the Chairman has political or partisan allegiance to the Administration.

For example, the data indicate that Fed monetary policy, as measured by the change in the Federal Funds rate and on this signaling series, was responsive to Administration signaling during the Nixon-Ford-Burns era, the Carter-Volcker sub-period, and the Reagan-Greenspan period. It should be clear from this evidence that despite decades of ballyhoo, having a respected, conservative and experienced Chairman does not always provide protection against politically induced monetary excess. Structural reform of the Federal Reserve can provide institutional defense against such excess.

The second area of my empirical research involves studying appointments to the FOMC, the Federal Open Market Committee. Again, I list six items that I have published in that area at the end of this statement. These results are also published in the second edition of my book which is coming out next month. They indicate that FOMC members vote the preferences of the President who occupied the White House at the time of their appointment. Now, of course, that does not apply to all members. There is a group that did not vote the preferences of the appointing Administration, but there are definitely statistically identifiable groups that did.

Now, this correlation also applies to Reserve Bank presidents; that is to say, they tend to vote in partisan ways. My tests, however, also show -- and this is very important -- that bank presidents are more firmly opposed to inflation than are politically appointed Governors. So, when I control for the partisan affiliation of Reserve Bank presidents, I find that as a group they tend to be more conservative in their FOMC voting than are Governors as a group, Governors being politically appointed.

Now, those are the two main strands of my research. This research suggests that political influences on monetary policy that lead to higher and more variable inflation can be reduced by making the Federal Reserve more accountable. I like that word "accountable." There are several not mutually exclusive ways to increase the Federal Reserve's

accountability. One way is to make a singular price stability goal the only long-term policy objective for the Federal Reserve.

Another way would be to require the Fed to continue to specify its policy intentions, a practice begun as a tactical response to former banking Chairman Gonzalez, his concerns over the Fed's lack of accountability. This practice was begun tactically I believe by Chairman Greenspan early last year.

In addition, the Federal Reserve should also be required to divulge its forecasts and to stipulate what it would do if these forecasts and its monetary targets are not realized. Even further progress would require greater and more prompt Federal Reserve disclosure of edited transcripts of its policy deliberations.

Finally, as I originally proposed in the *Journal of Political Economy* way back in 1972 and as formalized by some recent publications by Professor Carl Walsh and Professors Fratianni, Walker, and von Hagen, the Federal Reserve should be subject to sanctions for poor inflation performance. That is the New Zealand model.

Senator Mack. Which is?

Mr. Havrilesky. In various ways to punish the monetary policy makers if the zero inflation goal is not attained. One way is to tie their salaries inversely to the inflation rate. That is the one I proposed in 1972.

Senator Mack. It was interesting. There was a proposal that some of us discussed yesterday on some of the implementing legislation to get to a balanced budget, that there ought to be a penalty on salaries of Members of the Congress with respect to our achievement of that, and this particular group thought quite highly of it.

But anyway, go right ahead.

Mr. Havrilesky. Well, another way would be to specify their budget in nominal terms, such that if you inflation, the budget shrinks in its purchasing power value.

In the New Zealand model, there are even more strict sanctions, including dismissal.

Senator Mack. If I could get you to wrap up.

Mr. Havrilesky. Okay. Some of these items on this list of ways to improve accountability may be opposed by Fed officials and their clientele in the financial services sector and in the financial regulatory bureaucracy under the ancient excuse that they constitute a tax on Fed independence. I do not buy that because I think independence has two

elements: autonomy and accountability. I just finished talking about accountability. Now, let me make just a remarks on autonomy.

You can increase the autonomy of the Federal Reserve by increasing the proportion of bank presidents on the FOMC, making the term of the Chairman six years instead of four, and stipulating that the Vice Chairmanship be assigned to the Governor with the most seniority rather than permit the current arrangement to continue wherein the Vice Chairman has been serving as the point man for the Administration. That has been going on since 1976.

Now, this goal of price stability should not be a straitjacket. I go along with the idea that during periods of crises, the price stability goal can be waived. However, I would like to see a zero inflation goal attained over an average, averaged out over a two, three, four-year period such that if a crisis occurs, on the back side of that crisis, the Federal Reserve will then, over the long haul, attain zero inflation.

Finally, I think that these proposals for greater accountability and greater autonomy are practicable; that is to say, they are not radical. They do not require an enormous revolution or some collective catastrophe to pass. One can engineer legislation which has bargaining chips in it for groups and constituencies that do not like one or two elements of the legislation. For instance, some group that is extremely important may not sign on to the zero inflation price stability. However, concessions can be made in other dimensions to have a practicable, that is implementable, monetary policy central bank restructuring package that is passable. Thank you.

[The prepared statement of Mr. Havrilesky appears in the Submission for the Record.]

Senator Mack. Thank you. Mr. Jasinowski?

STATEMENT OF JERRY J. JASINOWSKI, PRESIDENT, NATIONAL ASSOCIATION OF MANUFACTURERS

Mr. Jasinowski. Mr. Chairman, thank you very much for allowing me to testify representing not only my own views, but those of the National Association of Manufacturers.

I think the hearings that you are holding are of great importance for a couple of reasons. One, I think the extraordinary changes in the American economy that have taken place in the last decade are probably the greatest in this century. I have just finished writing a book on the comeback of American industry, *Making It in America*, and that

comeback is one of the great economic changes of the last decade, which has dramatically increased our productivity.

Among the other changes that are of historic note is the globalization of markets, the globalization of financial markets that Wayne Angell mentioned earlier, the computer and information revolution that has changed the way in which we do most things in our lives, the way labor markets have changed to become more competitive, and the general increase in competition in the overall economy and the effect that has on prices which in my judgment I think has changed the old-fashioned views that some people had of the Phillips curve and the relationship between output and prices. To some extent, I think it has changed the economy in ways which I have argued with respect to the Federal Reserve, that we are in a new economy in which the potential output of the economy is now greater because of both the changes in competition and the dramatic increases in productivity that have shifted potential output out closer to 3 percent rather than the 2.5 that the Federal Reserve has suggested. That I think is what makes these hearings so important.

I think also the Humphrey-Hawkins bill has been around a long time and certainly needs to be completely reviewed in terms of its usefulness in terms of what I just said.

Now, having said that, I want to argue some qualifications with respect to what I think is the trend of the testimony you have received so far with which I agree substantially I want to say. I think that the notion of reducing uncertainty, focusing on price stability as the key goal, and maintaining the independence of the Federal Reserve, a host of those are things, establishing clear rules where you can, I certainly agree with and want to reinforce, but now, my qualifications have to do with the following points.

First of all, all of the dramatic changes that we have seen in the economy have also changed the monetary system and we have all been surprised at the extent to which notions about velocity, for example, turned out not to be the case. Therefore, while I have a certain amount of affection for monetary rules myself, I just find that they have not worked to the extent that the monetarists have suggested, and this velocity item is one of those. So, we have to be very careful about single dimension rules.

That takes me to my second point which is the notion of having just an inflation rate as the goal for monetary policy. As I point out in my testimony, inflation is just one component of nominal GDP. The other component is, of course, real output. This point, while straightforward,

is worth emphasizing. For any rate of monetary growth, there is an implied growth rate of nominal GDP and hence of real GDP. It makes more sense to me to actually look at both components of growth in terms of setting policy as a general structural changes we have seen recently have been toward the emphasis of competition increasing and price stability matter rather than the single goal focus.

There is a second reason for wanting to do this and that is that there is no guarantee that by focusing on a single goal, you are going to eventually converge to the right long-run potential output. Changes in the short-term cycle, have impacts on technological advance, which in turn is the primary cause that drives potential output. The cycle could adversely affect long-term potential output.

I am really struck in the last decade at the extent to which technology change has been the principal factor that has caused manufacturing productivity to so dramatically increase and thereby change potential output. Now, I think those are due to long-term factors, and I do not want to suggest that monetary policy in the short-run is going to primarily affect that. But if you were to move to a zero inflation goal, for example, and run the risk of substantial long-term slow growth or a long-term recession, that could affect technological advance and potential output to some extent.

The third point I want to make is that I think all the being more and more the rule rather than the exception. In fact, I have argued in some circles that we are about to enter a period of long-term deflation in terms of global prices rather than any inflation of global prices as long as monetary authorities follow reasonable monetary policy. Of course, what we see in labor markets and in manufacturing product markets is that all of the emphasis is on prices being cut further because of this competition, discounting, and so on and so forth.

So, to end up saying that inflation is the primary goal is a little surprising in view of that in my judgment. I think that we just ought to be aware of the extent to which this new economy is one in which there appears to be dramatic changes in price-setting that add to the ability to grow at higher rates with lower inflation.

With respect to the zero inflation goal, I will just make two points. First of all, I noticed that Wayne Angell underlined that he is for price stability, and I want to underline that is our view too. Both myself and the NAM totally reject the notion that we ought to reflate ourselves out of particular problems at any time. We have been down that road and it has not worked.

So, the goal of policy should be price stability, but zero as the price stability has some problems it seems to me both because of picking the right target and the fact that we now have measures of inflation that exaggerate the inflation problem. I think that while expectations is a big part of the inflation problem, but when you get down to 2 percent and you start going below that, it is not simply expectations.

One of my greatest concerns is that people do not realize this is not a frictionless system at that level. There are imperfections in the markets, whether or not it is farm subsidies or other things, that are going to prevent you from getting down from 2 percent to zero easily. If we had a perfectly competitive economy, I would be the first to jump on the notion of zero inflation, but I think that as you move down, the tradeoff and the difficulties because of market rigidities increase.

Then finally, I will make the obvious point about the revealed preference of manufacturers which is in a relative price sense had prices for manufacturing increasing at half the rate of the economy as a whole because of our extraordinary improvements in productivity and the increased competition, if you were to move to zero inflation, Mr. Chairman, as a goal, manufacturers would have a disproportionately large part of the impact of that policy in our judgment. Therefore, we would be reluctant to be enthusiastic about it.

Thank you, Mr. Chairman.

[The prepared statement of Mr. Jasinowski appears in the Submission for the Record.]

Senator Mack. Thank you for your testimony. Dr. Meiselman?

STATEMENT OF DAVID I. MEISELMAN, PROFESSOR OF ECONOMICS, DIRECTOR, GRADUATE ECONOMICS, VIRGINIA POLYTECHNIC INSTITUTE AND STATE UNIVERSITY

Mr. Meiselman. Thank you. I wonder if I can have your permission to include my entire paper in the record.

Senator Mack. So ordered.

Mr. Meiselman. Thank you very much for the opportunity to appear before you today to state my views.

First, I want to associate myself with the introduction that Professor Havrilesky had to his own paper. I agree with everything he said there.

It seems to me that it is most appropriate that the Joint Economic Committee hold hearings on the Humphrey-Hawkins Act and the Federal

Reserve. Humphrey-Hawkins, The Full Employment and Balanced Growth Act of 1978, was passed at the height of beliefs that government could effectively forecast, plan, and control the detailed operation of the economy, even one as large, as complex, and as open to international forces as the American economy.

I recently reread the act, and it is a fascinating relic of another era, a time before the widespread public acknowledgment of the failures of statism and fine tuning all around the world and the associated collapse of socialism.

As I read it, the Humphrey-Hawkins Act establishes a number of laudable goals for the Federal government and the American economy. These include full employment, defined as a 3 percent unemployment rate of all people over the age of 20, zero inflation by 1988, and a balanced budget. The act also calls for policies leading to a high and sustained rate of private capital formation, encouraging exports and counter-cyclical fiscal policy fine tuning. The business cycle remained with us, but the Federal budget grew and grew partly because of fiscal policy fine tuning measures that were put into place during recessions.

The core of the Humphrey-Hawkins Act is an elaborate and complex set of fact finding and consultative procedures, as well as procedures for forecasting and then setting various goals and targets of national policy. Title III of the act contains the detailed policies and procedures for congressional review and involvement. Some of these largely revolve around *The Economic Report of the President* with the Joint Economic Committee having a central role in these elaborate forecasting, planning, and consultative activities.

Section 108, labeled Monetary Policy, directs the Board of Governors of the Federal Reserve to transmit to Congress no later than February 20 and July 20 of each year an independent written report reviewing and analyzing recent economic developments. It also requires statements about the objectives and plans of the Fed regarding changes in monetary and credit aggregates for the coming year "taking account of past and prospective developments in employment, unemployment, production, investment, real income, productivity, international trade and payments," and finally it adds "prices" and "the relationship of these objectives and plans to the short-term goals set forth in the most recent *Economic Report of the President*." So, there is an assumption that is the national plan. Despite major attention paid to interest rates by the public and despite the central role of interest rates in the Fed's own operating procedures, the act makes no reference to interest rates in the Monetary Policy section.

In any event, these Fed reports to the Congress are referred to the Banking Committee of the Senate and the Banking Committee of the House. The Act requires the Federal Reserve Board to consult with each committee on the reports. In turn, each Banking Committee is required to submit to its respective body a report containing its views and recommendations regarding the Fed's intended policy, but for many years the House Committee essentially ignored this requirement.

Thus, the Joint Economic Committee is essentially bypassed in dealing with the Fed, and the Congress and the relevant committees have not taken their statutory responsibilities seriously. In effect, hardly anybody on Capitol Hill seems to have cared despite the constitutional grant of power to the Congress "to coin money and regulate the value thereof," that is to be concerned and to fix the price level.

Although the Fed has been free to set whatever monetary target it wishes, including multiple target ranges that are so broad as to render them virtually hollow and empty, over the years the Fed has frequently missed its own monetary targets. This has impaired the Fed's credibility, but the Congress itself has imposed neither penalties nor much effective oversight or criticism of the Fed's performance, nor has Congress changed the rules or set up effective, meaningful standards of accountability.

Indeed, most of the Humphrey-Hawkins Act has turned out to be an empty exercise of questionable practical significance in shaping or influencing actual public policies or outcomes. Moreover, the goals of zero inflation, 3 percent unemployment, and a balanced budget have never been close to being achieved or even taken seriously.

In my judgment, the only useful aspect of the act is that it does require the Fed to make some public report on its performance and monetary targets at hearings that attract much wide attention. Although the reports and hearings are better than nothing, they are seriously flawed and structured to insulate or absolve the Fed of any commitment to and any accountability or responsibility for achieving and maintaining what they can attain by monetary policy, namely, a long-run stable price level. Moreover, the goal of stable prices is also clearly mandated in Section 2A of the Federal Reserve Act which states, "The Board of Governors of the Federal Reserve System and the Federal Open Market Committee shall maintain long-run growth of the monetary and credit aggregates commensurate with the economy's long-run potential to increase production so as to promote effectively the goals of maximum employment, stable prices and moderate long-term interest rates." The

law seems pretty clear, but the Fed has never been held accountable for carrying out this part of the Federal Reserve Act either.

Stable prices and a credible commitment to stable prices is precisely what the Fed can do to best achieve the other goals of maximum employment and moderate long-term interest rates. However, it is dismaying that neither the Fed nor the Congress seems to have paid much attention to the requirements of the Federal Reserve Act itself. The Fed has clearly not achieved the goals of either the Federal Reserve Act or the Humphrey-Hawkins Act. Congressional oversight has failed too, and there is no apparent enforcement mechanism for this section of the Federal Reserve Act. Thus, Congress itself shares complicity in these flawed arrangements.

With respect to monetary policy, in retrospect it was inevitable, indeed unavoidable, that the Fed could not achieve the multiple goals of the Humphrey-Hawkins Act even if it wished to do so. The Fed can essentially control a monetary aggregate via its direct control of the monetary base, which is currency and bank reserves. Thus, the Fed can directly impact financial markets by its own buying and selling even using its enormous buying and selling power to fix or peg interest rates or prices in particular markets such as the Federal Funds market.

But these initial financial market impacts are soon swamped by the consequences of the changes in Federal Reserve credit and in the monetary base that financed the Fed's borrowing, lending, and trading operations. Given our fractional reserve banking system, a change in each dollar of monetary base results in several times greater change in the money supply and in total bank credit. Thus, people far removed from the initial transaction find they have more or sometimes less cash and available credit without knowing that Fed operations were responsible.

It turns out that the longer-term effects of monetary change usually differ from the initial impact of Fed operations or of short-period changes in money. With varying and imprecise lags, the early effects of money may affect real variables such as sales, employment, and production. Over the longer run, the initial short-run real effects of monetary change dissipate and vanish. Only the price level is permanently changed. In the short-run, monetary policy can and does affect employment and business conditions, especially when the Fed surprises markets or creates uncertainty. In the long run, monetary policy can only affect the level of prices or create essentially permanent uncertainty.

Thus, there are certain targets and goals the Fed can reasonably achieve and others that it cannot. There are combinations of targets and goals the Fed cannot possibly attain, particularly since the Fed has essentially only one instrument under its control, the monetary base, and one instrument can at best achieve only one independent target at a time. For example, the Fed can target the stock of money as contemplated by the Humphrey-Hawkins Act, or the Fed can target the federal funds rate or exchange rates. It cannot do both. If the Fed employs its one instrument but keeps shifting from one target to another, it runs the risk of both increasing uncertainty and achieving no target at all.

Moreover, because of lags, variable lags at that, in the effects of monetary change, the limitations of our knowledge and the literal impossibility of having permanent real effects of changes in nominal money, it is dangerous folly to expect the printing press to achieve and sustain any level of employment and output. Indeed, both recent and ancient history are littered with the wrecks of regimes that have tried to inflate their way to prosperity or to use the printing press to cover up or offset the detrimental effects of other public policies.

Senator Mack. Doctor, if I could get you to conclude your statement.

Mr. Meiselman. All right.

What I develop further is that a lot of this consultation is a charade, and I say the effect of these arrangements is to have a set of formal reports and a large number of hearings and briefings, all of which give the appearance of close Congressional monitoring of the Fed and of Fed accountability of its actions, which I describe as a public policy Potemkin village.

What I would like to achieve is an attainable and a useful goal of monetary policy which is a stable price level, and it seems to me that the Fed is best directed to achieving and maintaining the goal that is already explicit in the Federal Reserve Act itself. There are certain technical and engineering details about how to get there and what to do, but I think that is best left up to the Federal Reserve itself. But it is vital that the Congress have the responsibility to monitor the Fed's performance and hold the Fed accountable for the results.

The Fed can do this by itself without any Congressional mandate. The problem with that is even if they start, the current Board of Governors and the Open Market Committee cannot bind the future Board of Governors and Open Market Committee, so there is no assurance that whatever the current policy, if they currently want to attain a stable price level, that a future Fed will do that.

Finally, although there is some inevitable disagreement about details, there is growing support for the principle of a mandated target and goal of a stable price level. Several years ago Congressman Neal proposed such a target, and the Board of Governors itself came out in support of the proposed legislation. More recently I believe Chairman Greenspan voiced similar support for a stable price level target, as have several Federal Reserve Bank presidents.

In fact, only this morning I read a speech delivered yesterday by the President of the Federal Reserve Bank of St. Louis that is in agreement with the general positions given in my testimony. In fact, he states, "The Fed cannot be fully accountable if it continues to have multiple policy objectives. Accountability in terms of price stability represents an achievable and measurable objective that is likely to affect inflation expectations and improve the performance of the policy makers," to which I add my amen.

It seems to me that it is time for the United States to mandate a stable price level and to hold public officials accountable for achieving it. Amending or eliminating the Humphrey-Hawkins Act would be a useful step in that direction, especially if combined with the kind of price level stabilization, accountability, and oversight I have outlined.

Thank you.

[The prepared statement of Mr. Meiselman appears in the Submission for the Record.]

Senator Mack. Again, I thank all of you for your testimony this morning.

If there was one message that I think came across loud and clear in this last panel is the issue of accountability, that there is no accountability. Dr. Havrilesky, in your comments you in fact addressed that and said that there ought to be sanctions put in place. I know that there are other countries that have passed legislation mandating price stability or focusing their central bank on inflation. They include New Zealand, Canada, Britain, and Germany. Have you looked at those areas, what has been done, and do you have some suggestions to make to us about whether they have been successful?

Mr. Havrilesky. Yes, I have. I have a paper that I am working on right now. I gathered data on inflation performance, accountability, and autonomy for 14 countries across the past three decades. It shows that accountability, as measured by whether central banks are held responsible for inflation, does indeed improve inflation performance. It

also shows that the longer the term of the chairman, in other words, the more autonomous is the central bank of that nation, the better is the inflation performance. These two factors statistically explain inflation performance across that sample of countries for over three decades.

Senator Mack. I have just been notified we have a vote with about seven and one- half minutes remaining.

Senator Bennett. I have no questions, Mr. Chairman.

Senator Mack. I am just trying to decide whether I should ask you all to wait and I will come back.

Mr. Meiselman. I am able to wait.

Senator Mack. Jerry, how about yourself?

Mr. Jasinowski. Sure.

Senator Mack. I do not have that many, but there are a couple that I want to raise and so I will be back in just a couple minutes.

(Recess.)

Senator Mack. I appreciate your willingness to wait while we concluded the vote. I will go ahead and raise some additional questions.

Again, if one of the issues is of accountability, then it seems we need to ask ourselves a question about how do measure success. Therefore, what is the measure of inflation, if you will? I would be interested to hear from the three of you what you think that measure should be -- CPI, gold, commodity prices?

Mr. Meiselman. Not gold, not commodity prices. That is just a small slice of the whole pie. The record of gold as a stable reflection of inflation goes back to an era when in fact most major governments around the world were involved in price fixing that produced that result. More recently the price of gold has jumped all over the place, and the gold market is a very thin market indeed and not many people around the world use that as an inflation hedge. There is a lot of mythology about gold, and that is a very weak reed for a stable monetary policy to achieve stable prices. If you want to achieve stable prices, then go at the link which is the link between the quantity of money and central bank activities and the goal of stable prices. If you want stable prices, then mandate it.

There are a lot of differences among people who have similar views about the engineering details. That is why in my prepared presentation I emphasize that it is important that we at this point establish the principle and not get tangled up in the details at this time.

There are differences among different price indexes, and I think any one of the major price indexes, whether it is the deflator or the CPI, is better than the system we have now, which is nothing, effectively nothing. There are problems with the CPI. It may be biased up. That is a detail to be worked out. It is not a sufficient reason not to avoid establishing the principle. I am not sure how it would be done legislatively. That is your job, Senator.

Senator Mack. You sound like you are saying something similar to what Dr. Angell said this morning. He has pretty much said you ought to let the Fed determine what in fact would be the best measure.

Mr. Meiselman. Of the inflation rate?

Senator Mack. Yes.

Mr. Meiselman. I am not so sure about that. That is part of what I think that the Congress should mandate because if you are going to hold them accountable, that has to be done with some precision otherwise given past Fed activities and proclivities, which are perfectly human -- they are just as human as we -- they could shift from one to the other, and then we would not know what they are trying to do.

Senator Mack. Well, let me come back to you, for a minute, because you said a moment ago, "We will leave that up to the Congress to make that determination." I am not sure I am comfortable in just saying to my colleagues, "Well, what should we do, which one should we pick?"

Mr. Meiselman. Well, if I had to pick one now, I would say, let us have the Consumer Price Index which has some flaws, and we should then work on repairing those flaws.

Senator Mack. Are the flaws that you are referring to similar to what we have been debating around here for the last couple of months about what is the accurate CPI?

Mr. Meiselman. Absolutely. That debate has been going on for many, many years, for at least as far back as the First World War.

Senator Mack. Let me just pursue a couple of other thoughts with you and then I want to get the other two to respond.

Some have suggested that we get a blue ribbon panel, whatever that is, to identify what those corrections in CPI should be. A, do you think that is a reasonable approach, and B, in what period of time do you think it could be accomplished?

Mr. Meiselman. My own personal view is it is a reasonable approach, but I do not know the state of the latest research in the problem. So, I do not know what further research would be necessary,

whether it is just a matter of gathering and evaluating existing research. I had some involvement in a similar effort that was made in the late 1950s when the Federal Reserve was trying to eliminate all of the inflation. There were complaints that the CPI at that time was biased up. There was a set of studies and a report, and that took about a year I believe, if I recall correctly.

Senator Mack. Jerry?

Mr. Jasinowski. Well, Mr. Chairman, I think a blue ribbon commission is a very useful idea here because, just as in Congress, in economics there are certain political differences, as well as technical differences. I think getting a blue ribbon commission would be useful and it would insulate it against any charges of partisanship on the part of the Congress. So, I urge that and the sooner, the better because it is terribly seriously overstated.

Because the CPI is as flawed as it is and tends to overstate inflation, I would certainly pick the GDP deflator as the right goal. I do think that to write that into legislation is problematical. I think you are better off, rather than trying to convince your colleagues of the CPI versus the deflator to make a goal of price stability, rather than to try to write it into the legislation.

Senator Mack. Doctor?

Mr. Havrilesky. I think I would favor the deflator, and there is probably --

Senator Mack. You know, we have just accomplished something here. We have had eight people. All have been asked the question, and I think this is the first time that two have agreed as to what that --

Mr. Meiselman. I would have no objection to that.

Senator Mack. Did you want to add some additional points?

Mr. Havrilesky. Yes. One could allow there to be deviations about the average rate of inflation. In addition, it is important I think to average the rate of inflation over a number of years to have a targeting period for zero inflation.

I would like to go a little further and say that just to assign a price stability goal runs the risk that Professor Meiselman enunciated earlier, the risk that became very real after Humphrey-Hawkins was passed, with regard to oversight. Nothing was done.

So, I think it is important to design a restructuring package. I would consider this falling under the rubric of central bank restructuring because that is effectively what such legislation does. I think it is

important when designing such a package to consider complementary aspects in the legislation which would enable price stability. Sanctions is one possibility. Maybe that will not pass alone, but maybe there are complements to sanctions that will serve as bargaining chips to cool the ire and concern of constituencies that do not like sanctions, probably the central bankers themselves and their supportive constituencies.

I think announcing plans, as the Chairman has been doing for the past year, I think indicating what the central bank would do if its targets are missed and to announced their forecasts and indicate what they would do if the forecasts do not hold, I think all of those are important elements in a restructuring package focused on accountability.

There is the other dimension of autonomy. As I indicated in my testimony, too often autonomy and accountability are mixed and lumped together under the label "independence." This allows central bankers and others to attack measures which would advance central bank accountability with the argument that they erode central bank independence. Federal Reserve Chairmen have done that for years. I know Chairman Martin did that back in the 1950s when, for instance, Senator Douglas wanted more accountability after the accord.

So, by separating these dimensions, I think it enables those who craft the central bank restructuring package to allow various elements of accountability and elements of autonomy to come together in a way that is politically practicable.

Mr. Jasinowski. I just wanted to add something, Mr. Chairman, if I could which is the legislative dimension of this since it is well to debate these things. I agree on many of the points that have been made about accountability and autonomy. It is just that convincing the Congress how far to go in terms of legislation. I am mindful of the difficulties there.

So, it seems to me you can make a general goal of price stability and you can put in the legislative record the kinds of measures that seem most appropriate. I do not see where a lot of the measures for accountability, stopping short of sanctions, ought to be dependent upon putting a specific price goal in there. There are a lot of proposals for openness, reporting, and all of those things which I think can be argued successfully without having to put in a specific price goal.

Senator Mack. I am afraid if you do not do that, Jerry, you are basically asking for accountability but with no way to measure what you are holding someone accountable to.

Mr. Jasinowski. No. I think that is exactly right, and I do not think you can precisely measure it. I am just thinking to myself what does it take to get something passed through the Congress and is the Congress prepared to accept a specific price goal, a single price goal and then move as far as sanctions against the Federal Reserve in order to achieve that. As you look at the spectrum of accountability, it seems to me we could go a lot further than where we are today without necessarily going that far.

Senator Mack. Let me ask you, how would you see that accountability working? How would you do that?

Mr. Jasinowski. I think you would do it through hearings before the Banking Committees and the Joint Economic Committee in which the record had been reviewed, and you look at how successfully the Federal Reserve had done with respect to price stability.

Senator Mack. Dr. Meiselman, I gathered from your comments earlier, that you did not put much faith in this hearings process as being anything to bring about any accountability.

Mr. Meiselman. No. Well, look at the record. It is something but it is not very much.

Senator Mack. Well, let me ask you this question. Again, it goes back to accountability. It seems to me -- and if you all disagree with this, I want to hear from you - - that the way this system has been set up is like so many other things throughout the country. In essence, everyone is responsible; therefore, no one is. We have said to the Fed "You are responsible for price stability, you are responsible for growth, you are responsible for low unemployment." And when things start to go wrong, the politician naturally says, "Well listen, it does not have anything to do with what I have done in the sense of raising taxes or imposing more regulation or allowing spending to get out of control. It is all the Fed's responsibility." So, maybe the first step toward accountability is clearly defining who is responsible for that.

Mr. Meiselman. I agree with you absolutely.

Mr. Jasinowski. And that is part of my point, Mr. Chairman. I think that if the goals were simplified and there were fewer goals -- and I do share the view that the Humphrey-Hawkins bill was written for a different time in which people thought there was an opportunity to do things that you cannot do in terms of government knowledge and action. If it were simpler in terms of goals, if the amount of reporting that the Federal Reserve has to do and the amount of openness it has to have

increase and the reporting to Congress were increased also, there is an area of accountability here that is a substantial increase over what has been done in the past without necessarily going to specific goals and sanctions.

Mr. Havrilesky. I brought this point up in some of my papers and some of my research. If you go to a singular price stability goal and eliminate mention of all other potential objectives for monetary policy, what that takes away from politicians and important constituencies is the latitude, the leverage to bash the Federal Reserve whenever things go awry in the economy.

Now, the question you need to address in this restructuring package is, what are you going to give those constituencies as a bargaining chip to compensate for the loss of bashing rights? There are dimensions of central bank restructuring that have no effect on inflation which may be offered to these constituents and those politicians as bargaining chips in exchange for their bashing rights. The area of the Federal Reserve's budget, the budgetary authority of the Federal Reserve, is one. Federal Reserve regulatory domain is another. In other words, this restructuring package need not be confined to the dimension of accountability. Autonomy is an obvious other dimension, and there are many elements in the autonomy vector, if you will.

So, one of the dangers of going, to wrap it up or conclude, to a singular goal, price stability goal, is you are going to deprive your colleagues of that very important vent for their rage periodically when things are not going well, and you are going to have to give them and their constituencies a sop in this restructuring package. I have suggested some dimensions where that can be done.

Now, I favor more Federal Reserve autonomy together with more accountability because that generates better inflation performance. It may, however, be necessary -- and I bite my tongue for saying this. For instance, as an example, if you are going to demand less secrecy and more accountability of the Federal Reserve by way of an enforceable price stability goal with complementary elements in it such as sanctions, you may have to surrender something in the dimension of Federal Reserve autonomy. That is unfortunate, but it may be politically practicable to put the restructuring package together in that manner.

Senator Mack. I really only have one more question that I want to direct to Jerry. Do either of you want to make any closing comment with respect to where we are?

Mr. Meiselman. Except to comment on Professor Havrilesky's remarks to clarify the word "autonomy." Correct me if I am wrong. I think he means control over the day-to-day operations.

Mr. Havrilesky. No. Autonomy means distance from the executive branch, distance from the pressures -- insulation from the pressures of the executive branch of government.

Mr. Meiselman. Well, if there is accountability and they are given a target and the Congress does its job, which it seems to me is explicit in the Constitution to monitor, to review, and to hold them accountable for achieving that, then not only do I have no problem with that definition of autonomy, I would embrace it.

Senator Mack. Jerry, let me just again ask this last questions, because as I understand your position -- and are you reflecting NAM or your own personal --

Mr. Jasinowski. Well, I am really here more on my own, Mr. Chairman, but I would say that my membership subscribes, 90 percent of it, to everything we have said here with respect to the goals in monetary policy in the economy.

Senator Mack. Your basic thrust is, as I understand it, you are supportive of the idea of a single objective of price stability, but are not comfortable with the idea that we would establish whether it should be zero, 1, 2, 3 percent.

Mr. Jasinowski. What I am comfortable with is the notion of reducing the number of goals from what you have now in Humphrey-Hawkins. In my testimony I argued that a single goal was not as good as looking at both price stability and growth because of the nature of the economy and that there was an appropriate balance that could be struck between those two.

Senator Mack. If I could, let me just ask -- because this is getting to the heart of the question I wanted to ask you. This is based on some conversations that you and I have had.

Mr. Jasinowski. Right.

Senator Mack. Is it fair to say that if you compare the manufacturing sector of our economy to, let us say, the service sector, that there are higher levels of inflation in the service sector versus the manufacturing sector, at least recently?

Mr. Jasinowski. No, not just recently. There has been for over the last decade. The rate of inflation in the service area is about twice what it is in manufacturing which has been about 2 percent a year.

Senator Mack. So, what I am getting to is if we say, for example, we wanted 1 percent -- let us just say we picked a target and said we want 1 percent -- your point I think would be -- your concern is that in the process of pursuing that 1 percent, which is driving inflation in the service sector down significantly, it would do damage to the manufacturing sector because, in essence, I guess there would be disinflation taking place in that sector.

Mr. Jasinowski. I think that is right, and the final point I made in my testimony was that it was a disproportionately severe impact on manufacturing if you were to try to go to zero or --

Senator Mack. This is the last point. There are certain segments of the manufacturing sector that in fact are dealing with disinflation I would think, and I would throw out computers as being an example of that.

Mr. Jasinowski. Yes, where there has been a relative price decline.

Senator Mack. Is it not possible for business to manage itself in that kind of environment and does that not kind of take away the argument that we need to, in essence, have that kind of second goal in there to kind of balance the thing out?

Mr. Jasinowski. I think that, first of all, the record is that manufacturing has the best price stability record in the overall economy, half the rate of inflation in services. So, there is an inflation --

Senator Mack. Yes, I am not arguing that.

Mr. Jasinowski. Then if you look at where we have seen price declines, as we have in computers, it is possible that something that many industries can do if they are on a technological wave which allows them to do that, which is what is happening in computers -- there is a long-term technological set of changes there that have to do with the microprocessor and many other things you know about that has allowed the price decline to occur. You cannot do that in products where you do not have some kind of major technological gain because we have already, in order to achieve this comeback, worked out most of the extra labor costs we had and most of the other kinds of waste. So, I do not think for manufacturing you can have an across the board decline in the absolute level of prices.

Senator Mack. Do either one of you want to respond to that question or series of questions?

Mr. Meiselman. Well, I think there is a confusion here between relative and absolute prices. Accepting the evidence that you were just talking about, there is a decline in the relative price of manufactured

goods. So, whether that is associated with a stable overall price index or a rising overall price index, is utterly immaterial over the long haul. There seems to be a confusion between relative in absolute prices, and I dissociate myself from that. That is simply wrong.

Senator Mack. Dr. Havrilesky?

Mr. Havrilesky. Again, I agree with the content of David Meiselman's remarks, not the drama, just the content.

(Laughter.)

Senator Mack. Well, again, I want to thank you for participating today, and again I appreciate your willingness to wait while we went over and voted.

Thank you very much.

[Whereupon, at 1:11 p.m., the hearing was adjourned.]

SUBMISSIONS FOR THE RECORD

PREPARED STATEMENT OF CONNIE MACK, CHAIRMAN

Good morning and thank you to our distinguished panel of witnesses. I will make introductions after a few brief opening remarks form members of the committee.

The purpose of our hearing today is to examine The Full Employment and Balanced Growth Act of 1978, better known as the Humphrey-Hawkins Act. Specifically we are interesed in the role of the Federal Reserve System and how the Humphrey-Hawkins Act might push the Fed to follow policies that, contrary to our intentions, are not good for the economy.

On December 7, 1994, Alan Greenspan, the Chairman of the Federal Reserve System testified before this Committee. I asked him directly whether the Humphrey-Hawkins Act forced him to follow policies in the short-run that hurt the economy in the long-run. His answer was simple and straightforward -- Yes! My view is that the Federal Reserve can best facilitate economic growth by following policies based on sound money. By contrast, Humphrey-Hawkins requires the Fed to focus on other factors which can lead to higher and more volatile interest rates.

Recent events in our hemisphere highlight the importance of sound monetary policy based on price level stability. I am referring to the financial meltdown in Mexico. The problems in Mexico resulted from runaway peso printing and monetary policy gone awry. Some say that the Mexican Central Bank forgot its role as defender of the monetary order. Instead, the Central Bank focused on short-run policies designed to offset the damage done by events outside of its control. The long run damage to the Mexican economy is yet to be fully realized.

We in the United States are facing our own problems with currency instability. The dollar has fallen dramatically, reaching historic lows against the D-Mark and the Yen. This decline in the value of our currency reduces our citizens' purchasing power in the world markets; lowers living standards; and introduces an increased uncertainty into financial transactions that can only hinder our long-term competitiveness, not help.

In today's global marketplace, stable and sound monetary policy is rewarded by increased investor confidence and thus increased investment

and jobs. By contrast, uncertain monetary policy leads to loss of confidence and declining investment and jobs.

I could not say it any better than Chairman Greenspan did last December. He said, quote, "I personally believe that a stable price level contributes very forcefully to long term economic stability and maximum sustainable economic growth. And that is what economic policy is all about."

As we look into the future, the increased integration of our economy with the rest of the world demands that we create a stable environment for our businesses, workers, and children. Without a stable environment we force our businesses to operate hampered by financial market uncertainty. A stable monetary system is essential in expanding and extending economic opportunity to all Americans.

A stable monetary system should be the right of every citizen and government should protect that right. Ludwig Von Mises, one of the most prominent economists of the early 20th Century, said it best when he wrote, "It is impossible to grasp the meaning of the idea of sound money if one does not realize that it was devised as an instrument for the protection of civil liberties...Ideologically it belongs in the same class with political constitutions and bills of rights."

The sound money issue is central to the role of the Federal Reserve in the economy. The Federal Reserve was designed to be independent from the political process, because central banks have often been used throughout history for political manipulation for economies. When government interferes so much that the economy sags under the burden, many call on the Fed to prop it up. However, printing money and artificially lowering interest rates can only hurt the economy in the long-run. Any signs of economic growth will be short-lived, eventually becoming lost amid a declining exchange rate; rising long-term interest rates; inflation; and volatile, uncertain financial markets.

I am convinced that moving toward a goal of price-level stability for the Fed will produce confidence and certainty among investors throughout the world. I believe this confidence will lead to the highest possible employment levels; the greatest increase in standards of living; and the strongest competitive position for the United States.

A goal of price-level stability will bring interest rates down to their lowest possible levels, no longer influenced by uncertainty over future inflation. This will reduce the deficit by lowering the cost of financing government debt; keep the cost of capital low; and extend economic opportunity to as many citizens as possible.

Giving the Fed a goal of price level stability will help ensure that inflation becomes a non-factor in our economy. The value of our insurance policies, savings bonds, and pension funds will be secure. Reforming Humphrey-Hawkins and giving the Fed a clear mandate of sound money is a critical step in that direction.

I look forward to hearing today's discussion.

Statement to the Joint Economic Committee of Congress

Dr. John Rutledge
Chairman
Rutledge & Company, Inc.

Summary:

The role of the Federal Reserve and the economic consequences of the Federal Reserve's having multiple, often conflicting, policy objectives of stable prices and full employment is the single most important issue of economic policy. The Fed should have one, and only one policy objective, protecting the integrity of our country's money. The way to do that is to target zero long-term inflation. Zero inflation, or stable prices, is the monetary policy that will create the most wealth and the maximum improvement in the living standards of the American people over the long term. But it is zero inflation for the stock of existing tangible assets, not consumer prices, which should be the Fed's objective. Key points of this analysis are:

1) The health of our country's balance sheet is more important than the national income accounts for long term wealth creation and living standards. At the end of 1993 we had $57.8 trillion in total assets, valued at market prices, compared with our roughly $7 trillion GDP.

2) The main direct impact of monetary policy is on the public's balance sheets and portfolio decisions, not on their spending decisions. By controlling the rate of growth of the money supply, the Fed controls the rate of return on the public's $19.0 trillion of tangible assets, such as property, plant, equipment and collectibles. Attempts to use monetary policy as a temporary expedient to influence short term employment disturb balance sheets by forcing wealth owners to attempt to systematically rebalance their portfolios. This can have a long lasting effects on the economy.

3) Higher inflation drives a wedge between the returns on tangible assets and those of financial assets, such as stocks, bonds and bank accounts. This unleashes massive waves of portfolio rebalancing activities in the private sector, as people attempt to increase their holdings of hard assets at the expense of securities. This drives interest rates higher and the stock market lower, and creates temporary speculative bubbles in real estate and commodity markets, as we saw in the US in the 1970s, or in Japan in the late 1980s.

4) Falling inflation does the reverse, lowering the return on real assets and causing people to try to switch from real assets to securities, leading to harmful real estate deflation, restructuring and solvency problems, and to temporary speculative booms in the security markets. The sharp reduction of inflation between 1981 and 1993, for example, caused the public to reduce their holdings of tangible assets from 46.4% of total assets in 1981, to 32.9% of total assets in 1993, for a net shift of $7.8 trillion. This disinflationary adjustment culminated in the property deflation of 1989-1992, during which period land prices fell 8% per year, which undermined the capital position of the banking system, and drove the economy into a prolonged recession.

5) The appropriate role of the Federal Reserve is to maintain stable prices, by which I mean zero long term inflation for the prices of the real assets held in the public's balance sheet. This would keep the Fed from distorting the relative returns among the different assets held in the country's balance sheet, and would allow individuals to make choices among assets based on true economic risks and rewards, rather than on forecasts of policies. Since land comprises more than half of the public's tangible assets, or net worth, this is very close to a land standard, similar to the gold standard.

6) Providing managers and investors with unshakable belief that the value of the money they are investing today will be secure in ten, twenty, or fifty years, when they harvest the returns on today's capital decisions, is the proper job of the Federal Reserve. Any straying from this long term objective to pursue other short term goals, however desirable, will undermine this key foundation for long run wealth creation and rising living standards.

Mr. Chairman and Members of the Committee:

I want to thank you for allowing me the opportunity to present my views today on the role of the Federal Reserve and the economic consequences of the Fed's multiple policy objectives. The role of the Federal Reserve and the economic consequences of the Federal Reserve's having two different, and often conflicting, policy objectives of stable prices and full employment is the single most important issue of economic policy. As I will argue below, the Fed should have one, and only one policy objective, protecting the long term integrity of our country's money by guaranteeing its purchasing power. The way to do that is to target zero long-term inflation. Zero inflation, or stable prices, is the monetary policy that will create the most wealth and the maximum improvement in the living standards of the American people over the long term. But, as I will argue below, the price level which the Fed should seek to stabilize is not consumer prices, but the prices of the real assets which together comprise the private sector's net worth.

Background

Let me give you my background to put my remarks in perspective. I studied monetary economics a the University of Virginia, where I received a Ph.D. in 1973. I have written two books on the effects of monetary policy on the economy and interest rates, ***A Monetarist Model of Inflationary Expectations*** (1974), and ***Rust to Riches*** (1989, with Deborah Allen. I served as an advisor to the international monetary research office of the Treasury Department during the Ford administration, and as an advisor to President Reagan's transition team in 1981, helping to design the Reagan economic plan. I am the Chairman of the Claremont Economics Institute, an economic advisory firm, where I advise industrial companies, banks, insurance companies, and investment managers around the world. And I am the Chairman of Rutledge & Company, Inc., an investment firm specializing in buyouts and direct private equity investments in mid-sized U.S. industrial companies. We have made long-term investment in more than 20 U.S. companies. I am a director of 9 companies, with annual sales in excess of $6 billion, and manufacturing operations in more than 40 countries. And I write a regular column in Forbes on business and investment strategies.

So, as you can see, I am a *vertically integrated* economist, with one foot in the ivory tower and the other in the real world. I have a deep analytical interest in monetary policy, but I also buy companies, approve capital investment plans and bonuses for real businesses, and, indeed, meet a payroll of my own.

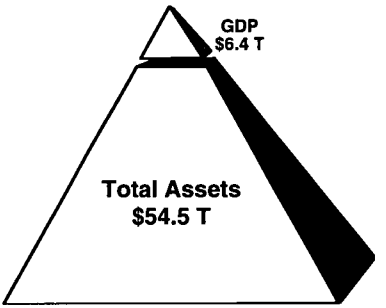
To me, monetary policy matters only in the way it affects real people trying to run real companies. In running businesses, my biggest challenge is that I must try to see through the fog and make investment decisions which affect the course of a business for ten, twenty, thirty, or even fifty years into the future. The role of monetary policy is to try and make these decisions as easy as possible for people to make, by taking the long-term value of money off the table of things that business people must worry about.

Analysis:

Work and ready access to capital, or tools, are the principal factors which determine a country's long term ability to create wealth and rising living standards for its people. Tax policy has the most direct influence on incentives to work. Monetary policy exerts its influence primarily through the balance sheet, and plays a central role in capital accumulation.

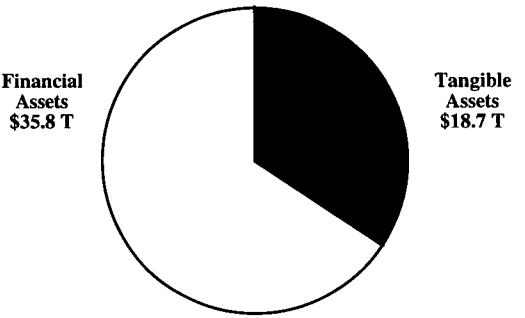
While both balance sheet and national income account factors are important, the real headline stories about the economy often arise in the balance sheets. That is because balance sheets are so large relative to the economy. At the end of 1993, for example, (the latest figures available from the Federal Reserve) the public held %57.8 trillion in total assets, measured at market values, compared with a 1993 GDP of only $6.34 trillion. Even small disturbances to such a large portfolio of assets can be important for the economy.

Chart 1: The Portfolio Economy



The key distinction in the public's portfolio of assets is its division between tangible assets, such as property, plant, equipment and commodities, and financial assets, such as stocks, bonds, and bank deposits. That is because inflation directly affects the rate of return on the stock of tangible assets. As Chart 2 show, at the end of 1993, US investors held 32.9% of their assets, or $19.0 trillion, in the form of tangible assets, and 67.1% of their assets, or $38.8 trillion, in the form of financial assets. The value of tangible assets also measures the net worth of the economy, since essentially all financial assets have offsetting liabilities.

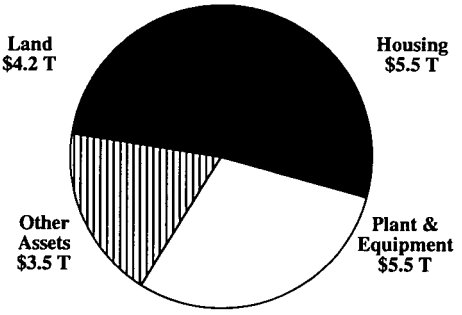
Chart 2: Tangible and Financial Assets



Total Assets $54.5 T

Tangible assets can be further broken down by type of asset as shown in Chart 3. More than half of net worth is made up of property investments in land and structures.

Chart 3: Composition of Net Worth



Total Tangible Assets
$18.7 T

These various types of assets are voluntarily held by investors in their portfolios, which means that, in equilibrium, asset prices are set at the levels which make the risk-adjusted, after-tax yields on all types of assets roughly equal. The yield on financial assets is straight forward, usually interest or dividend payments per dollar of asset value, adjusted for investor's perceived risks and tax payments. Yields on tangible assets are conceptually the same, but are more difficult to estimate. The yield on a family's residence for example, would include its service value (roughly rental value) plus tax benefits due to the deductibility of interest payments, adjusted for maintenance and other costs of ownership, plus the gain or loss during the year from inflation or deflation. In portfolio equilibrium, returns are equal across asset classes, and investors are content to hold what they have, so there is no pressure on asset prices to change.

Through its power to print money, the Federal Reserve controls the inflation rate, which can be thought of as systematic capital gains paid to the owners of real property and other financial assets. An increase in the inflation rate from zero to ten percent, for example, means that the owner of a $100,000 house will now receive a $10,000 per year tax-free dividend payment, which will go on as long as the inflation lasts. This 10% increase in the after-tax yield on real assets, relative to the yield on financial assets, causes investors to reassess their desired portfolio composition, and attempt to increase the share of their wealth held in tangible assets at the expense of their financial asset holdings. This cannot, of course, be physically accomplished, since the same number of houses and bonds still exist. But it can be accomplished in the aggregate, by inflating the prices of tangible assets and deflating the prices of securities, effectively repricing the existing stock of assets to create a new portfolio equilibrium. Unfortunately, this repricing plays havoc with people's lives and businesses, and makes it all but impossible to make sensible business decisions.

Chart 4: Tangible Assets as a Share of Total Assets

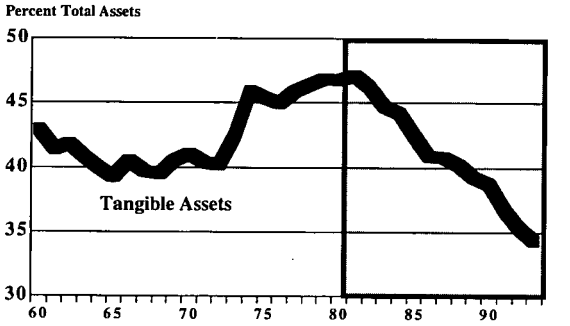


Chart 4 shows the percentage of their net worth that US investors hold in the form of tangible assets. As you can see, the sharp increases in inflation during the late 1970's pushed people to switch into hard assets and out of securities, causing a boom in real estate and commodity markets, rising interest rates and a bear stock market, culminating in the spectacular collapse of the dollar in October, 1979.

The extended disinflation of the 1980's shows up in Chart 4 as a decline in the share of tangible assets in portfolios from 46.4% in 1981, to 32.9% in 1993, the most recent data available. This unprecedented 13.5% shift in portfolio composition - $7.8 trillion at today's prices - is without a doubt the largest economic event of the postwar period, deflating asset values in the hard asset sectors and inflating asset values in the security markets for more than a decade. It deflated real estate, bankrupted the S&L industry, and gave birth to the RTC. It pushed interest rates to thirty year lows, and the stock market to new highs. It distorted millions of business and investment decisions for more than a decade. And it drove the production economy into a prolonged and painful recession by shutting down the banking system for repairs.

Chart 5: Land inflation

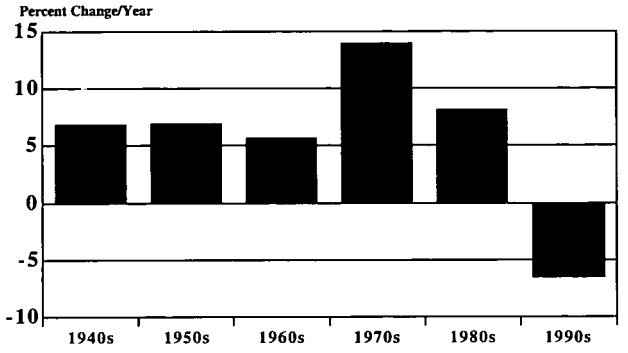
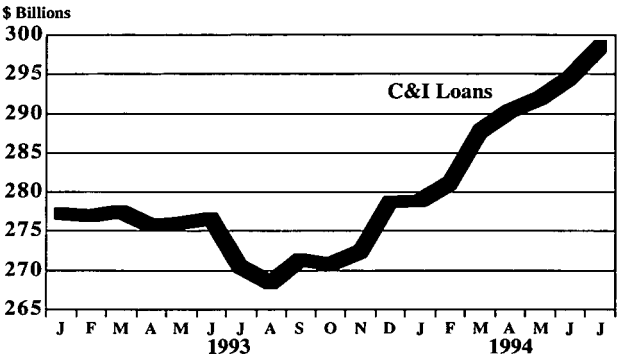


Chart 5 shows the annual rate of land inflation in the US over the postwar period. As you can see, the Fed has systematically subsidized real asset returns during most of this period by creating land price inflation of between five and ten percent per year for most of the period. This has the effect of systematically steering capital resources into real property, and away from savings through the security markets, where funds are made available for capital spending and new businesses.

In the 1970's, this inflation subsidy to real asset returns was dramatically increased, giving rise to the portfolio adjustments shown in the previous chart, and pushing real asset values to extremely high levels.

In the 1980's, this subsidy was sharply reduced, which started the shift from real assets into securities, as discussed above. This adjustment culminated in the sharp, sustained deflation of real asset prices we have experienced during the 1990's. From 1989 to 1992, land prices declined by eight percent per year. Since roughly a quarter of bank assets use real property as collateral, falling land values eroded the capital position of the banking system and produced the radical decline in bank lending known as the credit crunch shown in Chart 6. Faced with falling home values and less available credit, consumers and investors stopped spending, pushing the economy into recession.

Chart 6: Bank C&I loans



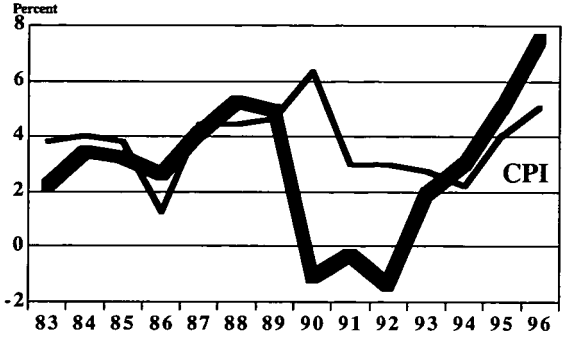
So, you see, the record of monetary policy at smoothing short term disturbances to the economy in the post war period is not very good. This is not because we have had the wrong people in the job, it is because monetary policy is a slow-working blunt instrument, which has been assigned a job it cannot accomplish. It operates on the economy only indirectly, through the asset markets. When it does, it tends to unleash tidal waves of destructive private portfolio rebalancing efforts which distort business and investment decisions for decades at a time. We simply cannot afford the long term costs of the Fed's attempts to manipulate output and employment.

Policy Recommendation:

The first implication of this analysis for monetary policy is to free the Fed from their impossible task of controlling both the purchasing power of money and the level of employment. The Fed should be assigned the single task of ensuring that the price level 100 years from today is exactly the same as it is today. This would take the economy off the destructive roller coaster we have been on for the past twenty years, and would allow businesses and investors to make decisions based on the fundamentals of their markets, not their views about inflation and deflation. Issues of economic growth and employment are better attacked through tax, spending and regulatory policy.

Which price level to target, however, is an important question. Although targeting zero long-term inflation for *any* measure of the price level would be a vast improvement over current policy, our analysis suggests that the appropriate price index for the Fed to target should be the price of the tangible assets which comprise the private sector's net worth, not the Consumer Price Index. More than half of the CPI is made up of service prices, which cannot be stored in portfolios, and therefore do not disrupt the capital markets.

Chart 7: Net Worth Price Index vs. CPI Inflation

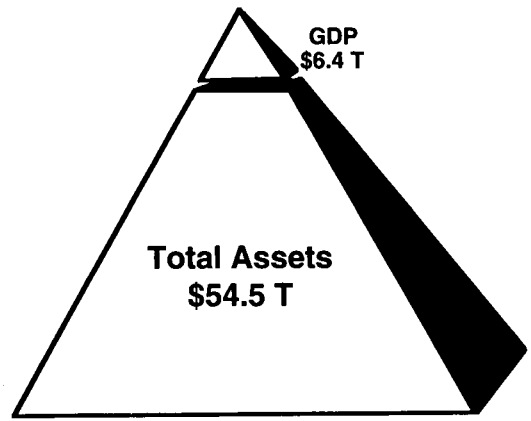


The price level which the Fed should seek to hold steady is the price of our $19.0 trillion stock of tangible assets which, together, make up our net worth. I have created such an index by using the prices of existing real assets, weighted by their relative positions in US portfolios, as reported in the Fed's balance sheets for the United States. Chart 7 shows the history of inflation measured with this *Net Worth Price Index* compared with the CPI over the past decade. As you can see, during most periods the two measures give fairly similar results. But when important portfolio disturbances are taking place, as in the property deflation of 1989-1992, they differ dramatically. Net worth price inflation provides a better measure of portfolio pressures than does the CPI.

Alternatively, the Net Worth Price Index can be used in place of the CPI to estimate real interest rates. This would show extremely high real interest rates during the property deflation, suggesting earlier corrective action than was, in fact, taken.

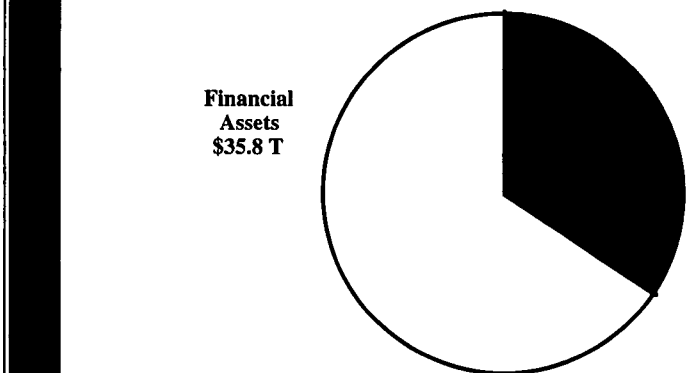
The job of the Federal Reserve should be to guarantee zero inflation for the stock of real assets. This would create an environment free of the periodic disruptions caused by speculative swings between real assets and securities, an environment in which the only way people could make money is to work, save, invest, and take prudent business risks. That environment would be a major improvement over the current situation.

The Portfolio Economy



Rutledge & Company, Inc.
One East Putnam Avenue, Greenwich, Connecticut 06830 203/869-8866

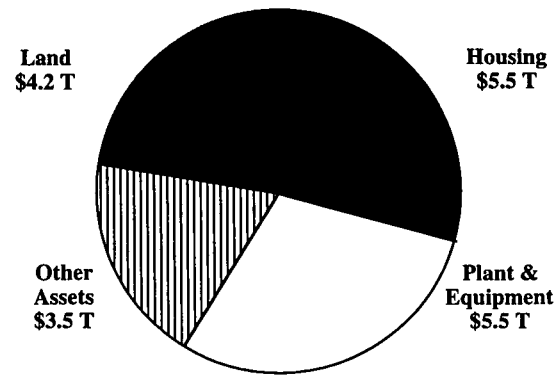
1993 Portfolio



Total Assets $54.5 T

Rutledge & Company, Inc.
One East Putnam Avenue, Greenwich, Connecticut 06830 203/869-8866

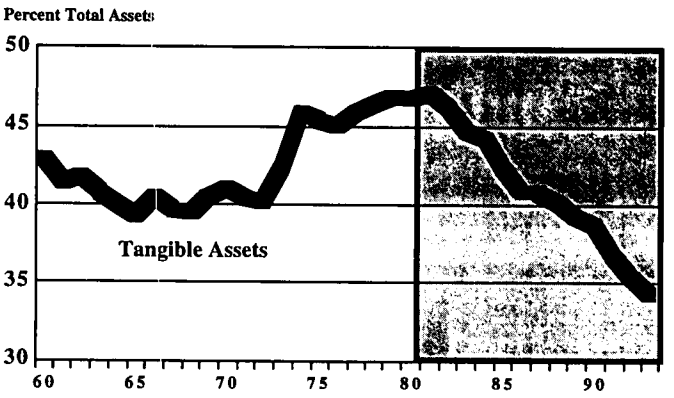
1993 Net Worth



Total Tangible Assets
$18.7 T

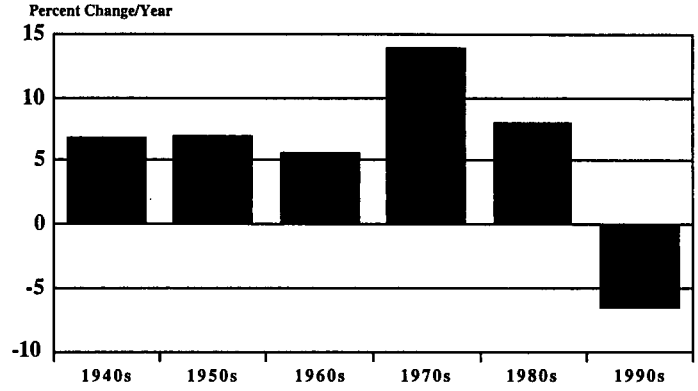
Rutledge & Company, Inc.
One East Putnam Avenue, Greenwich, Connecticut 06830 203/869-8866

Richter 7.5 Wealth-Quake



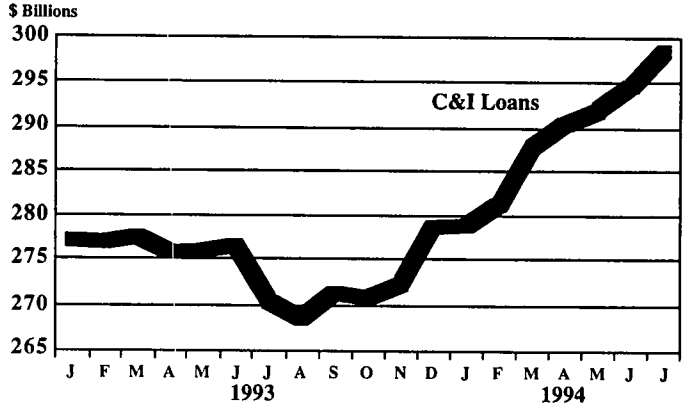
Rutledge & Company, Inc.
One East Putnam Avenue, Greenwich, Connecticut 06830 203/869-8866

Land Deflation



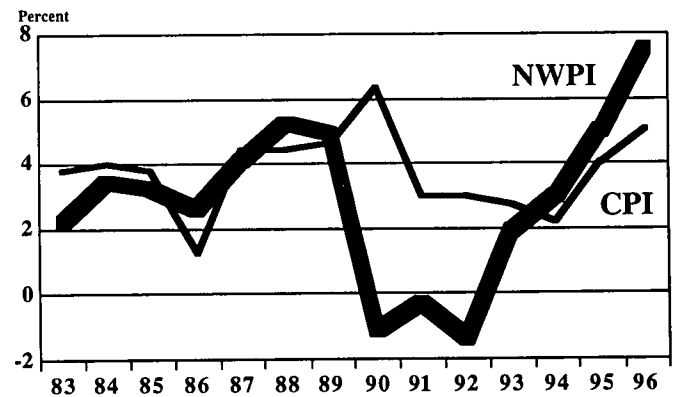
Rutledge & Company, Inc.
One East Putnam Avenue, Greenwich, Connecticut 06830 203/869-8866

The Credit Crunch is Over



Rutledge & Company, Inc.
One East Putnam Avenue, Greenwich, Connecticut 06830 203/869-8866

Net Worth Price Index vs. CPI Inflation



3/12/95

Rutledge & Company, Inc.
One East Putnam Avenue, Greenwich, Connecticut 06830 203/869-8866

March 13, 1995

Statement of Robert Eisner*

What ultimately counts in any economy are: 1) the total amount of goods and services currently produced, what we try to measure in real GDP or real GNP; 2) the amount of our production going to investment, or provision for the future; and 3) the rate of unemployment, the proportion of the population unable to participate in our economy or even in a civilized society. I have not, it must be noted, included prices or inflation.

There are some simple reasons for this. If we had a public opinion poll and asked, "Are you in favor of high prices?" the answers would certainly be overwhelmingly, "No!" Most respondents will probably initially think of themselves as buyers. They do not want to pay more for that house or car.

But for every buyer there is a seller. How do sellers feel about *receiving* higher prices? Don't they want to sell their house, their product or their labor services for more? It might be possible to go back to those poll respondents and ask them if it really matters to them what prices are if they are able to enjoy the same houses, cars, and groceries, regardless of the prices. If I couldn't convince all those respondents that prices do not generally matter unless they affect something real, I should at least be able to convince a majority of this Committee.

One way to explain this would be to imagine what would happen if the Congress were to legislate, with the approval of the President, a law that would change our currency so that each old dollar became equal to two dollars, and all fixed-value assets and liabilities, private and

---

* William R. Kenan Professor Emeritus of Economics at Northwestern University, a past president of the American Economic Association and author, most recently, of "*The Misunderstood Economy: What Counts and How to Count It.*"

public, were doubled in value, and all prices and wages doubled. Indeed, about a third of a century ago, then President DeGaulle did something similar in France, moving in the opposite direction, making one "New Franc" equal to one hundred old francs. Prices in terms of the new francs immediately fell to one-hundredth of the old prices, but nobody was any better off, other perhaps than those who (eventually) found the arithmetic of lower prices easier.

A similar argument can be made about inflation. Of course very rapid and, particularly, rapid and changing rates of inflation, can wreak havoc on an economy, and affect adversely what really counts: output, investment and employment. Even here, though, I have to point out that some countries with very rapid inflation, what we call hyperinflation, have somehow managed to maintain high output and rapid rates of real growth. Israel, in various periods of its history, is a conspicuous example. Contrary assertions by some notwithstanding, there is no evidence that the rate of inflation, at least as long as it is modest, has anything to do with long run growth or productivity. Indeed, Milton Friedman, the great free-market economist, pointed this out years ago.

But let us concede that rapid inflation, well into the two-digit range, may cause real difficulty. Beyond its effects on the aggregates or totals of income and output, it may change their distribution. Sellers and borrowers, at least in the short run will gain. Buyers on fixed incomes and lenders will lose. And while we may have no special sympathy for one group rather than the other, changes in ones fortunes due to changing rates of inflation can be morale-destroying. We like to know the rules of the game and work to get ahead by the existing rules. The gains and the losses from inflation entail in effect a change in rules in the middle of the game. For the losers, at least, such changes must seem unfair.

But all this may relate more to changes in rates of inflation and the short run than to long-run steady inflation. In the latter case, lenders receive higher interest rates and most individuals and business learn to protect themselves by investing in assets that rise in value with prices. The Treasury, by the way, could help enormously here by offering indexed bonds, as Alan Greenspan and noted economists such as Nobel Laureate James Tobin have urged. Then all, not just the savvy big wheelers, could protect themselves against inflation.

In fact, however, high inflation is hardly an issue in the United States. We have not, at least in this century, except in time of war or its immediate aftermath or from the unusual oil supply shocks of the 1970s, ever had major inflation. And what inflation we have had has not been due to too much peace-time government spending, too high a deficit or too easy a monetary policy by the Federal Reserve.

As for our "double-digit" inflation episodes of a decade and a half and two decades ago, when oil and energy prices, propelled by OPEC, went through the roof, it would be impossible for the Federal Reserve to prevent such inflation, if it could do so at all, without huge losses in output and employment. Reducing purchasing power enough to lower other prices so that the average of prices were not raised by the energy price increases would prevent us from buying vast amounts of our own output and hence put out of work the people who would produce it.

A battle against inflation now would be an attempt to re-fight a war of the past. As measured by the consumer price index, inflation has averaged under 3 percent for the past four years. And with widespread agreement that the consumer price index overstates the rate of inflation, perhaps by a percentage point or more--Tobin suggests the figure may be over two percentage points, it is clear that true inflation for our consumers has been virtually zero.

To the extent that inflation is perceived as a menace, now or in the future, it should be combatted not by slowing the economy but rather by promoting the greatest possible degree of competition, in our own markets and in competition with the rest of the world. There is no excuse for government programs, as in farm price supports, that endeavor to keep prices up. We must eliminate quotas and tariffs and other restrictions on free trade. We must eliminate government regulations that protect business from competition, whether in transportation, communications, banking or elsewhere.

One place I cannot resist suggesting the Congress start, in view of the illustrious name of the Chairman of this Committee, is in eliminating the anti-trust exemption for major league baseball. Free competition there, as elsewhere, can only be healthy. Aside from contributing to the end of the costly strike, it might end a situation where teams such as the new one from the Chairman's home state have to pay hundreds of millions of dollars just to join the monopoly. Such savings might well be passed on in lower ticket prices to fans.

Legislating new guidelines for the Federal Reserve, telling them to focus only on holding down inflation is, however, not merely pointless at this time. It threatens enormous damage to what really counts in the economy: output, investment and employment. The reason here is simple. It is part of our most elementary teaching in economics of the laws of supply and demand (see Figure 1) and readily understandable to the businessman on Main Street, if not the banker on Wall Street.

The only way the Federal Reserve can affect the real economy is to affect people's spending, or what economists call aggregate demand. Reducing demand, what people spend, is likely to force prices down. Business that cannot sell their goods at existing prices will *tend* to

lower them, or at least be inhibited from raising them. But as is well-known by every business and every student of the economy, a fall in demand will also result in a loss of real sales and hence in real output. Some may argue that *eventually*--in five, ten, or fifty (?) years--output will recover and we will be left with lower prices. But there can be no question that in the short run reductions in demand will reduce output and employment. And as one famous economist put it, "In the long run we are all dead!"

Instructing the Federal Reserve to aim only at price stability means then instructing it to reduce demand--by raising interest rates--enough to stamp out all inflation, regardless of the adverse effects on output and employment. And, I must add, raising interest rates can also only have an adverse effect on the second of our matters that count: investment in our future. The folly of restricting the Fed to matters of price stability is all the greater now that budget deficits have been sharply reduced and there is a major drive to reduce them further. Tight fiscal policy runs the serious risk of reducing output and employment. It is vital that the Fed be free to counter-balance this by driving interest rates lower.

I must caution about one fad in some circles of economists: the argument that monetary policy--what the Federal Reserve controls--can not affect the real factors in the economy; it can only affect prices. Some are at least cautious enough to limit themselves to the assertion, as I have suggested, that it is only in the long run that real factors--output, investment and employment--will not be affected.

This extreme notion that monetary policy can affect only prices and not output is supported only by extreme assumptions about the economy--such as the complete flexibility of prices and wages, clearing markets which mean no unemployment, symmetric expectations

among borrowers and lenders, buyers and sellers, and the absence of all government debt! Some economic theorists may enjoy spinning such tales, and I wish them well. But they have little to do with the real world, as leading economists, liberal and conservative, those who have served in Republican administrations and those close to the current congressional majority, will tell you. And I dare say that most central bankers will acknowledge, whatever their obsessions with "fighting inflation," that such activity has a cost in terms of output and employment. For those who will not acknowledge it, I point to the example of Western Europe. The central bankers of the European Monetary Union have succeeded in wringing out inflation and left their nations with apparently permanent double-digit *unemployment*.

Fiscal policy and monetary policy both affect the economy by affecting aggregate demand. More government spending and lower taxes increase demand for goods and services either by the government directly or by the private sector, which has more after-tax income out of which to spend. Monetary policy influences demand by affecting interest rates. Lower interest rates will increase demand, especially for housing and automobiles and other durable goods, and for investment in new machinery and buildings by business. A monetary policy directed at reducing or eliminating inflation does so by reducing demand, which also reduces output and employment, along with investment.

It is all too clear that high unemployment is associated with reductions in inflation. Many, including apparently the Chairman of the Federal Reserve, believe as well (without sound evidence) that low unemployment increases inflation and, what is worse, gives us permanently *increasing* inflation. Indeed, economists have a name for the concept, that Mr. Greenspan knows well, the NAIRU or non-accelerating-inflation rate of unemployment. The NAIRU, sometimes

called the "natural (!) rate of unemployment," is that rate of unemployment at which the rate of inflation, whatever it is, will not change. Unemployment above that rate will lower inflation, and keep lowering inflation. Unemployment below the NAIRU will raise inflation, and keep raising it, from 2 percent to 4 percent to 8 percent to 12 percent, and ever upward; inflation will be permanently accelerating.

Given that theory, one can understand, if not necessarily defend, the action of the Federal Reserve in raising interest rates seven times over the past year to fight an inflation that none, without a very large magnifying glass, could find. The idea was that even if you do not see inflation now, if the economy is allowed to grow so briskly that unemployment gets below that NAIRU, inflation will quickly get out of hand. The only issue to those who accept this concept is then just what the NAIRU is and how sure we are of its value. Here conservatives such as Martin Feldstein, a chairman of the Council of Economic Advisers under President Reagan, argue that the NAIRU is a high 6½ to 7 percent. We should, by his lights, therefore be more vigorous in fighting inflation by slowing the economy and driving unemployment up. Liberals or moderates such as Alan Blinder, President Clinton's appointee as Vice-Chairman of the Federal Reserve Board, suggest that the NAIRU is perhaps between 5½ and 6 percent.

But now unemployment (as just reported for February) is down to 5.4 percent. To most of those accepting the NAIRU, which may well include all of those on the Federal Reserve, this is a danger sign suggesting that further action to reduce aggregate demand and slow the economy--by raising interest rates--is in order.

I personally consider this view deplorable. I was brought up to believe that what we called "full employment" was a highly desirable, indeed imperative goal for policy-makers.

8

Every percentage point of extra unemployment is estimated to lose us about 2 percentage points of GDP, which would amount now to no less than $140 billion! What a colossal waste each percentage point of unnecessary unemployment means for the economy, let alone the human tragedy for those unemployed!

During World War II unemployment was down to 1.2 percent. The huge associated increases in employment made it possible for us to double output, so that we could devote half of our production to the war and actually leave the civilian economy with no less than it had during the pre-war years of high unemployment. During the Viet Nam War unemployment was down to 3 percent and even below that for a few, non-seasonally adjusted months. Must it take wars for our economy to get to really high or full employment?

The measures necessary to achieve maximum employment involve maintaining adequate aggregate demand, both by fiscal and monetary policy, and improving supply by such provisions as the earned income tax credit, apprentice and training programs and support for education at all levels. In 1978 the Congress enacted the Full Employment and Balanced Growth Act or, by the names of their sponsors, the Humphrey-Hawkins Act, setting forth a target of 4 percent unemployment, which was to be reached within five years. Unfortunately, policy-makers at all levels have quite ignored this goal and done little or nothing to achieve it, perhaps partly because the Act specified as well the ultimate goal of zero inflation. Since these two goals, certainly in the short run, are likely to be incompatible, the Federal Reserve and successive administrations were in effect left free to emphasize one or the other as circumstances dictated.

When unemployment was high, as in 1982 when it reached 10.7 percent, the Federal Reserve, led by Paul Volcker, abandoned its tight money policy to fight inflation--although

inflation was still 5 percent--and moved to ease money and lower interest rates to reduce the unemployment. Now the Federal Reserve tries to walk a tight rope, and not fall off one side to raise inflation but not fall off the other and unduly raise unemployment.

What then would be the effect of new legislation telling the Fed to ignore the matter of output and unemployment and focus only on fighting inflation or, even, achieving "stable" prices? It would be an invitation, indeed an instruction, to reduce demand enough and drive unemployment up enough--above that NAIRU--to end inflation. One side problem, I might add, is that if we operate by the current consumer price index, which Mr. Greenspan with others recognizes as exaggerating inflation, we would have to have actually falling prices, or deflation, to follow any injunction of stable prices.

Trying to maintain stable prices, or even a constant rate of inflation, invites fluctuations of employment. As I have indicated, in the face of some outside force substantially raising inflation, such as the supply shocks in petroleum prices--we might even have this occurring from a fall in the value of the dollar, although it would have to be much greater than we have experienced in the last year--efforts to hold down our purchasing power to fight general inflation would certainly reduce real sales and output and employment.

The fact is that our economy has not generally been at any natural rate of unemployment or NAIRU. In Figure 2, one may note the wide fluctuations of actual unemployment around the slightly varying NAIRU (as calculated by the Congressional Budget Office) over most of the past half-century.

The standard formulation, the results of which I can confirm, shows that high unemployment, above the CBO NAIRU, has indeed reduced inflation. Projections from past data

indicate that high enough unemployment, approaching 9 percent, would soon turn what inflation we have into all-out and accelerating deflation, as illustrated in Figure 3. My own recent work, separating out periods of low and high unemployment, suggests however that the relation is not symmetrical. Projections based on the low-unemployment periods indicate that low unemployment may actually *reduce* inflation, as shown in Figure 4. I have been presenting these results widely but there is no evidence that I have convinced the Federal Reserve. They quite clearly see low unemployment as a menace!

The historical facts are that we have generally had excess unemployment in our economy. We have not had a situation where we have averaged full employment over the long run with years of less than full employment balanced by years of over-full employment, whatever that means. We have rather had, at best, occasional periods of full employment, chiefly during wars, and less than full employment most of the time.

What all this comes down to is that we have virtual price stability now and efforts to preserve it should be focussed on promoting competition, domestic and international. The Humphrey-Hawkins Act should be implemented and strengthened by a renewed commitment to maximum output and employment. Instructions to the Federal Reserve to restrict itself to influencing prices and inflation while disregarding the real variables that count--output, investment and employment--can only result in our having a far poorer economy, now and in the future.

Figure 1. Some Elementary Supply and Demand Curves

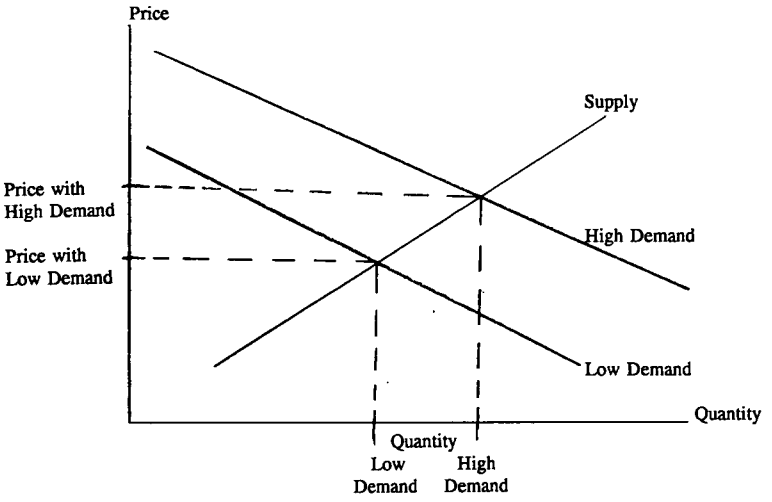


Figure 2. Unemployment and the NAIRU: Actual unemployment has bounced all around its supposed natural rate in the last half century

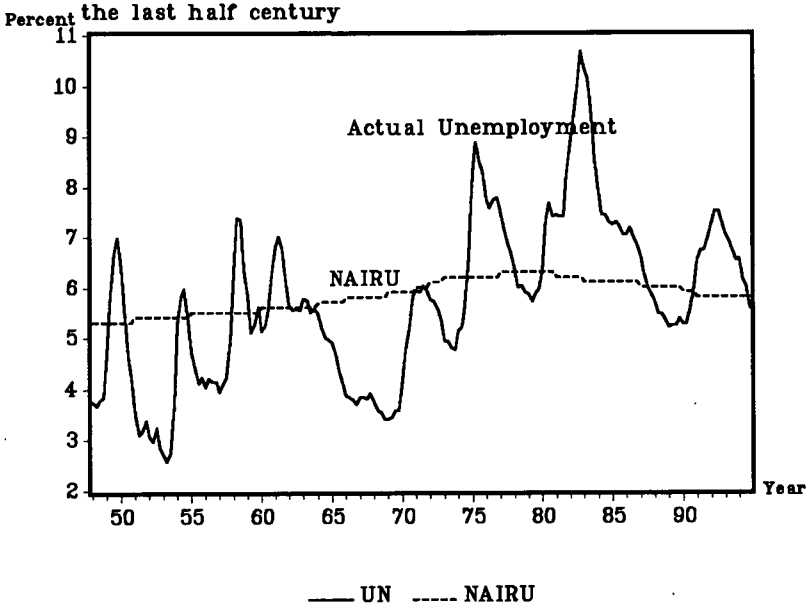


Figure 3. Inflation Projections, Unemployment of 5.8%, 6.8%, 7.8% and 8.8%

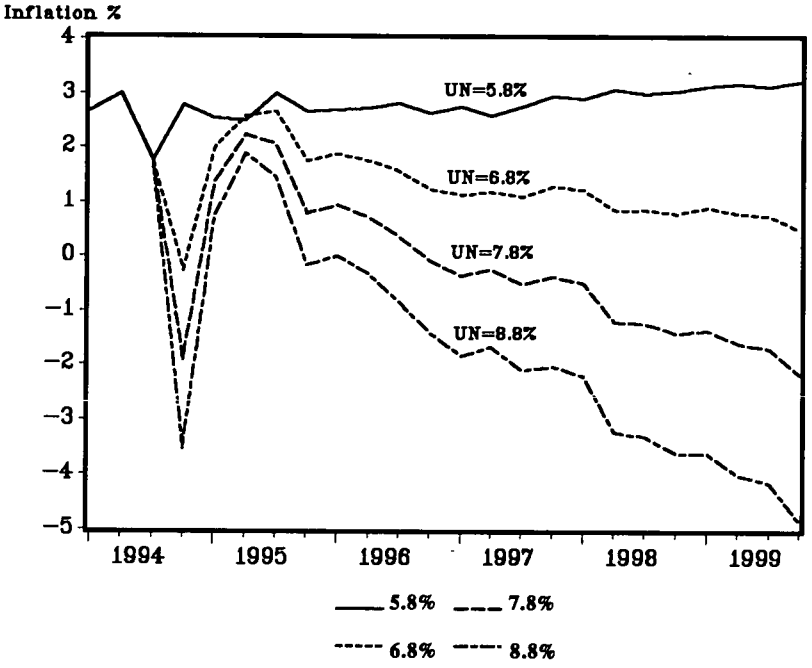
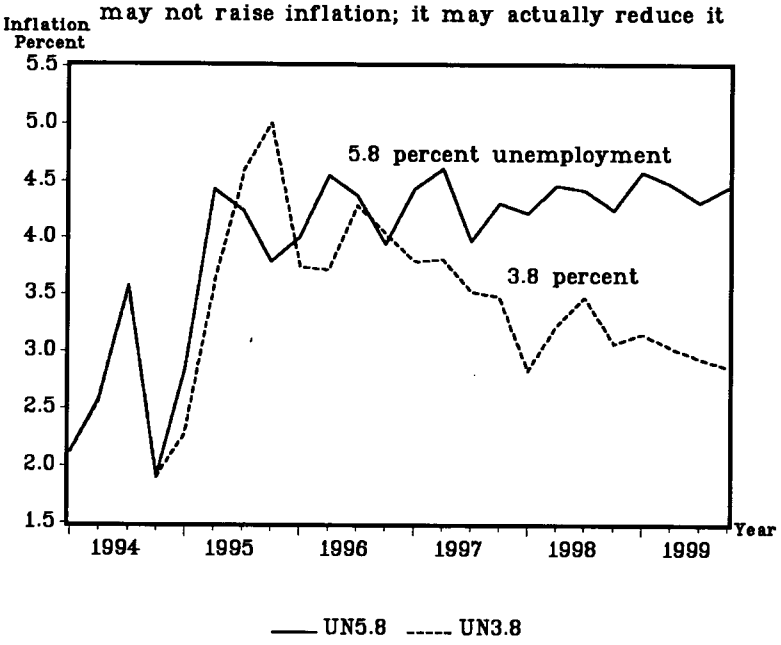


Figure 4. Projections indicate that low unemployment may not raise inflation; it may actually reduce it



A.B. Laffer, V.A. Canto & Associates

THE FED SHOULD BE CONCERNED
Testimony Before the Joint Economic Committee of the United States Congress
on the Humphrey-Hawkins Bill
March 16, 1995

by Arthur B. Laffer

- We have developed a statistical relation between inflation and causative factors that actually contribute to inflation. This statistical relationship in turn can be used to forecast inflation (see figure below).

Based upon the most recent data and using the statistical relationship I would expect an inflation rate during 1995 of about 5½ percent.

- Interest rates are not a cause of higher inflation but do reflect the market's "best guess" of what will be. I know of no single data series that better forecasts inflation than interest rates. The current run-up of interest rates, especially at the short end of the yield curve, indicates the market's expectation of higher inflation to come.

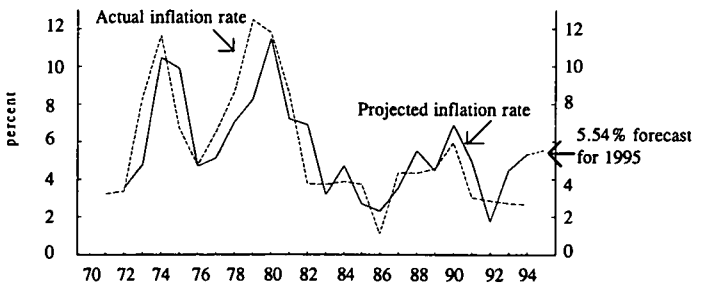
- Since April of 1994 the dollar has been devalued by some 13 percent against the yen and over 17 percent against the mark. In fact, in 1995 alone the dollar has fallen by over 8 percent against the yen and by 10 percent against the mark. These changes in the value of the dollar *vis a vis* the mark and the yen will definitely have consequences. In all likelihood U.S. inflation will increase as a result of the recent dollar devaluations.

- The most recent monetary base data show no signs of any change in the rate of growth of the base. Money, however, has been growing much more slowly during the past year or so than it had been growing over the past several years. This deceleration in the rate of growth of money is the principal reason why there has been such an upturn in the rate of growth of excess base. All in all the recent changes in the rate of growth of the monetary base and M1 portend significantly higher inflation.

- With slower expected growth in real output during 1995 and 1996 the demand for money will continue to grow slowly at best leading me to expect higher inflation.

I believe that Congress should give the Federal Reserve one objective over which the Fed has considerable influence. That objective should be price stability pure and simple.

Projected vs. Actual Rates of Inflation, 1970 - 1995



Regents Square I, 4275 Executive Square, Suite 330, La Jolla, California 92037 (619) 458-0811 FAX (619) 458-9856

THE FED SHOULD BE CONCERNED
Testimony Before the Joint Economic Committee of the United States Congress on the Humphrey-Hawkins Bill
March 16, 1995

by Arthur B. Laffer

Thank you Mr. Chairman.

The Federal Reserve is clearly the first among equals when it comes to departments of the government. The System has been afforded special privilege not offered to other arguably as important departments. Its independence and autonomy has conferred upon the Fed chairman a role that at times exceeds that of the President himself. And to top it all off all members of the Federal Reserve Board of Governors and branch Presidents are appointed to their positions for terms of 14 years with virtually no threat of recall.

The only real hope of oversight has to come from Congress. The precarious nature of politics and the timing of the Fed Chairman's four-year appointment makes the removal of an existing chairman an issue of great significance rather than one of personal choice. Once a person has been ensconced as Fed chairman it is extraordinarily difficult for him to be removed.

The power of the Fed Chairman is incredible. Arthur Burns for example single-handedly forced President Nixon to impose wage and price controls in August of 1971. Starting with his Pepperdine speech Chairman Burns was able to harangue the administration from his pulpit at the Fed. He was totally immune to any pressure and could speak his mind with impunity. All the while he had total control over some of the most powerful levers of government policy ever known.

In the end, of course, Burns succeeded in getting Nixon to impose wage and price controls. The irony however came when at the time of the imposition of the controls he was able to have interest rates exempted from those controls giving, as it were, one of the most resounding speeches for free markets I've ever heard. Hypocrisy knows no bounds.

Alan Greenspan has wandered far afield as well. He was one of the principle architects and an ardent advocate of the Mexican loan bailout. Goodness knows how his prominence on this issue can be justified as a consequence of his position as Fed chairman. He speaks out on issues not so much because it's appropriate but because he can.

I find the argument that the Federal Reserve has been made independent to insulate it from politicizing monetary policy somewhat hollow. The argument is no more appropriate for the Fed than it is for any number of other departments and agencies. Independence vitiates accountability. In fact, independence of the sort the Fed has institutionalizes a non-elected non-recallable repository of power in the hands of a few people. And, this type of power does corrupt.

Far more to the point is the justifiable fear that the Fed can use its awesome powers to subvert the rest of the political process.

The idea that the Federal Reserve should be concerned with multiple objectives only further distances the Fed from any substantive possibility of true oversight. The more objectives there are the less chance there is to achieve unity of evaluation. Confusion is the guaranteed by-product of the Fed's independence, enormous power and multiple policy objectives.

No one ever would deny the importance of unemployment, inflation, world peace, hunger, national savings and aids research. But just because something is important and perhaps even very important doesn't mean that everyone, everywhere and at all times should be held responsible for it. The division of responsibilities along with accountability is often the best way to achieve the success we all want.

In this light I believe that the Federal Reserve should be given one objective over which it has considerable influence. That objective should be price stability pure and simple.

The Fed also has the proper instrument to effectuate control of the price level. That instrument is the monetary base, i.e., the sum total of all bank reserves plus currency in circulation. The Fed is able to control the monetary base and is the only entity that can control the monetary base. Whether the Fed uses open-market operations by buying or selling bonds, by intervention in the foreign exchanges or by making loans to member banks it can only affect the monetary base. The monetary base in turn affects the U.S. banking system and the overall financial markets.

The Goal of Price Stability

The benefits of price stability are hardly imaginable in this day and age. It has been a long long time since last we had proximate price stability. And yet here and now people are exhausted patting themselves on the back for the great job that has been done vanquishing inflation. It is true that today's inflation is a lot better than it has been over the last quarter of a century. But, by historical standards two to four percent annual inflation is not all that wonderful. Here in the U.S. we've had intervals of a quarter of a century where the price level was no higher at the end of the period than it was at the beginning.

Can you imagine what the world would look like today if there were no overall inflation and everyone knew there would be no inflation over the next half century? If you and everyone else knew with perfect certainty that a dollar bill five, ten, twenty, fifty years hence would be worth exactly what a dollar bill is worth today, long term interest rates would be in the zero to two percent range, mortgage rates would be around 4 percent and the dollar would be strong in the foreign exchanges. We'd have true full employment and a stock market well over six thousand.

What more could anyone ask from the Federal Reserve Board than total and complete price stability? What less should we expect from the Federal Reserve Board?

The dollar should be a contract between the Federal Reserve and the American people. The dollar should not be some policy instrument subject to the whims and vagaries of this or any other group of people on the "open market" committee.

I believe that recently the Federal Reserve has taken its attention off inflation as a serious objective of public policy. There is a widely held opinion that the threat of inflation is not very great. I think this opinion is incorrect.

Interest Rates and Inflation

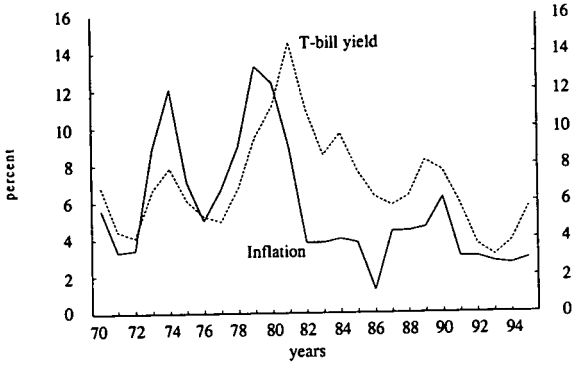
In competitive markets, nominal interest rates reflect market expectations of future real rates of return plus expected future inflation. A goodly amount of academic research has shown that in the short run, fluctuations in expected inflation have a significant impact upon fluctuations in interest rates. Hence there is a close link that exists between short-term interest rates and inflation (Figure 1).

The relationship between inflation over a 90-day period and the 3-month T-bill yield was exceptionally close during the 1970s and the expected real rate of return was small. But then again a low real rate of interest is to be expected because this was a period of high taxes, oppressive regulations and high inflation.

1982-89 roughly denotes the period during which the Reagan tax cuts took full effect. The tax rate cuts resulted in a substantial rise in the expected real rate of return. Therefore, in addition to inflationary expectations, tax rate induced changes in the expected real rate of return provided an additional source of change in short-term interest rates. Once the effects of the tax rate cuts were equilibrated, the gap between the interest rate on the 3-month T-bill and inflation closed and the pre-Reagan relationship was re-established.

Interest rates are not a cause of higher inflation but do reflect the market's "best guess" of what will be. I know of no single data series that better forecasts inflation than interest rates. The current run-up of interest rates, especially at the short end of the yield curve, indicates the market's expectation of higher inflation to come.

Figure 1
Inflation Rate and the Yield on the Three-Month Treasury Bill
1970 to 1995



Inflation and the Foreign Exchange Value of the Dollar

Many policy makers view deliberate changes in exchange rates as a convenient means of enhancing the "competitiveness" of the economy and improving the trade balance. This is exactly the reason why Mexican President Zedillo devalued the peso. In pursuit of this policy objective, however, changes in nominal exchange rates often are confused with changes in real exchange rates, thus ignoring the integrated nature of today's world economy. This is unfortunate, since changes in nominal and real exchange rates differ in their impact on the economy much as changes in nominal and real interest rates do.

The nominal exchange rate simply measures the value of one currency in terms of another. Thus, the dollar-mark exchange rate is literally the number of marks one dollar can buy. A devaluation of the dollar merely means that one dollar can buy fewer marks. The real exchange rate, or terms of trade, measures the value of goods produced in one country in terms of goods produced in another country. And there is no way a government can change the "terms of trade" simply by changing exchange rates.

In a world which is as integrated economically as the world we live in prices of traded products are easily and quickly arbitraged over national boundaries. Competition assures us of that. Absent any change in the "terms of trade" this type of price arbitrage assures purchasing power parity.

For example, arbitrage guarantees that the dollar price of say a ton of steel sold in New Jersey will be the same for equivalent quality steel whether that steel is made in the U.S. or Germany or anywhere else. What this equivalence means is that the dollar price of a ton of steel within very narrow bands must equal the German mark price of a ton of steel times the dollar price of the German mark.

With this equivalence being true both before and after a devaluation one of two things must occur. Either the dollar price of steel must rise following the devaluation reflecting the new higher dollar price of the mark or the German mark price of a ton of steel must fall. Whichever way the equalization occurs, whenever the government of a country devalues its country's currency, prices in the devalued currency will rise relative to prices in the currency against which the devaluation took place by the exact amount of the devaluation. Therefore, if the dollar is devalued by 11.16 percent against the German mark, dollar prices will rise relative to mark prices by 11.16 percent.

Figure 2
JAPANESE YEN per U.S. Dollar

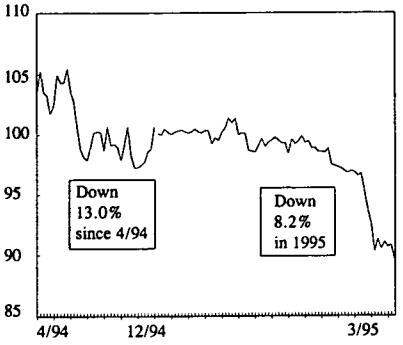
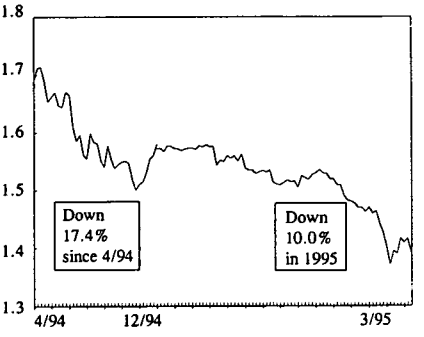


Figure 3
GERMAN MARKS per U.S. Dollar



In the case of the recent experience the U.S. dollar has had with the Japanese yen and the German mark there is plenty of room for serious concern. Since April of 1994 the dollar has been devalued by some 13 percent against the yen and over 17 percent against the mark (figures 2 and 3). In fact, in 1995 alone the dollar has fallen by over 8 percent against the yen and by 10 percent against the mark.

These changes in the value of the dollar *vis a vis* the mark and the yen will definitely have consequences. In all likelihood U.S. inflation will increase as a result of the recent dollar devaluations.

Growth of Monetary Base, M1, and Inflation

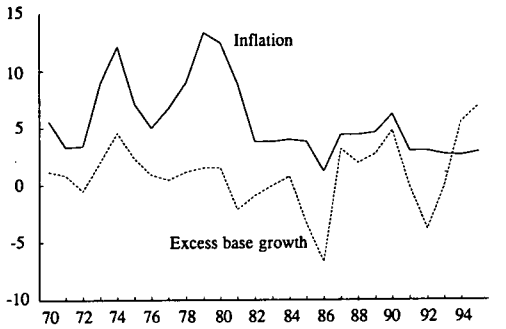
As mentioned earlier shifts in the supply of money to a substantial extent result from Federal Reserve actions. These actions are best summarized by changes in the monetary base. Whether operating through changes in loans to depository institutions, open market operations, or intervention in the foreign exchanges, Federal Reserve actions have a predictable impact on the monetary base. Changes in the monetary base are an important factor in shifts in the overall supply of money.

Outward shifts in the supply of money will, all else the same, result in a higher price level. Just as a "bumper crop" of apples results in lower apple prices so too does a "bumper crop" of money result in a reduced value for each dollar. In a dynamic context, a sustained increase in the growth rate of the monetary base will result in a higher inflation rate.

Just as changes in the monetary base indicate shifts in the supply of money, changes in M1 indicate shifts in both the demand for money and the supply of money. Therefore M1 includes both demand and supply factors while the monetary base is pure supply. The difference between the growth rates of the monetary base and M1 is called excess base growth and reflects inflationary monetary policy (figure 4). If demand shifts dominate changes in the money market, then inflation and M1 growth should be inversely related.

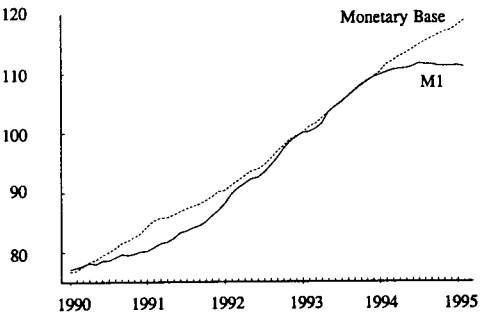
An increase in anticipated inflation as mentioned earlier results in higher interest rates. Because certain components of M1 do not earn full interest (e.g., currency and certain demand deposits), higher interest rates encourage economic agents to substitute out of M1 into interest-bearing assets. This substitution will tend to retard the growth of M1 as the expected rate of inflation rises.

Figure 4
Inflation Rate and Excess Base Growth
1970 to 1995



Source: Federal Reserve Bank of St. Louis

Figure 5
M1 and the Monetary Base
January 1990 to February 1995
January 1993 = 100



Source: Federal Reserve Bank of St. Louis

The recent divergence of M1 and monetary base translates into increased excess base growth. As seen from the historical relationship between inflation and excess base growth, this increase in excess base growth will put upward pressure on the rate of inflation.

What is of exceptional concern during the last year or so is how the divergence between the monetary base and inflation has taken place (figure 5). The most recent data for the monetary base show no signs of any change in the rate of growth of the base over the last several years. The monetary base basically is behaving the way it has done for quite some time.

Money, however, has been growing much more slowly during the past year or so than it had been growing over the past several years. This deceleration in the rate of growth of money is the principal reason why there has been such an upturn in the rate of growth of excess base. Because the change in the rate of growth of the excess base is due primarily to a slowdown in the rate of growth of M1 it is hard to attribute the increase in the growth of the excess base to Russians holding more dollar bills or what have you. Likewise a slowdown in the growth of M1 itself is a sign of higher inflation.

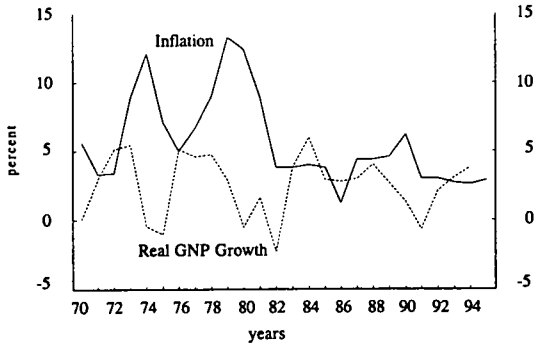
All in all the recent changes in the rate of growth of the monetary base and M1 portend significantly higher inflation.

Growth in the Real Economy and Inflation

Inflation is often described by the old saw as being "too much money chasing too few goods." If true, then the more goods there are the lower prices should be. Historical periods of rapid economic growth frequently have been periods of low inflation (Figure 6). Increases in real economic activity result in increases in the demand for money. And increases in the demand for money result in a greater value for each dollar or lower prices.

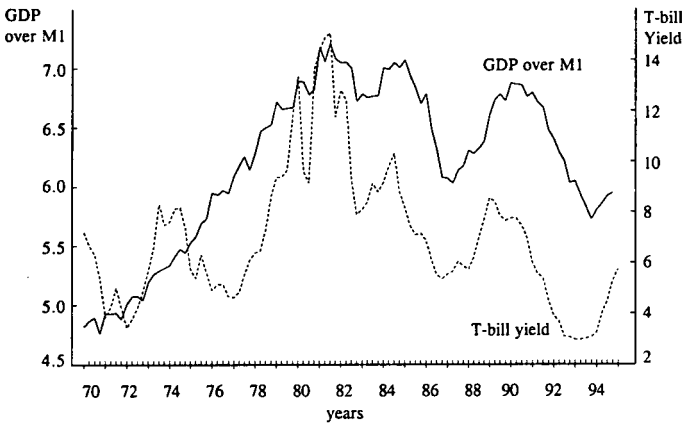
Any simple depiction of the relation between the goods market and inflation will miss the important contributions of the money market. In addition to increased real economic activity, falling interest rates and lower expectations of inflation increase the demand for money. Heightened money demand induces an increase in the quantity of money as the monetary equilibrium moves outward along the supply curve. The velocity of money and inflation will decline whenever there is an increase in the demand for money.

Figure 6
Real GNP Growth and Inflation
1970 to 1995



Source: Federal Reserve Bank of St. Louis
Note: The 1994 GNP Datum is an average of growth for the first three quarters.

Figure 7
Velocity of Money and the Yield on the Three-Month Treasury Bill
1970 to 1995



Source: Federal Reserve Bank of St. Louis

But given the current economic environment I don't see an increase in growth happening anytime soon. In fact if anything, the reverse is more likely. Clinton's higher tax rates are now in full force and with the prospect of future tax cuts looming large on the horizon, incentives to produce right now are not strong. And, with fiscal policy dead-set against economic growth, pressure at the Fed to pump more reserves into the system will certainly continue to increase. Money velocity using M1 and GDP has been increasing steadily since late 1993 and in my opinion will continue to do so (figure 7).

All of this translates into less demand for money as the growth in GDP tapers off. With slower expected growth in real output during 1995 and 1996 the demand for money will continue to grow slowly at best leading me to expect higher inflation.

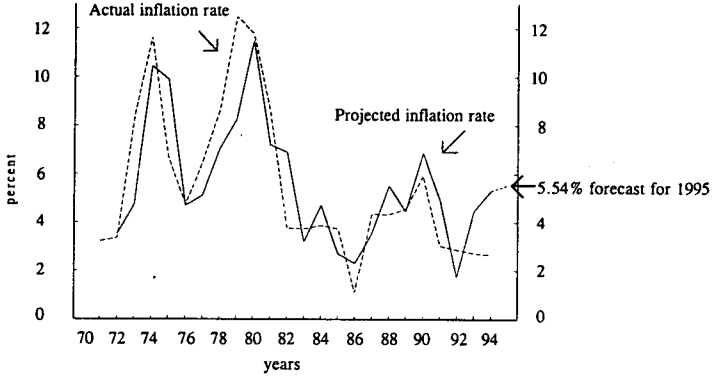
Overall Forecast for Inflation

Putting all of these factors together I have developed a statistical relation between inflation and the causative factors that actually contribute to inflation. This statistical relationship in turn can be used to forecast inflation. The historical results of this relationship and its current forecast are reported in figure 8.

Based upon the most recent data and using the statistical relationship I would expect an inflation rate during 1995 of about 5½ percent.

The Fed should be concerned.

Figure 8
Projected vs. Actual Rates of Inflation, 1970 - 1995
(December over December)



Testimony of

Lawrence Kudlow

Economics Editor

National Review

Before the

Joint Economic Committee

of the U.S. Congress

March 16, 1995

I am pleased to testify before the Joint Economic Committee on the need to reform the Humphrey Hawkins Act in order to improve the conduct on Monetary Policy and bring closer the goal of permanent long run domestic price stability.

Suddenly, no one want to hold dollars. On the world's foreign exchange markets during the past fortnight, the dollar has dropped to 90 Japanese yen, 1.38 German marks and 1.16 Swiss francs, below or nearly below the greenback's lowest levels since the second World War. Even second tier currencies such as the British pound, French franc and Italian lira have strengthened against the dollar. The beleaguered Canadian dollar has stopped falling. Only the Mexican peso has strengthened in value relative to the US currency.

Herein lies one of the key factors behind the dollar's collapse. Call it the Mexican contamination effect. Global credit market participants remain confused, even baffled, by the Mexican bail-out plan launched a few weeks ago by the IMF and the US Treasury. After imposing a bizarre policy mix of inflationary peso devaluation, sharp tax increases on the wealthy, on capital gains from the sole of business assets, and on consumer goods, along with stringent wage and price controls, and a huge interest rate jump, the plan has completely fallen apart after only a few weeks. The peso, which plunged nearly 40 per cent from 3.5 to 5.5 to the dollar in the initial devaluation stage late last year, has fallen another 25 per cent to 7.5 to the dollar since the so-called rescue plan was announced in mid-February. Mexican inflation has jumped to something like 70 per cent, while output is apparently dropping at a 5 per cent to 10 per cent yearly pace. No wonder Lloyd Bentsen

quickly and quietly exited the Treasury shortly after the November 8 elections. It wasn't just the Newt Republicans, it was Mexico.

Left to pick up the pieces is former Wall Street wizard Robert Rubin, who made an estimated $100 million at Goldman, Sachs before signing on as President Clinton's principal economic adviser shortly after the 1992 election. At first happy over his received promotion to Treasury Secretary, Rubin now finds himself at the epicenter of a financial hurricane growing so large that it could conceivably pull down the economy of the entire Western Hemisphere, including a large number of commercial banks, broker dealers, mutual funds and corporations along the way.

Rubin is known as a savvy trader and sharp manager but he has little monetary experience. Advising him is under-secretary Lawrence Summers, a bright former academic who stubbornly clings to the discredited Keynesian demand-side model. Unlike the late Seventies early Eighties Latin American debt crisis, which was largely comprised of bank loans to government's, today's crisis is marked by a substantial integration of private creditors and lenders throughout the U.S. and Canada, Mexico and South America. In other words, if bankruptcies in Mexico gain velocity, quite possibly spreading to other large Latin economies such as Brazil, Venezuela and Argentina, the exposure of private firms in the US and Canada is potentially quite hazardous to the health of their banking systems and the overall economy. Writ large, the Mexican problem becomes a hemispheric problem. Since the hemisphere is, either formally or informally, based on the US dollar, we

can call it the dollar hemisphere. Outside this currency zone the demand for its monetary unit of account the dollar has virtually collapsed.

Then there is the strange behavior of Fed Chairman Alan Greenspan, Robert Rubin's co-pilot in the Mexican rescue effort. Inexplicably, the normally free-market conservative Fed economist became a cheerleader for the IMF-Treasury austerity plan, despite its undisciplined Keynesian under pinning, a theoretical point that Greenspan has spent a professional lifetime fighting against. Rather than offering Congress his independent judgment of the inherent flaws in the plan, Greenspan instead put on his pom-poms and went to work for the Administration. He even went so far as to lobby conservative radio talk show host Rush Limbaugh, who wisely refused to support the package.

This is not the first time Greenspan has sacrificed the tradition of Federal Reserve independence. Almost two years ago, in the spring and summer of 1993, he was a leading supporter of Clinton's high-tax deficit package, going before numerous Congressional committee hearings to promise lower interest rates and massive deficit reduction if the package passed. Unfortunately, short term interest rates have doubled since then, long-term Treasury yields are two percentage points higher, and the latest budget estimates from the liberal-leaning Congressional Budget Office show a rising deficit path toward $400 billion in the early years of the next century.

International money market players are not only mindful of this miscalculation, they also remember the double-digit rate of new dollar creation injected by Greenspan and Co.into the economy from mid 1992 to the early part of 1994. This set the stage for the steady decline of the dollar a $50 rise of gold and a likely inflation increase in the coming year. After the Fed's effort to restrain money creation in 1994, however, the key measure of high-powered adjusted Federal Reserve credit, published by the Federal Reserve Bank of St. Louis, has suddenly exploded by 14.8 per cent at an annual rate during the first two months of the new year.

Coincidentally, Greenspan delivered a remarkably soft testimony to Congress in early March, sounding more like dovish vice-chairman Alan Blinder than departing Fed member and inflation-hawk Wayne Angell. After only two months of ambiguous economic data, the chairman essentially told Congress that the economy was slowing and no additional tightening would be necessary, even after he had already begun pumping up the Fed's balance sheet. This is the sort of thing international traders notice. What's more, they know that the Treasury has pumped at least $ 3 billion from its exchange stabilization fund into Mexico, reserves with another $5 billion on the way, not to stabilize the peso, but to back up Mexican government debt redemption to US mutual funds and others. So while the peso continued to collapse, the Fed and Treasury were creating new money to bolster the dollar hemisphere's economy. For global investors, this is not re-assuring.

Nor is the behavior of the Japanese and German central banks, which insist on pursuing a deflationary course of noncooperation with the U.S. While their currencies are

appreciating their gold prices are collapsing. Over the past year, the yen price of gold has dropped 12 1/2 per cent, even while domestic producer prices have been falling at a 1 per cent yearly pace. Meanwhile the German mark price of gold has declined 16 1/2 per cent over the past year, while its wholesale price index at home has slowed to only 1.7 percent annual rate.

The Bank of Japan insists that recession induced budget deficits, and post-Kobe earthquake reconstruction, will launch inflation. The Germans, meanwhile, appear ready to repeat the disastrous 1990 Moastricht experience, when they forced European interest rates sky-high before countries like Britain and Italy sensibly jumped off the deflationary standard. Then and now, the German Bindesbank failed to understand the need to accommodate rising demands for the mark by the newly emerging Baltic and Central European countries. In this US policymakers cannot be blamed. Even if domestic American inflation remained below 3 per cent, if Germany and Japan insist on deflating prices, then the dollar would remain the relatively weak currency.

Finally, financial market expectations that the new Republican Congress would successfully use the balanced budget amendment to shrink spending and cut taxes had ballooned by the eve of the Senate's final vote. When the vote failed, the balloon was punctured. Not simply because the bba is a magic fiscal cure, which is not, but now there are growing fears that the GOP may be losing its nerve and retrenching on its promises. Senator Hatfield's defection went unpunished, and right after the failed bba vote, leading Senate Finance committee members Robert Packwood and John Chafee hauled out the old

country-club Republican austerity nostrum that deficit reduction is more important than tax cuts. Sen. Alphonse D'Amoto, fresh from endorsing Robert Dole for president, declared that the House GOP tax cut proposals "all sound good," but it is more important to "cut spending and get the deficit under control--that's number one."

Problem is, international capital flows to those countries with the highest after-tax inflation adjusted rate of economic return, and while Japan and Germany are now considering tax relief, the US may be pulling back. Right now international investors are scratching their heads at the ill-fated Mexican bail-out plan, the related threat of easy money from the Fed, and the possibility that the Republican Party is turning away from Gingrich's original vision of spending restraint and pro-growth tax incentives. More than ever, there is a need for international monetary reform, but Mr. Rubin seems unequal to the task.

While the GOP Congress may yet snatch a victory from the jaws of defeat, for the moment people are taking a powder from the dollar. Who can blame them?

* * * * *

Bretton Woods is really a metaphor for gold and price stability," said Jack Kemp as he launched an Empower America conference commemorating the fiftieth anniversary of the postwar global monetary pact. Indeed, John Maynard Keynes, one of the architects of

the Bretton Woods agreement, told the House of Lords that it was ``the exact opposite" of a return to the classical gold standard.

Kemp -- the only prominent national politician who understands the complexities of monetary policy -- stopped way short of calling for a full return to the Bretton Woods system, wherein the dollar was convertible to gold at $35 per ounce and all other currencies were pegged to the dollar.

Instead, Kemp, who is poised to announce a 1996 presidential bid immediately following this year's elections, is searching for a new approach that will promote economic growth by ensuring low inflation, and hence low interest rates, as far as the eye can reasonably see. Often accused of being a big-government conservative, Kemp knows full well that the power of government finance ministries and their central banks is dwarfed by the awesome power of global financial markets, driven by high-tech information processing, where daily dollar transaction flows total well over $1 trillion.

The subject of money is a timely one, as the U.S. economy again shows signs of rising inflation. The producer price index has increased at a 4.5 per cent annual rate over the past three months, after remaining flat for all of last year. The consumer price index rose at a 3.7 per cent annual rate for the three months ending in August, following a 2.7 per cent 1993 performance. Anticipating inflation, long-term Treasury-bond yields have moved up to 7.7 per cent, compared to 5.75 per cent nearly a year ago. The Eurodollar market expects short-term rates, which are now just under 5 per cent, to rise to 5.75 per

cent in December and 6.5 per cent by next June. The overall stock-market averages have not advanced since early this year, and inside the market over 70 per cent of the S&P 500 listings have fallen at least 20 per cent from their highest level. Gold is again flirting with $400, and gold stocks are one of the hottest performing groups. Broad commodity indexes are very bearish on the inflation outlook: the Journal of Commerce index of raw materials has risen at a 25 per cent annual rate over the past six months, and the Dow - Jones spot index is up 24 per cent from a year ago.

Once again a bout of inflation threatens to disrupt the economy. However, a return to the old Bretton Woods system is not the answer. Bretton Woods' creators, Keynes and Harry Dexter White, both believed strongly in the benign intervention of government and would not have understood any better than Bill Clinton and his wrecking crew that next-century economics will be driven by market action, not government action. (Not long after the Bretton Woods conference, White committed suicide rather than face charges that he was a Communist spy.)

At the Empower America conference, former Reagan Treasury economist Paul Craig Roberts presented a critique of Bretton Woods, reminding participants that it permitted many fluctuations and crises, especially from France and England. The signatories relied on exchange controls and tariffs to prevent sporadic outflows. Countries whose currencies had been weakened by anti-growth tax and regulatory policies were constantly borrowing to support their currencies, then would periodically throw in the

towel and devalue anyway. In effect, any country could withdraw from the system at any time, without penalty or sanction.

Meanwhile, Bretton Woods' other offspring, the IMF and the World Bank, were ruining the economies of Africa and Latin America. The twin banks also -- by expanding paper money through the creation of special draw-ing rights (SDRs) and by a flood of new lending -- helped to promote global inflation. What is more, the leading central banks, especially the U.S. Federal Reserve, never explicitly recognized the domestic-monetary-policy link to Bretton Woods, which was necessary to preserve the $35-per-ounce gold ratio or the foreign-currency peg to the dollar. Indeed, it was the U.S. that inflated its way off the system, ringing the death knell in 1971, when the gold window was formally closed.

In short, neither the U.S. Government nor any other was able to maintain the necessary discipline. Supporters of Bretton Woods ascribe the beginning of 1970s inflation to 1971, when President Nixon formally terminated the system. In reality, the beginning of the end came in the middle 1960s, when the Fed created new dollars at a very rapid rate. Federal Reserve credit (consisting mainly of the central bank's portfolio of U.S. Treasury securities and loans to member banks) which is the source of monetary-base dollar creation, increased at a 10.7 per cent yearly rate between 1963 and 1968, double the pace of the previous five years. In response to this inflationary money growth, gold that was trading freely in the London market moved up from $35 to $43 per ounce, a 23 per cent rise, which correctly heralded the coming inflation. So did long-term Treasury yields,

which moved up from 4¼ per cent to 7½ per cent between 1965 and 1970. The U.S. inflation rate, which averaged 1.6 per cent a year for the five years up to 1964, promptly moved to a 5.4 per cent annualized pace for the four years to 1970. All this occurred before the Bretton Woods system expired in 1971.

Why? Mainstream Keynesian economists continue to blame the 1970s inflation on Lyndon Johnson's Great Society program of Vietnam guns and welfare-entitlement butter. As this story goes, the lack of fiscal discipline created huge deficits that subsequently drove up inflation. However, from 1965 to 1970 the budget deficit averaged a tiny $7 billion a year, or 1.1 per cent of gross domestic product. It was an excess of money, not deficits, that started the age of inflation. And this excess, corroborated by the rise in the private-market gold price, occurred despite the Bretton Woods system.

After 1971, as gold completely disappeared from the official monetary scene, inflation raged among all the industrial countries. (When gold was the reference point, from 1950 to 1971, real GDP expanded at a 3.8 per cent annual rate, and the consumer price index at 2.1 per cent. When gold was removed, economic performance from 1971 to 1993 slumped to 2.5 per cent growth with 6 per cent inflation.) This undermined growth, capital formation, entrepreneurship, employment, financial markets, free trade, consumers, elderly pensioners, farmers, and the poor. Orthodox economists blamed greedy businessmen for raising prices, or ungrateful workers for demanding higher wages, or Arab sheiks for increasing oil prices; even God was blamed for bad weather and poor harvests. But none of the orthodox attempts to curb inflation worked. Wage and price

controls failed, higher taxes failed, monopolistic regulations failed, managed-exchange-rate schemes failed. They failed because the root cause of inflation was the printing of bad money. By government.

That's right, government. The Federal Reserve is an arm of the U.S. Government, just as central banks everywhere are. And governments are not to be trusted. In the United States, the Fed is to money as the Department of Health and Human Services is to social policy: it represents the narrow interest of elite Washington planners and their mistaken theories, not the grass-roots interests of the population at large. The latter wants stable money in order to invest, save, borrow, lend, trade, take risks, and prosper. The former want Keynesian fine-tuning, demand management, and economic control.

There are of course some in the Fed who have their ear closer to the ground, but even these good people get caught up in the prevailing ethos of Washington's corridors of power, the infectious culture of big government. For all its alleged independence, the Fed is very much a part of this culture.

``Everything the government touches turns to c---. It's a reverse Midas touch," Craig Roberts told the somewhat startled conservatives at the Empower America conference. But why were these conservatives startled? And why is it so difficult to recognize that the Bretton Woods system, designed by Keynes, was the perfect vehicle for big-government planning and tinkering with money? Conservatives do not trust government to tax, or spend, or regulate. They abhor government interference with

property rights, hiring policies, family values, or school curricula. Why should money be any different?

To restore sound money and permanent price stability, a new system must be designed which places the private international gold market at the center. That gold is still the best inflation indicator, I have no doubt. If the Fed had heeded the message of the world gold market, then the U.S. and the rest of the world would not have been forced to suffer the consequences of repeated stop-and-go policies. The gold price signal worked in the Sixties and Seventies to warn of impending inflation, and it worked in the Eighties and Nineties to signal disinflation. It even picked up the mild reflation of the late Eighties, just as it is now signaling another reflation.

Private citizens today are permitted to own and contract for gold. Indeed, they are free to exchange dollars for gold, commodities, foreign currencies, and foreign financial instruments as they wish. In that important sense we are already on a new gold standard. And for those who remain uncomfortable with gold as the single instrument of policy, there is no reason why the Fed should not also monitor price movements in the international auction markets for bonds, commodities, and currencies. All send off early warning signals of inflation.

The trouble is, the Federal Reserve -- and the Treasury -- are not heeding the markets' message. The authorities are still focused on economic variables such as unemployment, capacity utilization, retail sales, and real GDP, as if too much employment,

or production, or growth will create inflation. But prosperity does not cause inflation; bad money does. If money is sound, then people will hold it. If they hold it, then bond yields will fall, gold will be soft and commodities uneventful, and the dollar will rise. Call it the World Information Standard, or the New International Gold Standard, or the Bond Market Vigilantes. Whatever the label, markets, not government, should regulate the money supply.

What is to be done? We must take money out of the politicians' hands. To achieve this, I propose a series of new monetary reforms.

First, the Humphrey - Hawkins Act must be amended to eliminate the directive of low unemployment and to make price stability the Fed's sole objective. Printing more money will not reduce unemployment. Real purchasing power comes not from money creation but rather from profits, production, entrepreneurship, and risk taking. These are a function of low taxes, deregulation, free trade, and restrained federal spending, all of which permit proper incentives and returns for the private economy. The Fed's rule should be preservation of steady dollar purchasing power and stable prices. Government cannot and should not try to control the economy.

Second, price stability should be defined in terms of a specific inflation target; I propose a 0 to 3 per cent range for the rate of change of the CPI. Inflation targets have been successfully implemented in Britain, Canada, and New Zealand; Germany and France

are on the verge of such targets. It is time for the Fed to surrender. A cost-of-living target is something the public understands.

Third, the Fed's chairman and vice chairman should be given two years to meet this target. If after 24 months there is deflation, or above 3 per cent inflation, then they must resign. No position, no office, no parking spot, no tennis privileges. If the target is met, they may complete the remainder of their four-year terms.

Fourth, the Reserve Board must be subjected to strict term limits to avoid the Washingtonization trap. Right now board members are eligible to serve for 14 years. This is an outrage; no one should be permitted such power for so long. Terms should be limited to six years.

Fifth, all Federal Reserve operations to buy and sell -- whether government securities, or foreign currencies, or gold, or desk chairs and computers -- must be publicly announced in advance. The public has a right to know, and the Fed should not be in the business of favoring the New York financial community, as is now the case.

One additional point. Internally, the Fed should abandon control of the overnight federal-funds rate as a means of regulating Reserve Bank credit. Instead, the Fed should use global gold, commodity, financial, and currency market price signals. Let the overnight interest rate float according to market conditions. Right now, for example, the Fed fund rate is rising, but so are gold and commodity prices. This means policy is still too loose.

Indeed, interest rates are rising because the Fed is inflating. Operationally, the Fed should be extinguishing dollars until the gold price falls back to around $325.

What I have described here is a domestic price rule, subject to a clear target and to public accountability. The ultimate goal is a stable cost-of-living price index and steady domestic dollar purchasing power. The supply of dollars will be calibrated to dollar demand by price signals emanating from world gold and financial markets.

Way back in 1944, the economic journalist Henry Hazlitt wrote: ``The first essential is a determination to make currencies sound within each country. . . . This can only be done by the maintenance of the value of the dollar in terms of gold, along with a sound national budget and other sound internal policies." He was right then, but ignored. He is still right today.

There is no reason to ``fix" international currencies, for central banks merely waste taxpayer money in a futile effort to buck world markets. Nations that raise taxes and impose regulations, or engage in protectionist trade practices, will suffer a falling exchange rate. If the Clinton Administration has its way on raising taxes and nationalizing health care, then the dollar will decline, as it has already done this year. On the other hand, nations that strengthen their private sector through fiscal incentives will see their currency appreciate. But each nation has a right to do as it wishes. Supranational governmental agencies must not dictate.

withhold their supplies of capital and labor, since shrinking dollars further reduce the reward for work and risk-taking.

When both inflation and unemployment rose during the late Seventies, the Keynesian demand model imploded. Rather than stimulating demand, easy money drove inflation and interest rates sky high. Rather than holding down inflation, rising taxes weakened incentives and depressed the economy. Smart money and smart people boycotted the U.S. economy because it no longer paid to work and invest. Output and employment fell, while prices and interest rates rose.

Statistically, the demise of Keynesian demand-management policies is easy to chart. As the dollar was unhinged from gold, and as federal taxes and spending steadily moved up, aided respectively by inflation-driven bracket creep and by Great Society entitlements, the U.S. economy entered the stagflation period producing 7.2 per cent average annual inflation and 2.1 per cent real growth from 1968 to 1982. The average unemployment rate was 6.4 per cent. During the end of this period, from 1978 through 1982, industrial production declined 3.2 per cent, while the consumer price index rose 48 per cent. By late 1982, unemployment had risen to 11 per cent.

Contrast this with the early 1960s and most of the 1980s, when the dollar was more closely linked to gold and tax rates were brought down. From 1961 to 1967 real GDP growth averaged 4.9 per cent, yearly inflation 2.4 per cent, and unemployment 4.4 per cent. From 1982 through 1988, as President Reagan ushered in a return to hard money

and free-market risk-taking incentives, including across-the-board deregulation and tax cuts, real GDP increased by 3.9 per cent a year, and inflation averaged 3.6 per cent; by the end of the period unemployment had fallen to 5.4 per cent. Under Kennedy and Reagan, the classical economic model of sound money and free enterprise produced strong growth with low inflation and unemployment. There was no Phillips Curve trade-off between inflation and unemployment. Under Johnson, Nixon, Ford, and Carter, the Keynesian model produced low growth with high inflation and unemployment. In all three periods, unemployment and inflation moved up and down together.

Have Blinder and his fellow Keynesians learned anything from the historical evidence? Says Arthur Laffer, one of the principal architects of President Reagan's successful growth policies: ``There is no set of evidence that will ever shake their faith in the demand-side Keynesian theory of the Phillips Curve."

If this were merely an academic discussion, it would have little consequence. But Blinder is being touted by many as the next Federal Reserve chairman, and even now he is in a position as vice chairman to tilt the center of monetary gravity away from the relatively hard-money policies that have prevailed until recently.

Blinder's monetary liberalism has strong support in Congress. This year Democratic Senators Donald Riegle (Mich.), Paul Sarbanes (Md.), and Jim Sasser (Tenn.) -- all members of the Banking Committee -- have routinely trashed the Fed's belated interest-rate moves to restrain inflation. ``The Fed has launched another salvo of friendly

fire upon the economic recovery, despite overwhelming evidence that inflation is no threat," said Budget Committee Chairman Sasser after the Fed's latest rate hike.

At the Jackson Hole conference, however, the presidents and research directors of the 12 regional Reserve Banks were furious at Blinder's remarks, since they have spent years trying to focus Fed policy exclusively on the goal of price stability and away from economic fine-tuning. Indeed, virtually all participants agreed that chronic unemployment, especially in Europe, is a supply-side problem of excessive social-insurance spending and rigid labor laws. With high benefits and high payroll taxes to finance them, work incentives have disappeared, and a reserve army of the unemployed has emerged. Fortunately, the U.S. has not yet gone as far down this road as Europe. In any case, central banks have no role to play in resolving this structural problem.

Yet Fed Chairman Greenspan is still sending mixed signals on the central bank's policy targets. The interest-rate increase in August was accompanied by a statement that the measures ``were taken against the backdrop of evidence of continuing strength in the economic expansion and high levels of capacity utilization." In other words, too much growth might cause inflation. Economic policy wonk Jude Wanniski, who has worked hard to gain support for a gold price target, disapprovingly noted that ``Greenspan has not lifted a finger to alert markets that the Phillips Curve is not an operative theory."

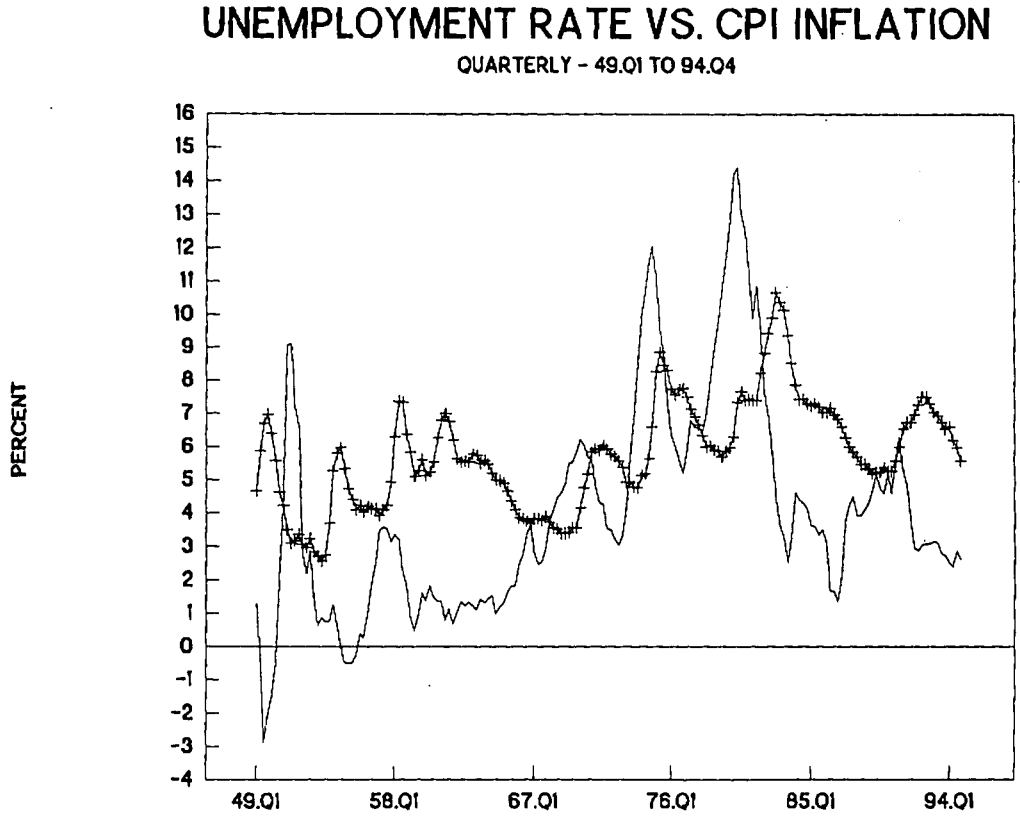
Greenspan occasionally pays lip service to the use of gold as an early-warning inflation indicator, but he never follows through. Blinder abhors the use of gold or

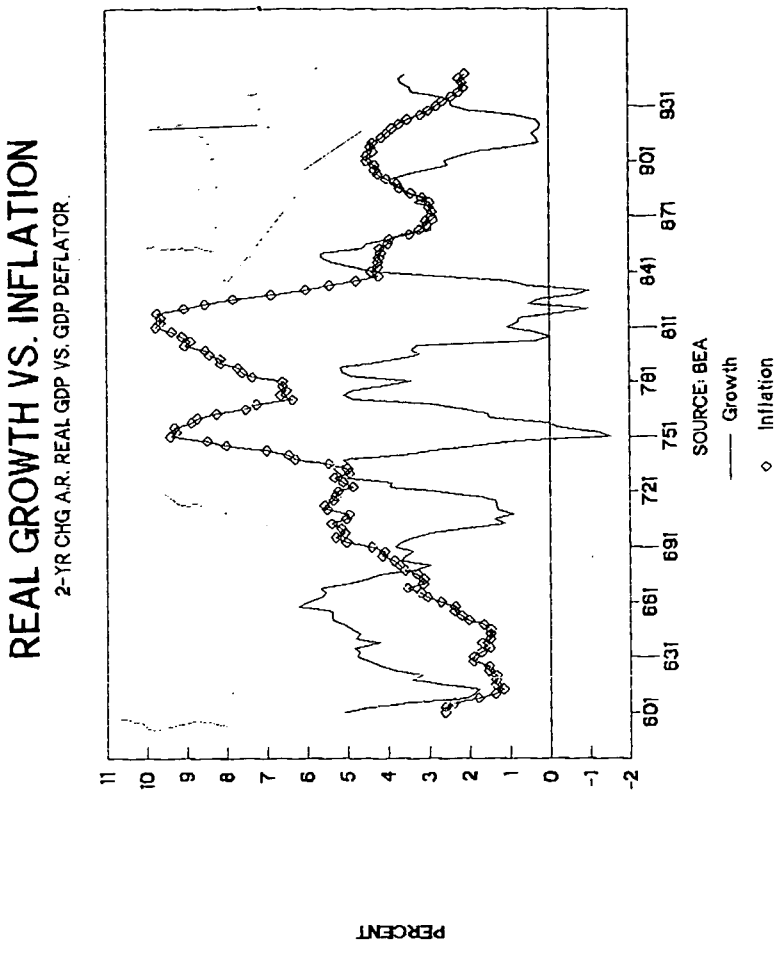
commodities, or for that matter any price signals from global auction markets. This is too bad, since both market prices and government reports are showing an inflation upturn. The widely followed Journal of Commerce industrial commodity index, for example, has just hit a new high, rising at a 25 per cent annual rate this year. Gold is holding around $390, and the dollar remains low in terms of the perennially hard Japanese yen and German mark.

These trends spell trouble for the economy, which is just beginning to suffer from the effects of easy money and higher taxes. The former will drive inflation higher, while the latter will depress growth. Blinder's Keynesian demand obsession will prevent him from understanding how prices and unemployment can rise simultaneously.

The solution can only be found on the supply side, where a dollar as good as gold could roll back inflation and interest rates, while permanent tax cuts on capital and labor (that is, capital-gains-tax and payroll-tax relief) would bring down unemployment. But having blinded himself to the past, the Fed's new man may be even blinder in the future.

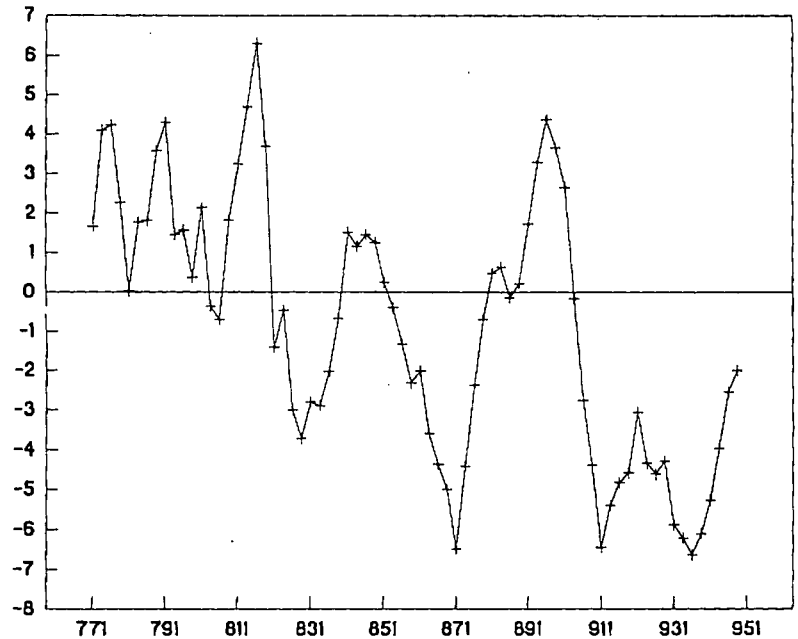
-END-


UNEMPLOYMENT RATE VS. CPI INFLATION
QUARTERLY - 49.Q1 TO 94.Q4
PERCENT
16
15
14
13
12
11
10
9
8
7
6
5
4
3
2
1
0
-1
-2
-3
-4
49.Q1
58.Q1
67.Q1
76.Q1
85.Q1
94.Q1


REAL GROWTH VS. INFLATION
2-YR CHG A.R. REAL GDP VS. GDP DEFLATOR
PERCENT
11
10
9
8
7
6
5
4
3
2
1
0
-1
-2
601
631
661
691
721
751
781
811
841
871
901
931
SOURCE: BEA
Growth
Inflation

ADJUSTED FED CREDIT: VELOCITY

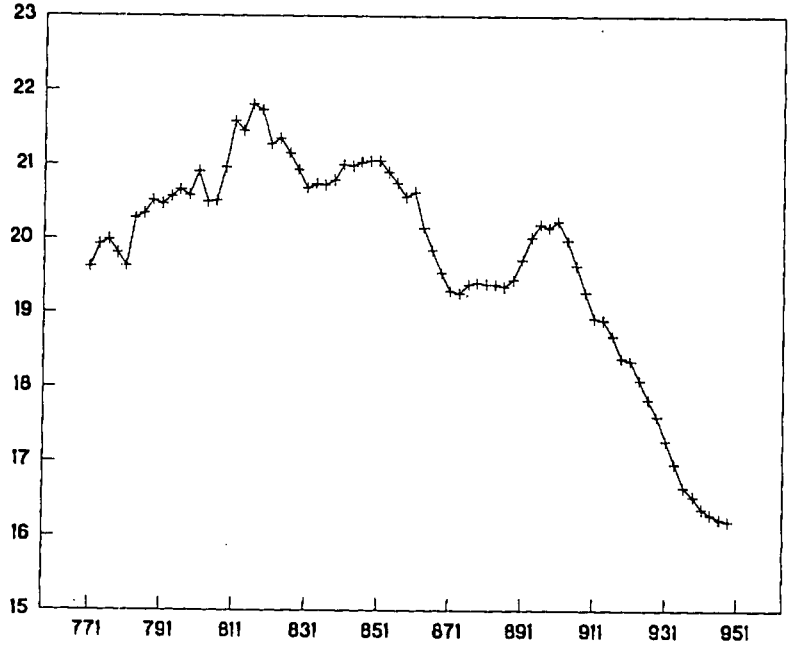
4-QTR CHANGE - 77:1 TO 94:4



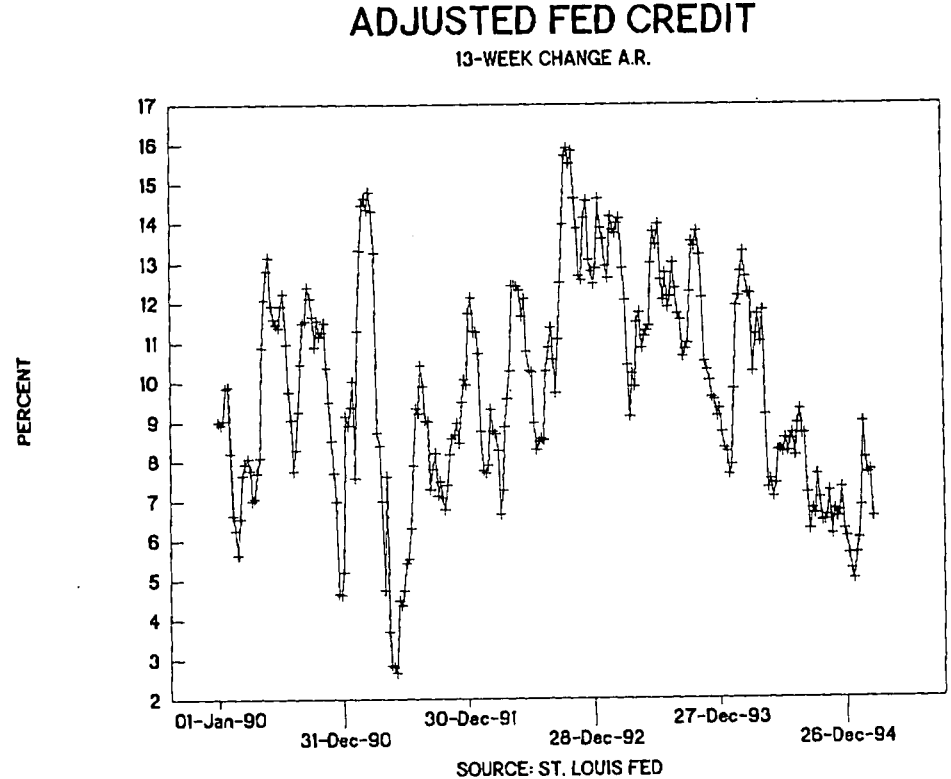
SOURCE: ST. LOUIS FED AND BEA

ADJUSTED FED CREDIT: VELOCITY

QUARTERLY - 77:1 TO 94:4

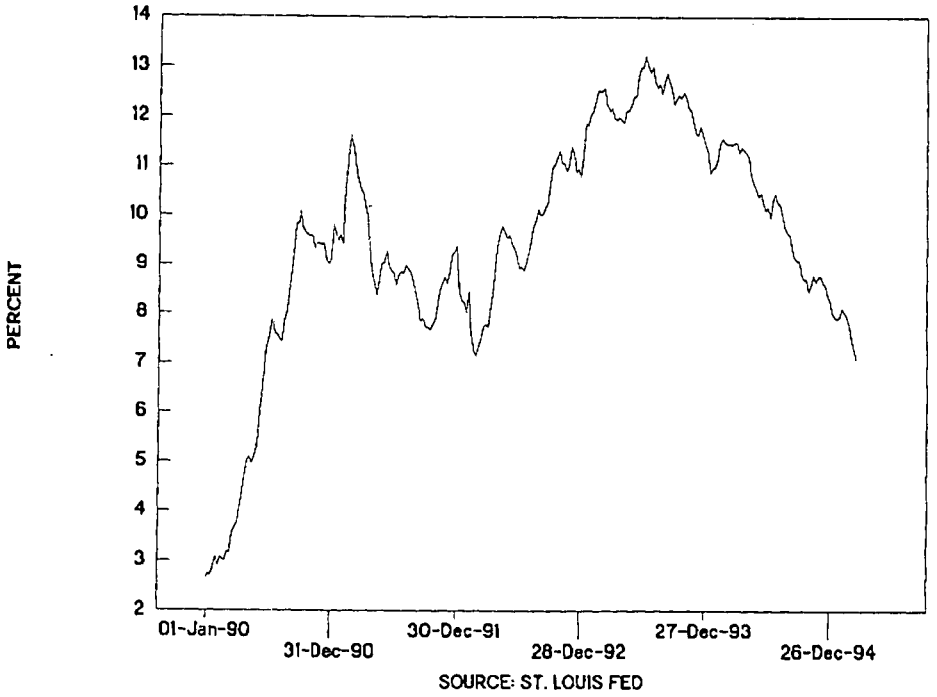


SOURCE: ST. LOUIS FED AND BEA


ADJUSTED FED CREDIT
13-WEEK CHANGE A.R.
PERCENT
17
16
15
14
13
12
11
10
9
8
7
6
5
4
3
2
01-Jan-90
31-Dec-90
30-Dec-91
28-Dec-92
27-Dec-93
26-Dec-94
SOURCE: ST. LOUIS FED

ADJUSTED FED CREDIT

52-WEEK CHANGE A.R.



SOURCE: ST. LOUIS FED

Statement by

Wayne D. Angell

Chief Economist and Senior Managing Director

Bear, Stearns & Co. Inc.

245 Park Avenue, New York, N. Y. 10167

before the

Joint Economic Committee

of the

United States Congress

March 16, 1995

Thank you for the opportunity to discuss and review the multiple goals set for monetary policy in The Full Employment and Balanced Growth Act of 1978. At the outset, it is important to make it clear that it is entirely appropriate for the government to pursue multiple goals for the economy. Lowering our unemployment rate, increasing our economic growth rate and maintaining a stable price level are all important goals for government policy. The issue before us today, however, is which of these goals should be assigned to the Federal Reserve, and which should be assigned to other government agencies. In other words, what can and should we ask monetary policy to do, and what goals should be assigned to other policy tools?

Government policy should seek to achieve the maximum sustainable growth rate of the economy and productivity over time, since this creates the largest amount of resources for consumer spending and investment, while generating tax revenues that can be applied to reducing the federal budget deficit. It is also a worthy goal to seek the lowest sustainable unemployment rate to ensure the maximum participation of the people of the United States in the gains of economic growth. However, we must ask ourselves what it is that monetary policy can contribute to achieving these goals?

The growth of the economy is determined by fundamental factors such as saving and investment, growth of the labor force, and technological progress. The unemployment rate is determined by job creation and labor force participation, which in turn is influenced by marginal tax rates including payroll taxes, the structure of welfare benefits, and the skills of the labor force. We need policies that promote saving and investment, encourage labor force participation, and seek to promote a better fit between the skills of the workforce and the needs of employers. I suggest that the Joint Economic Committee ask the Council of Economic Advisors to investigate and then produce a report on what policies can be adopted to achieve these goals. My own belief is that reform of the tax system in the direction of a flat tax on consumption rather than the current income tax system, with its high marginal tax rates on saving, would do much to remove the disincentives to saving and investment. I do not believe that assigning monetary policy to achieve the goals of lower unemployment or faster growth can achieve anything useful over the long haul. Maintaining the current multiple goals for the Federal Reserve will continue to be very counterproductive.

Monetary policy determines the scarcity of money relative to the amount of goods and services in the economy and hence the purchasing power of money. Accommodative monetary

89-805 O - 96 - 6

policy can temporarily boost the utilization of resources, and hence lower the unemployment rate, but this is not sustainable and has a cost in terms of higher inflation. A boost to money creation enables producers to raise prices, effectively lowering the real wage of workers. However, workers eventually respond by asking for higher wages to catch up for the past increase in prices and also for additional increases to protect against higher expected future inflation. Eventually, unless the Federal Reserve is going to accommodate a permanently higher inflation rate, monetary policy must shift to a restraining mode to lower expectations of future inflation. As the economy adjusts from an accommodative setting for monetary policy to a restrictive setting, a period of economic slowdown and rising unemployment usually ensues. The longer the Federal Reserve accommodates rising prices, the higher the rate of inflation will go and the greater will be the costs of restoring lower inflation in terms of unemployment.

The best contribution that the Federal Reserve can make to permanently achieving a faster growth rate or a lower unemployment rate is by focusing on the single goal of price stability. A stable price level eliminates the inflation tax on saving and investment. The US tax system heavily penalizes saving in a period of inflation, since for the purposes of computing taxes neither interest, profits nor capital gains are adjusted for the erosion of the purchasing power of the original investment due to inflation. The higher the inflation rate, the lower the after-tax return to investment. In addition, the uncertainty over the Federal Reserve's determination to pursue price stability under current legislation creates a monetary policy uncertainty premium that boosts interest rates. Moreover, the cyclical swings in resource utilization due to changes in the stance of monetary policy produce an inefficient usage of resources and depress the demand for capital goods.

The historical evidence that the best contribution that the Federal Reserve can make is pursuing stable prices is clear. During the Bretton Woods era, when monetary policy still kept an eye on maintaining the dollar's value in terms of gold, the average annual growth rate of real GDP from 1950 to 1968 was 3.8%, while the inflation rate measured by the CPI averaged 2.1%. However, after monetary policy lost its anchor and increasingly focused on fine tuning the real economy, the inflation rate moved higher, while the growth rate fell sharply. From 1970 to 1980, the average growth rate fell to 2.8%, while the inflation rate moved up to average 7.8%. The Federal Reserve's focus on restoring disinflation in the 1980s lowered the average inflation rate to 3.6% over the 1983 to 1994 period, while the average growth rate increased to 3.0%. It seems fairly apparent that there is no long run trade off between inflation and growth.

It also seems apparent that the cost of servicing the federal debt would be reduced if the Federal Reserve were to focus solely on maintaining a stable price level. In my judgment, the level of interest rates could fall by at least one percentage point if the Federal Reserve's only goal was price stability. Back in 1968, at the end of the Bretton Woods era, the average interest rate paid on the federal debt was about 4.1%. Last year, that average rate was about 5.9%. In other words, the average interest rate paid on the federal debt was about 30% lower in 1968 than in 1994. This comparison suggests that the elimination of the inflation and monetary policy uncertainty premiums from interest rates could ultimately lower the funding costs of the federal debt by about $60 billion a year at current debt levels.

The Federal Reserve needs to be provided with the single goal of seeking and maintaining a stable price level. The transition to a stable price level must be made in the least disruptive way for the economy. We do not want a destabilizing monetary shock. We need the Federal Reserve to carefully plan the transition to a stable price level and then explain that transition to the Congress and the American people. The Federal Reserve should tell us:

- when the current rise in the rate of inflation will come to an end;
- when the process of disinflation will begin;
- how fast the inflation rate will come down; and
- when price stability will be achieved.

Monetary policy can contribute to increasing the potential growth rate of the US economy. If monetary policy focuses solely on a smooth transition to price level stability, then it will be making its maximum contribution to increasing the growth potential of the US economy. If, on the other hand, we ask monetary policy to maximize short-term growth, at the sacrifice of price-level stability, then monetary policy will contribute to a lower growth rate rather than a higher growth rate. We need to clearly understand that when monetary policy falls into a destabilizing pattern, both actual and potential economic growth fall below optimum rates.

THE WALL STREET JOURNAL.

THE WALL STREET JOURNAL WEDNESDAY, NOVEMBER 16, 1994

A Single Goal for the Fed

By Wayne Angell

While Congress has placed responsibility for running monetary policy in an independent central bank, it has retained a leash by setting the goals for, and reviewing and evaluating the performance of, the Federal Reserve. Unfortunately, it has given the Fed multiple goals, a recipe for economic instability.

When the federal reserve raised short-term rates 75 basis points yesterday, it justified the action as being "necessary to keep inflation contained and thereby foster sustainable economic growth." It would be much easier for the Fed if it could focus solely on achieving and maintaining a stable price level, eliminating other goals now assigned by the Humphrey-Hawkins Act, or the Full Employment and Balanced Growth Act of 1978 as it is titled. If Humphrey-Hawkins were to be amended as part of the Republicans' 100-day program, and the Fed laid out a credible and measurable strategy to achieve price stability, expectations of continued disinflation could be quickly restored. If expectations of disinflation can be restored, then interest rates in this cycle might peak some 100 basis points below what would otherwise be the case.

All These Tasks

It is completely appropriate to give our government multiple goals, including lowering unemployment, promoting economic growth and maintaining stable prices. All of these goals contribute to the well-being of our people. There is much to lose, however, in charging the Federal Reserve with all these tasks. First, asking monetary policy to address multiple goals greatly increases the likelihood that the Fed itself will produce economic instability. Economic instability costs workers' jobs; it also harms economic growth by idling valuable resources and by increasing the risks to investment. This is a path to inflation.

Second, it is counterproductive to ask monetary policy to do what it cannot do. The Humphrey-Hawkins Act requires the Fed to keep inflation at 3% or less with a goal of zero inflation, provided the unemployment rate as measured by the Bureau of Labor Statistics is under 3% for adults of age 20 or above and under 4% for ages 16 to 19. The Humphrey-Hawkins Act rests on the mistaken belief that a market economy is inherently unstable, and needs help from the Fed to push it toward full employment. Yet the act also asks the Fed to pursue reasonable price stability.

What is the Fed to do? Use its own judgment to move in the direction President Reagan wanted when the Fed was being admonished by the under secretary of the treasury that it was too easy in 1982, 1983 and 1984? When President Clinton was elected in 1992 was the Fed supposed to create more high-powered reserves in order to meet his emphasis on jobs? In 1993 the Fed could have taken action to stimulate jobs only to find that the economy was already accelerating. Do we want to saddle the Fed with responsibility to swing the economy with the election returns? Now that we have seen the 1994 election returns is the Fed supposed to stamp on the monetary brakes?

The Humphrey-Hawkins Act rests on the mistaken belief that a market economy is inherently unstable, and needs help from the Fed to push it toward full employment.

This is crazy. We do not want the Fed to have to appear to want to punish growth. Growth is our friend. We should always want more growth. But we need to leave behind once and for all the notion that we can grow faster by shoving money out the Fed's door at a rate that will provide a surprise inflation and thereby fool workers with lowered real wages. No wonder the voters are angry. It is time for straight and honest talk. It is time for truth-in-government and truth-in-monetary-policy.

Let's put it this way. Central banks have an innate ability to drive inflation upward to 10%, to 100%, or to 1,000% annual rates. You name your inflation figure and a central bank can do it. No one can doubt this. A central bank can be dangerous to the health of a nation.

That is why, in 1914, Congress limited the Federal Reserve's authority to create reserve money to two and a half times the value of its gold certificates. Congress was not about to give the new Federal Reserve unlimited ability to create money. After the last links to gold were lifted in 1971, Congress neglected to provide a restraint on reserve bank credit creation. If the Federal Reserve had been given a clear mandate to keep inflation in a specified range, we could have avoided the double-digit inflation of the 1970s. The emphasis on full employment found in the Full Employment Act of 1946 was leaning the other way.

If the Federal Reserve had one assignment, to get the unemployment rate down to 2%, could it do it? The answer is "no." The Fed can alter temporarily the unemployment rate by doing something unexpected. But it would be pretty silly to gun the throttle or slam on the brakes to produce a temporary change in unemployment. The end result would be to drive prices up or down. Who would advocate telling the Fed, "Your sole responsibility is to get unemployment rates down to the 3% percent level specified in the Humphrey-Hawkins Act?" The Fed could not succeed in doing that and it would wreck our economy if it tried.

Suppose we specify that the Federal Reserve maximize the pace of economic growth during the period leading up to the next presidential election. What would happen? The Fed would pump more reserves into the system to lower interest rates, resulting in a "go" phase for the economy. Bond prices and the dollar would fall as such a monetary action expanded dollar reserves and led to higher future inflation. Such results would limit the short-run growth gain and worsen long-run growth prospects. Sooner or later the Fed would have to step on the monetary brakes, producing a synchronized "stop" phase and the threat of recession.

Economic instability is thus the result of the attempts of discretionary monetary policy to focus, even in the short-run, on any goal other than price-level stabilization. Costly monetary-policy synchronized downturns would be avoided if the Fed were accountable only for the purchasing power of the currency. Fed Chairman Alan Greenspan in congressional testimony five years ago argued that "price stability is a prerequisite for, over time, maximizing economic growth and standards of living" and that price stability is "in the best interests of the nation" and is "achievable." I agree with him. Let's do it.

With amendments to Humphrey-Hawkins, the Fed should be free to define the price index that it will use to measure price-level stability and free to choose the indicators that it will look at to measure progress toward achieving this objective. In addition, the Fed should be asked to determine the date when price-level stability will be achieved. I expect that that date would be some years out, perhaps the year 2000, to avoid the need for the Fed to slam on the monetary brakes and cause instability. Humphrey-Hawkins should still require the chairman of the Fed to report semiannually to Congress on the progress that the Fed is making in achieving price stability.

There are bound to be short-run costs associated with the transition to price stability since expectations of inflation are currently inconsistent with price stability. Close approximation to price stability hasn't been seen since the mid 1960s. Between 1958 and 1965, the consumer-price-index inflation rate averaged 1.4%, and never exceeded 1.9% in any year. Now the published inflation rate as measured by the CPI is 3.0%; this is only 0.7 percentage points above the low for this cycle, the 2.3% inflation rate recorded between April 1993 and April 1994.

The costs of transition will be minimized if the initial goal of price stability is achieved over a period of time. This would allow expectations to adjust gradually. But the Fed must set clear and observable intermediate targets so that the public can see that consistent, steady progress is being made to achieve price stability. In 1989, when the CPI inflation rate was 4%, Alan Greenspan thought a five-year deadline to achieve price stability was "attainable." Would it be easier to attain this goal five years from today? How much more difficult will it become if inflation is allowed to accelerate another 0.7 percentage point to 3.7% and inflation expectations become imbedded in wage rates and in the price of farm land, houses and office buildings?

Enormous Benefits

The benefits of price stability are enormous. The elimination of inflation and inflation uncertainty would allow long-term interest rates to decline. This would not only stimulate investment but also reduce the interest costs of the federal debt, which would help the federal government to achieve a balanced budget. Workers could save for retirement without worrying about protecting savings against the ravages of inflation. The price mechanism, which is at the heart of the allocation of resources in our economy, would send out clearer signals. The go-stop cycle of monetary policy, the prime cause of economic instability and recessions in the U.S. would be abolished.

The 1992 and 1994 elections sent a message that the voters want truth-in-government. The electorate is saying, "Do not tell us one thing and then do what you find convenient." The members of Congress know they are on the line, and they may want to ask the Fed to put its expertise on the line as well. That would mean reporting on the estimated price index for each fourth quarter for the next five years, setting grade standards and grading itself against them. The Congress and the public could then measure the Fed's performance against a single goal, without short-term distractions from its overriding objective of price stability.

Mr. Angell, a governor of the Federal Reserve from February 1986 to February 1994, is now chief economist of Bear, Stearns & Co.

Statement of Thomas Havrilesky
Professor of Economics, Duke
University, Durham, North Carolina
Before the Joint Economic Committee
of Congress. March 16, 1995

Beginning nearly forty years ago with the work of Milton Friedman, intensified by the rational expectation revolution of the 1970s and 1980s, and supported by recent empirical work, a stream of economic research indicates that insulating the central bank from political pressures will improve inflation performance.

The attainment of zero inflation will reallocate resources away from speculation and price searching and repricing. Also, it will reduce uncertainty (thereby encouraging long-term planning), and encourage saving and investment. Thereby, it will increase efficiency, boost economic growth, and raise wealth. The benefits are even greater when one considers that our major trading partners are moving toward restructuring their central banks in ways which improve inflation performance. If their inflation performance improves and ours does not, our international competitiveness will suffer.

In order to gain the benefits of price stability, some may contend that we must sacrifice the ability of the Federal Reserve to manipulate real interest rates, real exchange rates, output and employment. However, modern economic theory shows that such leverage is only temporary, predicated on monetary surprises.

Monetary surprises lead invariably to higher inflation. Moreover, they require that a shroud of uncertainty surrounds the monetary policy process. This converts monetary policy into an arena for political jousting, involving vested interests, Fed-watchers, and an assortment of groups which might gain or benefit from monetary manipulation. This environment also virtually requires that the Federal Reserve invest taxpayer's resources in shielding its policy moves. Moreover, all of these activities consume resources that otherwise might be productively employed.

Finally, we should not overlook the fact that when monetary policy is so politicized it advances coercion and threat at the expense of market exchange as a social organizer. In this era of social disarray and disruption of community fabric, the atmosphere of order and trust that is associated with a stable monetary environment should not be lightly regarded.

My empirical research that is pertinent to these matters falls into two areas. The first involves measuring the effect of political pressures on monetary policy* (See items 1-6 in the attached References). These results are published in The Pressures on American Monetary Policy, revised edition, Kluwer Academic Publishers, 1995. They show that under no Federal Reserve Chairman in the past twenty-five years (with the exception of the curious and

*I am attaching a recent review article which expands on the research findings cited here.

brief tenure of G. William Miller) has the Federal Reserve not, at some time, been responsive to Administration pressure. They suggest compliance takes place whenever the Chairman has political or partisan allegiance to the Administration. For example, the data indicate that Fed monetary policy was responsive to Administrative signaling during the Nixon-Burns, Carter-Volcker and Reagan-Greenspan periods. It should be clear from this evidence that, despite decades of ballyhoo, having a respected, conservative and experienced Chairman does not always provide protection against politically-induced monetary excess. Structural reform of the Federal Reserve can provide institutional defenses against monetary excess.

The second area of my empirical research involves studying appointments to the FOMC* (See items 7-12 in the attached References). These results are also published in The Pressures on American Monetary Policy revised edition, Kluwer Academic Publishers, 1995. They indicate that FOMC members vote the preferences of the President who occupied the White House at the time of their appointment. This correlation also applies to Reserve Bank Presidents. My tests also show that Bank Presidents are more firmly opposed to inflation than are politically appointed Governors.

This empirical research suggests that political influences on monetary policy that lead to higher and more variable inflation can be reduced by making the Federal Reserve more accountable. There are several ways to increase the Fed's accountability. One way is to make a singular price stability goal the only long-term policy objective. Another way would be to require the Fed to continue to specify its policy intentions, a practice begun by Chairman Greenspan in early 1994. In addition, the Federal Reserve should also be required to divulge its forecasts and to stipulate what it would do if these forecasts and its monetary targets are not realized. Even further progress would require greater and more prompt Federal Reserve disclosure of the edited transcripts of its policy deliberations. Finally, as I originally proposed in the Journal of Political Economy back in 1972 and as formalized in some recent publications by Professor Carl Walsh and Professors Fratianni, Walker and von Hagen, the Federal Reserve should be subject to sanctions for poor inflation performance.

Some of the items on this list of ways to improve accountability may be opposed by Fed officials and their clientele in the financial services sector and in the financial regulatory bureaucracy under the ancient excuse that they constitute attacks on Fed "independence." However, independence, what I call autonomy, defined as "distance from the executive branch of central government," is a separate dimension of central bank structure and this dimension is not related to central bank accountability. Thus, none of these measures would reduce Fed autonomy.

In fact, inflationary political influences on monetary policy can also be reduced by making the Federal Reserve more autonomous. This can be accomplished by increasing the proportion of Bank Presidents on the FOMC, by

---

*I am attaching a recent review article which expands on the research findings cited here.

making the term of the Chairman 6 years, instead of the current 4 years, and by stipulating that the Vice Chairmanship be assigned to the Governor with the most seniority, rather than permit the current arrangement to continue wherein the Vice Chairman has been serving as the "point man" for the Administration (See items 13-15 in the References).

The goal of price stability should not be a straight jacket. The Federal Reserve should have the latitude to respond to genuine crises. However, this latitude should not serve as a masquerade to cover up Fed responsiveness to political pressures. In order to provide the latitude for responsiveness to crises, the Federal Reserve should be required to sustain a stable price level averaged over two or three years

The preceding paragraphs offer a list of items which would improve the accountability and autonomy of the Federal Reserve. As I argue in a number of recent papers, this sort of monetary reform can be practicable if the proper combination of these items is assembled in a legislative package (See items 16-18 in the attached References). In closing, let me also point out that my latest research shows that, for a sample of fourteen nations across the past three decades, increases in accountability (specifically, making the central bank responsible for inflation) and increases in autonomy (specifically, lengthening the term of the central bank Chairman) reduce inflation.

References

(1) "A Partisanship Theory of Fiscal and Monetary Regimes", Journal of Money Credit and Banking, Vol. 19, No. 3 (August, 1987), pp. 308-325.

(2) "Monetary Policy Signaling from the Administration to the Federal Reserve," Journal of Money, Credit and Banking, Vol. 20, No. 1 (February, 1988).

(3) "A Theory of FOMC Dissent Voting with Evidence from the Time Series," in Thomas Mayer (ed.) The Political Economy of American Monetary Policy (Cambridge University Press, 1990) (with Robert Schweitzer), pp. 197-210.

(4) "The Influence of the Federal Advisory Council on Monetary Policy," Journal of Money, Credit and Banking, Vol. 22, No. 1, (February, 1990), pp. 37-50).

(5) "The Frequency of Signaling from the Administration to the Federal Reserve," Journal of Money, Credit and Banking, Vol. 23, No. 3 (August, 1991), pp. 423-428.

(6) "A Public Choice Perspective on the Cycle in Monetary Policy," Cato Journal, Vol. 9, No. 3, (Winter, 1990), pp. 709-718.

(7) "Packing the Board of Governors," Challenge, Vol. 33, (March/April, 1990) (with John Gildea), pp. 52-55.

(8) "Screening FOMC Members for their Biases and Dependability," Economics and Politics (with John Gildea), Vol. 3, No. 2 (July, 1991), pp. 139-149.

(9) "Reliable and Unreliable Appointees to the Board of Governors," Public Choice, Vol. 73 (May, 1992) (with John Gildea), pp. 397-417.

(10) "Partisan Monetary Policies: Presidential Influence through the Power of Appointment" (with Henry Chappell and Rob McGregor), Quarterly Journal of Economics, Vol. 107, No. 1 (February, 1993), pp. 185-218.

(11) "Policymakers, Institutions and Central Bank Decisions" (with Henry Chappell and Rob McGregor), Journal of Economics and Business (forthcoming, 1995).

(12) "The Biases of Federal Reserve Bank Presidents" (with John Gildea), Economic Inquiry (forthcoming, 1995).

(13) "The Federal Reserve Chairman as Hero: Our Defense Against Monetary Excess?" Cato Journal, Vol. 11, No. 2, (Fall 1991), pp. 65-72.

(14) "The Psychopathology of Monetary Policy," Contemporary Policy Issues, Vol. 9 (July, 1991), pp. 71-75.

(15) "The Politicization of Monetary Policy: The Vice Chairman as Administration's Point Man," Cato Journal, Vol. 13, No. 1 (Fall, 1993).

(16) "Restructuring the Fed," Journal of Economics and Business (forthcoming, 1995).

(17) "The Political Economy of Monetary Policy," European Journal of Political Economy, Vol. 10 (January, 1994), pp. 1-24.

(18) "Congress Threatens the Fed," Challenge, Vol. 36, No. 2 (with Henry Chappell, John Gildea and Rob McGregor) (March, 1993), pp. 50-57.

ELSEVIER European Journal of Political Economy 10 (1994) 111–134

European Journal of POLITICAL ECONOMY

The political economy of monetary policy

Thomas Havrilesky

Duke University, Economics Department, 305 Social Sciences, DPC 90097, Durham, NC 27708-0097, USA

Accepted for publication November 1993

Abstract

Understanding the political economy of monetary policy has progressed in recent years because of advances in three areas: the application of rational expectations perspectives to monetary policy, the extension of the economic theory of bureaucracy and public choice insights to monetary policy institutions, and statistical research regarding political influences on monetary policy and related inflation performance. This paper first discusses how Keynesian, game theoretic and partisan modeling of monetary policy have actually inhibited a realistic political economy understanding. It then reviews developments in each of the three areas of progress. It also shows how these recent advances provide insights into the costs of monetary policy as well as into the economics of optimal monetary reform – specifically, the optimal restructuring of central banks.

Key words: Theories of monetary policy; Public-choice approach to monetary policy; Costs of monetary policy; Monetary policy signaling; Monetary policy appointments; Central bank restructuring; Monetary policy reform

JEL classification: E58

1. Introduction

Monetary policy is one of the most commonly discussed and least understood aspects of modern economic life. Despite the attention that the policy actions of central banks receive in the media, market participants have difficulty predicting them. As a consequence, the costs and benefits to various economic interest groups of changes in monetary policy are shrouded in uncertainty. There are several reasons for this: First, direct transfers to identifiable interest groups at the expense of other interest groups are politically dangerous. If the costs and benefits of changes in monetary policy

SSDI 0176-2680(93)E0035-4

were clearly and openly identified, the political flak would be formidable. Second, in order for monetary policy actions to be able to affect real interest, real exchange, unemployment and growth rates, they must be surprises.[1] Therefore, if the winners and losers from changes in monetary policy were identifiable before the fact, the element of surprise might be lost and the changes would be ineffective. Thus, in a modern democracy complete monetary policy openness is an oxymoron.[2] A totally open monetary policy would simply not have the ability to effect politically desirable redistributions of income.

Another reason that the political economy of monetary policy is not well understood is that the waters have been muddied by conflicting theoretical perspectives. This paper will first point out the ways in which Keynesian, game theoretic and partisan modeling of monetary policy have actually impeded a realistic political economy understanding of the policy process. Then it will develop a public choice perspective on the political economy of monetary policy and, in this context, discuss the costs of monetary policy. Section 4 will survey recent statistical findings on the political economy of monetary policy and suggest areas for future research. The paper closes with a discussion of the economics of optimal reform of the structure of central banks, including the proposed European Central Bank (Delors Report, 1989).

2. Impediments to understanding the political economy of monetary policy

2.1. Keynesian models of monetary policy

Within the Keynesian tradition the central bank is typically seen as an independent manipulator of interest, exchange, unemployment and growth rates. In this genre the monetary authority is an apolitical monolith which behaves in the public interest, unsullied by diverse bureaucratic goals or outside pressures. Research programs in monetary policy which are conditioned on this view are remarkable for their narrow scope. They are limited

[1] This stimulus occurs because certain wages and prices are constrained by explicit or implicit nominal wage and price contracts which are drawn up before the (unanticipated) inflation takes place. Under this condition when unanticipated inflation increases the demand for a good or service, its own price is constrained from rising by these contracts and the quantity supplied rises. Thus, there will be a positive correlation between unanticipated changes in inflation and changes in output. If, in contrast, a bout of inflation is anticipated, it will be built into nominal wage and price contracts. Under this condition, when anticipated inflation increases the demand for a service or good, its own price will rise in the same proportion, the equilibrium quantity supplied will not change and there will be no correlation between anticipated changes in inflation and changes in output.

[2] This position should not be interpreted to mean that reforms in the direction of increased precommitment (less secrecy) are not feasible. The last section of this paper demonstrates that marginal changes in central bank secrecy may be optimal.

to control theoretic strategies involving the choice of optimal instruments and target variables as well as the choice of optimal operating procedures for the central bank, covering rather arcane matters such as reserve accounting and discount rate administration. Inasmuch as these research programs are premised on a squeaky-clean image of the central bank, they must necessarily ignore bureaucratic goals and outside influences. Little wonder that the world's central banks, in their efforts to avoid conferring legitimacy on political economy research which identifies these goals and influences, have tended to promote the politically-cleansed Keynesian tradition.[3] In contrast, monetarist models are somewhat more sympathetic to political economy perspectives. This may be because official, central bank-endorsed, formal models of the monetary policy process developed historically only in response to the monetarist critique which, in turn, was tempered by political realism (Mayer, 1990). In the 1960s and 1970s practically all of the politically realistic discussion of and research on monetary policy was published in monetarist – friendly journals and books, e.g., Reuber (1966), Dewald and Johnson (1963), Wood (1967) and Havrilesky (1967). Monetarist congeniality toward analysis of the political economy of monetary policy continued into the 1980s and 1990s. It is nicely captured in Milton Friedman's statement 'the real argument' (in favor of monetary rules) 'is a least as much political as it is economic' (Friedman, 1982).

With the 1991 Maastricht Agreement requiring a reduction in political influences upon (an increase in the autonomy of) the central banks of the European Community and planning convergence to a single autonomous European central bank, the politically-cleansed Keynesian model began to lose authority in Europe. However, it still holds sway in the United States.

2.2. *Game theoretic models*

During the 1980s and early 1990s the rational expectations-game theoretic paradigm came to dominate the monetary policy writing in a number of highly regarded economics journals as well as in the macroeconomic policy research agenda of the National Bureau of Economic Research. The literature is far too extensive to survey here but Cukierman (1992) provides excellent analytical coverage. Suffice to say that for over a decade this mode

[3] Central banks' research budgets have played an important role in shaping the monetary policy research agenda. The research programs of central banks and of the academicians whom they subsidize have seldom realistically addressed the political economy of modern monetary policy. Moreover, official central bank publications have rarely examined the subject. Since central banks either employ or subsidize a majority of the world's monetary economists, over the years a formidable pool of research resources has been systematically diverted away from the area. With career advancement at stake, young scholars are unlikely to challenge official and unofficial taboos.

of research has so clearly been in the ascendancy that its attenuation cannot be far off.

The phenomenon of paradigm ascendancy, domination, and attenuation in economics research is not new. Various research networks systematically specialize and invest their resources in paradigmatic bubbles, regularly exterminating generation after generation of lemming-like disciples in the icy waters of paradigmatic decline. One reason for such acute overspecialization and episodic decline may lie in the profession's worship of mathematical formalism and technique and its related neglect of history, institutional reality, the sister social sciences and even developments in complementary areas of economics. Such neglect virtually assures that paradigms will not only be isolated from ongoing advances in related areas but will be judged by narrow, internally generated, criteria. While there are several reasons for this, the most obvious is that technical proficiency is substituted for other types of knowledge.

The pitfalls of technical overspecialization and isolation are revealed dramatically in the rational expectations–game theoretic modeling of monetary policy. Its institutional premises appear conspicuously flimsy to students of monetary history and monetary institutions. Monetary policy institutions consist, in this genre, either of the archetypal mythic policymaker (usually a politician) who either is entirely precommitted to rules, builds a reputation for usually obeying these rules, embraces rules with escape clauses (limited commitment) given sufficiently large stochastic shocks, or assigns policymaking to a central banker with 'secretive and conservative preferences'. As discussed earlier, this central banker must be secretive so that policy can have real effects. He must be conservative so that he can be expected to reduce expected inflation when the opportunities arise. The only other actors in the scenario are atomistic market participants with whom the policymaker plays loss-minimizing games in employment/inflation space and whose voting (the only form of political support) generates solitary election-centered monetary surprises. These monetary surprises are followed by rapid convergence of money growth to an inflationary equilibrium.

The prescriptions regarding monetary reform that emerge from so stark a view are so simplistic and bland that they make political realists wince. They are simplistic because their authors do not deal with reciprocity between interest groups, politicians and central bankers in a general and unified framework of an economic theory of bureaucracy and regulatory capture. The prescriptions are bland because they emanate from intellectual tinkering and are not fired by concern for the monetary excesses and wasteful rent-seeking that permeate real world monetary policy behavior.

The game theoretic paradigm can do no better because, so far, it has ignored the elemental insights into central banking and monetary policymaking provided by the literature in several areas. There is absolutely no

recognition given to the public choice literature which argues that uncertainty and misdirection, the attendant social costs of the central bank's obfuscating, market participants's sleuthing and interest group's lobbying and resultant continual learning and adaptation are fundamental to understanding our monetary policy institutions. The paradigm also has disregarded statistical work on monetary policymaking, discussed later in this paper, which shows that financial and nonfinancial, regulated and unregulated, rent-seeking interest groups as well as the executive and legislative branches of government directly and systematically influence monetary policy and that the related reduction in central bank autonomy hampers inflation performance. The costs and benefits associated with this influence for politicians, interest groups, and central bankers emanate from bureaucratic arrangements that have been carefully studied by several economists and political scientists, but apparently overlooked by the game theoretic modelers. As we shall see in later sections, public choice, statistical and institutional research informs us that monetary policy surprises are not predominantly a by product of election-centered inflation games with atomistic workers. Rather they arise largely from redistributive (fiscal) policy (and other) shocks that generate pressures on the central bank from well-defined constituencies regarding interest and exchange as well as unemployment and growth rates. If game theory is to be applied to monetary policy, these areas of research would promote the development of models involving multiple, political and private, principals bargaining uncoordinatedly with a single central bank agent or with a group of agents (the central bank board). In other words, public choice, statistical and institutional research suggests that monetary surprises depend predominantly not on elections but on the effects of fiscal and other shocks on the political support of interest groups, given the partisan divisions within the branches of government and within the central bank board. From this perspective game theoretic modeling should focus upon the interplay between the multiple principals on the one hand and the central bank's chairman or president and board members on the other hand.

By neglecting the hard evidence on how politicians and interest groups directly and systematically influence policy, the advocates of game-theoretic modeling, have so far, failed to recognize how the carrots and sticks of politicians and interest groups determine when the policymaker breaks the rules, bends his precommitments and responds to stochastic shocks, including fiscal shocks initiated by the same politicians and interest groups. These carrots and sticks render 'secretive and conservative' central bankers bashable and manipulatable. Game theory devotees also seem to have ignored the caveats of monetary history regarding the danger of displacing formal structural defenses against monetary excesses (e.g., 'rules') with politicized central banker discretion. They seem to have mistaken either the ceremonial genuflection by politician principals and their central banker agents at the

icon of central bank 'independence' or the intervals of relative central bank 'independence' for permanent central bank autonomy and precommitment. As we shall see in the final section of this paper, central bank autonomy and central bank precommitment can be measured and stipulated by legislation. These structural parameters, and not the 'preferences of central bankers', are the proper focus for realistic monetary reform.

2.3. *The partisan theory of monetary policy*

The original Nordhaus (1975) theory of the political business cycle, (PBC), that incumbent governments stimulate the economy in election years and dampen it in non election years, proved inconsonant with rational expectations reasoning. In addition, with the exception of the findings of Haynes and Stone (1987, 1989) and Grier (1987, 1989, 1993), researchers report that in the United States the key economic aggregates do not follow four-year electoral PBC cycles.[4] In contrast, the partisan theory of the inter-election behavior of the monetary aggregates is somewhat more generally accepted. It explains inter-election money growth in terms of the different targets for output, unemployment, and inflation that the political parties are assumed to have.[5]

This theory maintains that expected post-election output, employment, and inflation outcomes influence the voting behavior of each party's constituencies in different ways. Three different sources support this view. First, the conventional wisdom, fortified by political opinion surveys (Hibbs, 1987), holds that reductions in unemployment favor left of center constituencies more than they do right of center ones, while the opposite effects are ascribed to reductions in inflation (Schneider and Frey, 1988). Second, the growth rate of aggregate output and years of left of center tenure in the executive branch are positively correlated (Alesina and Sachs, 1988; Hibbs, 1987). Third, much of the reaction function literature reports stronger monetary policy responses to output or unemployment under left of center administrations than under right of center ones (Khoury, 1990).

---

[4] Haynes and Stone (1987, 1989) and Grier (1987, 1989, 1993) measure a political business cycle which features an interelection boom in output followed by a pre-election collapse. Roger Waud has suggested that these phases may not be associated with macroeconomic policy but may rather be the product of swings in the uncertainty of market participants, peaking before an election and troughing after an election.

[5] Pathbreaking studies are those of Hibbs (1977), Fair (1978) and Chappell and Keech (1985). The overviews of Beck (1987) and Alt (1991) are valuable. Hibbs (1992) provides an extensive survey of the literature. Ellis (1989), Balke (1991) and Ellis and Thoma (1991) successfully marry the political business cycle and partisan theories. The paper by Gärtner (1994) in this volume also presents a concise survey of PBC and partisan theory.

Because election results are not predictable with certainty, the partisan theory conjectures that money supply growth will increase unexpectedly immediately after a left of center government is elected and will decrease unexpectedly immediately after a right of center government is elected. The theory predicts that following these surprises, a higher, time-consistent money growth path will exist under left of center administrations during the inter-election period than will exist under right of center ones (Cukierman, 1992).

The partisan theory is thus driven by the economic demands of voters. It is consistent with median voter models of the political process. The theory is also consistent with the assumption of forward-looking agent behavior. Under the partisan theory, monetary policy can have real effects since voters know politicians' preferences but election outcomes are uncertain and thus entail a post-election surprise. If one defines a regime as a set of institutional rules and arrangements governing the money supply, the theory purports to explain the inter-election behavior of the money supply within monetary regimes.

The partisan theory represents an advance over the Keynesian tradition and the current generation of institutionally naive game theory models but it has two shortcomings: First, surprises hinge on particular institutional arrangements – namely, periodic elections and competing parties whose macroeconomic goals differ. Without these institutional arrangements, the partisan theory has little predictive power. Second, there is simply little support for the premise that elections always constitute monetary surprises because left of center parties always prefer low unemployment and conservative parties always prefer low inflation. In reality, in the United States monetary expansions take place whenever sufficient flak arises from an Administration's redistributive program, not in any fixed proximity to an election. These expansions appear to occur as frequently under conservative Administrations (e.g., Nixon 1971–72, Reagan 1984–86) as under left of center ones. Monetary moderations do not occur only in post-election years when conservatives come into power. They occur in the inflationary wake of monetary expansions whenever the party in power, right of center (e.g., Nixon 1974, Reagan 1987–88) or left of center (e.g., Carter 1979–80), is willing to accept the risk of recession. To better understand the political economy of monetary policy, partisan theory researchers should investigate public choice perspectives on the subject.[6]

[6] In short, there is a need for much more research on the linkage between macroeconomic conditions (as measured by inflation, unemployment, interest, exchange and tax rates), ensuing voter and interest group disapproval of politicians in the executive and legislative branches and politician's subsequent attempts to influence monetary policy. There is also a need for more research on the role of the partisan affiliations of voters, interest groups, politicians and central bankers in retarding or stimulating this process. Fiscal (redistributive) programs and other

3. A public choice approach to the political economy of monetary policy

The public choice approach to monetary policy has two basic variations. One variation focuses on the central bank's bureaucratic self-interest (Toma, 1982). The other focuses on redistributive considerations. Again, two areas of research exist under the latter rubric. One area concerns generating government revenue (seignorage) or central bank revenue (Shugart and Tollison, 1983) from inflation. There is little empirical evidence that seignorage is an important revenue source in developed countries and there is virtually no evidence in support of central bank revenue-seeking through inflation.

In contrast, there is considerable statistical evidence, discussed in a later section, that rent-seeking by interest groups places strong pressures on monetary policymaking, either directly or indirectly through politicians. As a result, monetary policy periodically redistributes income among sectors. This paper addresses that variant of the public choice approach. It is motivated by three fundamental observations. First, promises to redistribute income not only dominate formal election campaigns but are politicians' bread and butter in nearly all economies at virtually all times. Second, there is a link between the adverse effects of redistributive policies and subsequent pressures on monetary policy. Third, money growth does not converge on a time-consistent path but rather is highly erratic because it periodically responds to these pressures.

In short, erratic money growth is the result of monetary policy surprises which are intended to compensate for the sectoral burdens – and hence the adverse electoral consequences – that redistributive fiscal policy and other shocks impose through effects on interest rates, exchange rates, effective tax rates, and/or output.

Promises to redistribute income have marked the advent of every U.S. Presidential Administration during the past thirty-four years and monetary surprises have been enacted between elections, when delivering on these promises and other shocks have had adverse electoral impacts on interest rates, exchange rates, effective tax rates, and/or output. The particulars of each promised redistribution – the groups favored, the variables and sectors subsequently impacted, and the subsequent related monetary surprises – depend both on the distribution of political power within the distribution of earned income and on existing financial regulatory and tax structures. They also depend on the partisan affiliations among voters, interest groups, politicians in both branches of government and central bankers (see n. 6).

---

shocks affect macroeconomic conditions which impact on interest groups and voters and often generate flak for politicians. Partisanship may dampen or accelerate the transmission of flak as well as politicians' responses to it. Attempting to influence monetary policy is one of those responses.

Moreover, these (income and political power) distributions, (regulatory and tax) structures and (partisan) affiliations change over time. Marginal changes in them may have notable effects. Therefore, promised redistributions, the sectors and variables subsequently burdened by them, and the subsequent related monetary surprises change over time. Nevertheless, in every Presidential Administration in the United States across the past third of a century redistributive fiscal policy has produced sectoral dissonances that then induce monetary ease and, ultimately, generate inflation.

According to this perspective, monetary policy responds neither consistently nor systematically to targets for output and inflation, as within the politically-cleansed Keynesian tradition and in the simplistic partisan theory, nor does it purposely initiate inflation by consistently responding to certain types and sizes of stochastic shocks, as in the naive game theoretic models. Instead, monetary policy periodically reacts to political pressures resulting from sectoral dissonances. These dissonances often have their origins in redistributive shocks, although other types of perturbations, e.g., supply shocks, also play a role. For this reason estimated reaction functions whose coefficients shift whenever the political environment changes (including but not limited to elections) reflect monetary policy responses to anterior redistributive causes. This public choice view further contends that monetary policy will respond to contain inflation only when the cost of inflation – in terms of the rate of deterioration of aggregate wealth – exceeds the cost of interest groups' organizing to effect monetary restraint. Such responses are not unique to any political party.

This public choice approach to monetary policy, inasmuch as it pinpoints political rent-seeking as the dominant motivation for monetary surprises and inasmuch as political rent-seeking is robust across a broad spectrum of institutional arrangements, purports to explain the behavior of the money supply across a wide variety of political structures. For example, the theory is not conditional on the existence of free elections. Monetary policy actions periodically reflect pressures from rent-seeking interest groups on politicians who in turn attempt to influence the monetary authority in response to these pressures. Redistributive promises, from the bread and circuses of ancient times to Reagan's supply-side tax cuts, have consistently provoked subsequent monetary surprises – from the ancient sovereign's debasing the coinage to the Reagan Administration's outburst of money growth in 1984–1986.[7]

The public choice approach presented here is consistent with voter rationality. Voters may be forward looking, but they are imperfectly

[7] In addition, the theme that a link exists between redistributions and monetary policy makes this approach to monetary policy consonant with the voluminous literature on monetary accommodation that appeared during the 1950s, 1960s, and 1970s as well as the more recent work of Hetzel (1990), Wagner (1980, 1986) and others.

informed about future tax and financial regulatory environments and future partisan cleavages. Therefore, while politicians make redistributive fiscal promises and while other types of shocks are likely to occur, voters cannot anticipate the timing, magnitude, or location of the subsequent sectoral impacts, nor can they anticipate the timing or magnitude of the related subsequent monetary surprises. Moreover, voters cannot easily filter credible signals for surprises from the often subtle but continual barrage of political and private pressures on monetary policymakers. Informational asymmetry occurs basically because imperfect private information exists regarding policymaker's responses to these pressures (Havrilesky, 1988, 1990). This public choice perspective suggests that our monetary policy institutions exist, in part to mask the redistribution of income effected by fiscal policy. As the proclivity to redistribute grows, monetary policy institutions will become more complicated in order to generate the appropriate amount of camouflage.

3.1. The costs of current monetary policy arrangements[8]

Public choice reasoning is premised on the notion that in a democracy direct transfers to certain rent-seeking interest groups at the expense of other groups are quite often politically suicidal. Therefore, indirect transfers abound. This indirection is costly because competition between groups for politically allocated rents will use up resources. Attempts to influence monetary policy are part of that competition.

Let us examine monetary policy in this context. Politically opportunistic redistributions of after-tax income will gain political support to the extent that they can be made palatable to potential opponents. In order to reduce the flak, politicians may publicly insist that their redistributive programs serve higher public purposes such as fairness and justice or generate a macroeconomic externality such as growth or full employment. If these methods fail, the adverse consequences of redistributive programs can sometimes be masked by a sufficiently secretive monetary policy. This is important because variations in government expenditures and taxation affect interest and exchange rates; through disincentive effects they may have adverse impacts on growth and unemployment rates, particularly in interest- and exchange-rate-sensitive sectors of the economy. When interest groups affected by these adverse consequences of redistributive programs and other shocks generate sufficient flak, there will be pressure on the politicians to 'do something'. Recent empirical work (discussed in the next section) shows that pressures on monetary policy can come either directly from interest groups or indirectly through politicians in the executive and legislative branches.

[8] The material in this section is derived from my book (Havrilesky, 1993).

Rational expectations reasoning indicates that stimulatory monetary policy can have no permanent effects on employment, output and real interest rates and that only unanticipated bouts of inflation induced by monetary policy surprises can have transitory effects on these variables (see footnote 1). In order to exploit latent transitory effects, changes in monetary policy must be obscured from private market participants lest they be able to anticipate policy moves and nullify these effects. As a consequence, private market participants must invest valuable resources in attempting to uncover and predict monetary policy actions and central bankers must invest valuable resources in impeding these efforts. The result for society is a considerable waste of resources.

The complication and uncertainty surrounding monetary policy have given rise in the United States to a Fed-watching industry. This industry is financed by a sizable number of financial services firms. It provides employment to a host of former Federal Reserve staffers. Under present monetary policy arrangements private decisions are fraught with inflation and price level uncertainty. The value added by the Fed-watching industry could conceivably be measured in terms of any palpable reduction of these types of uncertainty. Unfortunately, in recent decades the fiscal, monetary and regulatory environment has been hard on Fed-watchers and the level of uncertainty actually seems to have increased. For example, since the mid 1960s the variance of inflation and the concomitant interest rate risk premium appear roughly to have doubled. Therefore, price level forecasts have, perforce, become more inaccurate. Thus, in this regard the Fed-watching industry does not rank very high on the value added honor roll. The fact that the industry has grown in the face of such performance suggests that it serves an other function, namely in the monetary rent-seeking arena. We shall return to this aspect of the industry shortly.

Monetary policy actions are further difficult to predict to the extent that policy objectives are unclear and contradictory. This may be measured by the degree of the monetary authority's precommitment to a completely open ex ante policy strategy. With little precommitment there is ostensibly little informational value in formal central bank reports and directives. For example, in the United States, the FOMC's semiannual report to Congress identifies policy objectives and provides targets for money and credit growth. However, as discussed below, these specifications only indicate wide ranges for such growth and do not convey ex ante information about specific Federal Reserve responses should actual growth deviate from these ranges. The semiannual reports also present consensual FOMC expectations regarding the economic outlook. Unfortunately, they say nothing about prospective policy actions should this outlook be in error or should certain types of shocks occur.

The effects of monetary policy actions are further difficult to predict if these actions are not disclosed. In a undisguised attempt to circumvent disclosure under the Freedom of Information Act, in 1976 Federal Reserve Chairman Arthur Burns announced that the FOMC had stopped keeping formal minutes of its deliberations. (In November 1993 Federal Reserve Chairman Alan Greenspan revealed that secret tapes and transcripts of FOMC meetings, nevertheless, had been kept for the prior 17 years.) As if this coverup were not enough the FOMC policy directives which emanate from these deliberations are only released after a considerable delay. In addition, they are not couched in terms of conditions in various, interest rate-, exchange rate- and unemployment rate-sensitive, sectors of the economy. Nor is there anything in the directives which suggests how the Fed is currently responding or will respond to various supply or demand shocks in the future, especially as they might impact on these sectors. Nor are there indications of when and how the overarching goal of low inflation would be attained (see footnote 14).

Added to the costs of camouflaging monetary policy and the costs of Fed-watching are the costs to private interest groups of trying to influence politicians and monetary policymakers to manipulate interest, exchange and unemployment rates. These costs include the costs of all lobbying activities which focus directly and indirectly on monetary policy's manipulation of the real economy. They also include the costs of politicians in the executive and legislative branches attending to the groups who attempt to monitor and influence monetary policy. In addition, they include the costs to the legislative branch of sustaining credible threats to the bureaucratic powers of the central bank and to the executive branch of signaling its policy desires to the central bank. Finally, they include the costs of the central bank's liaison with private interest groups and politicians, including the costs of mounting counter threats by deploying resources to resist, deflect and circumvent these diverse pressures.

The latter activity should not be lightly regarded. Central banks allocate resources in ways that enable them to enlist the aid of supportive constituencies. For example, in the United States the Federal Reserve has administrative and regulatory (and therefore subsidy- and cost-allocating) power over all banks and bank holding companies: The Fed makes fairly inexpensive discount window loans to troubled banks, it adjudicates bank mergers and acquisitions, and it approves of the non banking activities of bank holding companies. In addition, all central banks have enormous power to the confer benefits by dint of their ability to manipulate interest and exchange rates, which are pivotal determinants of the profitability and solvency of financial services firms. Thereby, central banks can enlist financial services firms and financial services regulatory bureaucracies in a cordon which helps to protect them from outside pressures. Finally, all central banks have links with

economists and other specialists in the private sector and in academe. For example, in the United States the Federal Reserve not only maintains links to its Reserve Bank directors and former directors, it sustains close communication with and a certain amount of loyalty from its former officers and staff members on Wall Street and in the money centers (the Fed watching industry), it keeps firm ties to the Federal Advisory Council and it subsidizes the research of a significant and influential number of economists in academe and in the private sector. Thus, given their regulatory, administrative and monetary policy resources, central banks can directly deflect political challenges.

The magnitude of all the costs discussed earlier has not been estimated. A good part of the regulatory and administrative costs of central banks are, in the preceding context, costs of managing monetary policy. There is little understanding of the quantity of resources that are absorbed by central banks in their efforts to administer, protect and mask, and absorbed by private agents and politicians in their efforts to monitor and influence, monetary policy. These resources plus the resources lost because of suboptimal inflation performance, if gainfully redeployed, might constitute a formidable stimulus to economic growth and the national wealth.

4. Recent statistical research on the political economy of monetary policy

Until about two decades ago the case for a political economy approach to monetary policy was supported only by anecdotal observations that central banks were not strictly independent of outside pressures. Then, in the 1970s and 1980s excellent institutional studies of the Federal Reserve as a bureaucracy by political scientists (Atchison and Chant, 1972; Woolley, 1984; Kettl, 1986), and economists (Weintraub, 1978; Pierce, 1978; Kane, 1980), advanced the feasibility of an empirical research agenda. Also, in the 1970s reaction function studies indicated that central bank responses were sensitive to changes in government (Havrilesky et al., 1975; Potts and Luckett, 1978). Because of this groundbreaking work, by the late 1980s researchers were able to estimate the linkages between the behavior of central bankers and outside influences. This research has buttressed the case for a more complete political economy approach to monetary policy.

4.1. Political pressures[9]

The executive branch of government systematically signals its policy desires to central bank officials and they, in turn, may respond. For the

[9] The material in this section is a revised and expanded version on an earlier commentary, Havrilesky (1992). Except where other references are included, the statistical results and data sets are reported in Havrilesky (1993).

United States executive branch pressure can be measured by an index of Signaling from the Administration to the Federal Reserve (SAFER). The SAFER index is based on articles in *Wall Street Journal* in which a member of the Administration indicates a desire for easier or tighter monetary policy. It is premised on the notion that the financial press efficiently captures communication that is going on between the executive branch and Federal Reserve officials. If an article indicates that a member of the Administration has called for monetary ease, it is assigned a value of plus one; if it indicates a call for monetary tightness, it is assigned a value of minus one. Changes in the SAFER index result in changes in the Federal funds rates after about three weeks. The three-week lag is supported by ordinary least squares regression, unconstrained distributed lag and Almon lag analysis (Havrilesky, 1993). Causality from the SAFER index to the Fed funds rate and not vice versa is supported by a battery of Granger tests.

The SAFER index has been tabulated for the period from 1952 to 1991. The relationship between signaling as a cause and monetary policy as an effect holds across the entire period from 1964 to 1991. Prior to 1961, Administration signaling was rare; after 1969 it was commonplace. This suggests that in the United States the 1960s were a watershed in the history of politically-induced monetary policy activism. Moreover, across the entire 1964–1991 time span there were sub-periods when monetary policy was responsive to executive branch signaling and there were sub-periods when it was not. The sub-periods when the Federal Reserve was reactive to these pressures in a statistically significant manner include at least the following: when Arthur Burns was Federal Reserve Chairman and Richard Nixon was President (early 1970 to mid 1974), when Paul Volcker was Chairman and Jimmy Carter was President (1979–1980), and when Mr. Volcker was Chairman during the first Reagan term (1981–1984).[10]

What did these three intervals have in common? One conjecture is that they were not only periods of strong executive branch signaling, they were also times of intense Congressional challenge to the budgetary authority, regulatory domain, and monetary policy autonomy of the Federal Reserve System. To test this view, 210 bills were found which were brought before Congress from 1965 to 1990 that promised either to threaten or to enhance the system's bureaucratic privileges. From this data base a simple ratio of net threats to Federal Reserve powers (bills which threatened Fed powers minus bills which enhanced them divided by the total of all such bills) was developed and weekly values of that ratio plus unity (*THREAT*) were multiplied by the executive branch signaling for the week. The resulting

[10] An extensive battery of reaction function estimates which include state-of-the-economy forecasts as well as the SAFER index as explanatory variables suggests that the Federal Reserve was responsive to these pressures for an even larger set of subperiods, including the Chairmanships of William McChesney Martin and Alan Greenspan (Froyen et al., 1993).

variable, threat-augmented signaling, (*THREAT* × *SAFER*) superseded unaugmented signaling (*SAFER*) as being causal on monetary policy during the three sub-periods identified earlier.[11] This finding provides the first evidence not only of the effect of the legislative branch's clout in the monetary policy process but also of the effect of the confluence of that clout with executive branch pressures. It provides the somewhat paradoxical result that, in the face of Congressional threats to their powers, central bank leaders yield to an Administration's desires in order to garner its protection from those threats. Thus, in order to protect their independence in the long run, central bankers may have to sacrifice it in the short run.

In ordinary least squares regressions the signaling index (*SAFER*), as a dependent variable, responds to a vector of state-of-the-economy measures, as explanatory variables, as well as to the partisan composition of the Federal Reserve Board. This relationship also holds for the entire 1964–1991 period. Because the power of appointment to the Board is an alternative means for an Administration to influence monetary policy, the greater the proportion of Governors of the same party as the Administration, the smaller (the absolute value of) the level of signaling. An Administration that already has friendly Governors on the Board apparently doesn't find it as necessary to press publicly for changes in policy.

Congressional threats (*THREAT*) to Federal Reserve powers, as a dependent variable, are also responsive to the measures of the state of the economy, as explanatory variables. Therefore, the overall picture is that as the state of the economy (as measured by unemployment, inflation and real interest rates) worsens, both Administration signaling and Congressional threats increase. As the threat-augmented signaling measure (*SAFER* × *THREAT*) increases, the monetary authority becomes concerned and short term interest rates respond. Thus, this research program not only provides statistical evidence of a direct link between the state of the economy (as a cause) and political pressures (as a proximate effect) and changes in monetary policy (as an ultimate effect), it also delineates the roles played by both branches of government in the process.

The influence of Congress on monetary policy does not end here. Until recently, evidence of direct legislative branch influence on monetary policy has been scarce. The conventional wisdom has been that members of Congress, because of their narrow constituencies, lack the incentive to monitor and influence monetary policy (Weintraub, 1978; Pierce, 1978; Woolley, 1984). Recent research (Havrilesky, 1993), modifies the conventional wisdom. It uses the Congressional oversight hearings on the conduct of monetary policy, which are held twice a year, as a data source.

---

[11] In contrast, Froyen et. al. (1993) find that threat-augmented signaling does not outperform pure signaling in reaction function estimation.

In these proceedings the numbers of times that Senators mention certain state-of-the-economy concerns, as explanatory variables, are found to have statistically significant effects in ordinary least squares regressions on the Federal funds rate in the month after the hearing. Similarly measured concerns of members of the House of Representatives do not have statistically significant effects on the funds rate. These findings suggest that Fed officials do not respond to Representatives' concerns, but are sensitive to Senators' concerns regarding the state of the economy. The apparent reasons for this distinction are that Senators must confirm all Board appointments while House members have no such power and that Senators serve longer terms and have larger constituencies. These results are generally consistent with the work of Weingast (1984) and Grier (1991) which indicates that Congressional inactivity (an absence of threats or other overt monitoring behaviors) does not imply a lack of Congressional influence. Viewed as a whole, they suggest that Congress can have an impact on monetary policy without engaging in costly threatening and monitoring activities.

4.2. Private sector pressures

Among the private interests strongly affected by monetary policy, perhaps the most directly and persistently affected is the financial services sector. Private bankers bear the initial impact of open market policy, and central bankers around the world have long been concerned with private bankers' adjustment to and opinion of monetary policy actions. Therefore, within the financial services sector the banking industry is probably the most affected by monetary policy.

However, the relationship between central bankers and the banking industry is not one-sided. In the United States, in order to protect its regulatory and budgetary powers, the Federal Reserve frequently relies on the political support of the banking industry. Banking's traditional concern with regulatory and monetary policy and the Federal Reserve's desire to sustain the industry's political support help to account for the presence of formal communication structures within the Federal Reserve System. The most important systematic and measurable communications between the banking industry and the Federal Reserve System emanate from the Federal Reserve Advisory Council. The Council consists of twelve private bankers, each of whom is elected for a one-year term by the directors of each of the Federal Reserve banks. The Council meets with the FOMC four times a year and, among other things, advises it on the desired direction for monetary policy.

Even though banking's influence on monetary policy may primarily occur through direct communication with the legislative and executive branches

and with the Fed leadership (other than through the Federal Advisory Council), evidence of such signaling is difficult to uncover. This leaves the directives of the Federal Advisory Council as the best measure of the banking sector's monetary policy preferences. In ordinary least squares regressions monetary policy, as measured by the Federal funds rate, is statistically significantly responsive to signals from the banking industry, as reflected in the directives issued every three months by the Federal Advisory Council, Havrilesky (1990).[12] Furthermore, the directives are shown to be Granger-causal on monetary policy, so measured. The existence of influence would not necessarily support the view that Council directives are the banking industry's means of signaling the Fed. These directives may simply be a proxy for signaling from the banking industry that is occurring by other means.

4.3. The power of appointment

It is not surprising that Administration leaders would want to determine the composition of the Federal Open Market Committee (FOMC), the arm of the Federal Reserve System that sets monetary policy. As a means of influencing monetary policy, this would be less costly than the overt signaling discussed above. The Committee includes the seven Governors of the Federal Reserve Board and five of the Presidents of the twelve Federal Reserve Banks. How would politicians know that a prospective FOMC member would behave a certain way? This might entail a two-step process. First, certain career and training characteristics might be highly correlated with members' proclivity toward ease or tightness in their FOMC voting (Gildea, 1990). Second, certain characteristics might be correlated with members' dependability in expressing that proclivity.

Recent research, Havrilesky and Gildea (1992), addresses the problems stemming from an Administration's influencing the selection of FOMC members. Data show that there are indeed subgroups of FOMC members who possess ease and tightness proclivities in their FOMC voting behavior, and that these tendencies are correlated with particular career and background characteristics. For example, the data suggest the Federal Reserve Bank Presidents, as a group, have historically favored tighter monetary policy than Governors as a group. The tendency to favor monetary tightness is also correlated with an FOMC member's experience at a Reserve Bank. This finding together with a wealth of studies on inflation performance, e.g., Cukierman (1992) and Havrilesky and Granato (1993), indicate that political

[12] Froyen et al. (1993) find these directives to have a significant impact on monetary policy in reaction function estimates.

influences on central bank monetary policy, reductions in central bank autonomy, increase a nation's steady state inflation rate.

The data also show that Governors and Fed Bank Presidents who are economists are more reliably partisan in their FOMC voting than are non-economists. This suggests that economists are not swayed by interest groups or by politicians to whom they are ideologically opposed. Economists' knowledge of macroeconomic theory and policy apparently makes them eminently dependable partisans.

Subsequent research has added new dimensions to these findings. In a series of papers Chappell, Havrilesky and McGregor, hereafter CHM, have further refined knowledge regarding political influences on monetary policy. By estimating reaction functions for individual FOMC members using dissent voting data from FOMC meetings in ordered probit regressions, CHM (1993a) find that while controlling for the state of the economy, Democratic appointees to the FOMC favor lower interest rates than traditional Republican ones but that Supply Side Republicans favor even lower rates than Democrats. They also show that FOMC members follow the monetary policy preferences of the appointing, but not the presiding, President. Furthermore, they report that the SAFER index, discussed earlier, has a statistically significant impact on the voting behavior of individual members. In a subsequent paper, CHM (1993b), the authors are able to use similar methods to rank FOMC members by the intercepts of their individual reaction functions. These rankings support the earlier findings that, while controlling for the state of the economy, Bank Presidents as a group favor tighter monetary policy than Governors as a group and that Supply Side Republican members are, as a group, more tightness-oriented than Democratic or non Supply Side Republican members. In a third paper, CHM (1993c), data from the minutes of FOMC meetings on the 'leanings' of non-dissenting members are employed to supplement FOMC dissent voting data and improve the precision of previous estimates.

5. Optimal reform of central bank structure

The preceding survey suggests that, in order to reduce the social costs of monetary policy, especially to improve inflation performance, monetary reformers would be well advised to attack the linkage between money and politics.[13] In the absence of a collective inflationary crisis, a radical

[13] Reforms which would strengthen rather than weaken the grip of the executive branch on monetary policy are predicated on the notion that elected officials should get the monetary policy they want because the electoral benefits and costs of that policy will be visited upon them. This view overlooks many of the rent-seeking costs, adduced above, and the fact that not all of these costs, most importantly the cost of inflation, are borne by the Administration which generates them.

reconstruction of monetary policy institutions, for example along the lines of a money supply growth rule or a Hayekian purely competitive money supply scheme, would not be politically practicable. The principle actors in the monetary policy process would be unlikely to surrender the considerable private benefits that they enjoy from the current institutional set up. As discussed earlier, a protective cordon surrounds contemporary monetary policy arrangements.

While radical reform is usually impracticable, incremental adjustments in the structure of a central bank might improve a nation's inflation performance. Consider two dimensions of central bank's structure, its autonomy and its secrecy. Central bank autonomy could be measured by the proportion of nonpolitically appointed members on the central bank board and by the length of the Chairman's and members' terms. Central bank secrecy could be measured by the degree of an absence of precommitment to a complete ex ante strategy. A fairly complete precommitment would involve the central bank regularly presenting its economic forecasts and its monetary targets along with prospective policy actions should the forecast be in error, should targets be missed or should certain types of shocks occur. The degree of precommitment (and internal cost of utility to central bankers as bureaucrats) and be viewed as ranging from zero at one extreme, where there is no price stability objective, no disclosure of policy sections, no disclosure of ex ante strategy, no public discussion of the record, and no sanctions for poor performance, to one at the other extreme, where there is price stability, objective, complete disclosure of policy actions and ex ante responses for foreseeable contingencies, regular public accountability and penalties for poor inflation performance.[14]

Marginal reforms of the degree of central bank autonomy and central bank secrecy would have to be examined for their acceptability to the players in the monetary policy arena. As an example, reductions in central bank secrecy would clearly reduce steady state inflation. However, unless they are accompanied by offsetting compensation for the central bankers and politicians, they are unlikely to win their endorsement. Central bankers, as bureaucratic agents, and politicians, as their political principals bent on influencing policy, would have to be presented with offsetting benefits before

[14] The monetary authority has a well-known time inconsistency incentive to violate its precommitments, say be responding to shocks that were initially unspecified or unforeseen. (As indicated earlier in this paper outside pressure could exacerbate such responses.) In order to prevent such responses from overpowering a price stability objective, the legislature could enact an automatic 'tax' on the central bank's budget for poor inflation performance (Havrilesky, 1972). If the penalty were averaged over a sufficiently long time period, the central bank would have latitude periodically to relax temporarily its anti-inflationary militancy in the face of major shocks but could, nevertheless, maintain a credible commitment to price stability over a longer period.

they would embrace any given reduction in central bank secrecy. As another example, increases in central bank autonomy would also obviously improve inflation performance. However, while any increase would be supported by bureaucratic central bankers, unless it too were accompanied by the promise of offsetting benefits for politicians, it would not win their support.

The recent advances in understanding the monetary policy process discussed above may help to illuminate the path to practicable monetary reform. If this is the case, a primary task of monetary reformers would be to investigate combinations of marginal adjustments in institutional arrangements that would be acceptable to the principle actors at the same time that they weaken political influences and thereby improve inflation performance. Such optimal reforms would improve steady state inflation performance while at the same time, not reducing the utility of any of the principle players in the policy arena. A marginal sacrifice of benefits by a group of principals in one structural dimension could be compensated for by an offsetting marginal increase in benefits in another.

Consider the following example: Assume a world consisting of central bankers, politicians, the non-bank public and a monetary reformer, where members in each group have identical preferences. The monetary reformer's sole task is to advance the interests of the non-bank public by improving inflation performance without harming central bankers or politicians. There is a strong negative correlation between a nation's central bank autonomy and its inflation performance (Cukierman, 1992; Havrilesky and Granato, 1993). In addition, rational expectations reasoning indicates that increases in secrecy raise steady state inflation. Therefore, it shall be assumed that steady state inflation decreases at a decreasing rate as central bank autonomy increases and increases at a decreasing rate as central bank secrecy increases, that is, iso-inflation contours are convex in central bank autonomy/central bank secrecy space.

Consistent with bureaucratic models of monetary policy arrangements, further assume that central bankers extract positive but decreasing marginal bureaucratic benefits from increases in their autonomy and from increases in their secrecy. Their preferences are convex in autonomy/secrecy space. Further assume that politicians enjoy positive but decreasing marginal bashing benefits and negative but increasing marginal policy influence benefits from increases in central bank autonomy and positive but decreasing marginal bashing and policy influence benefits from increases in central bank secrecy. Their preference sets are convex in secrecy/autonomy space at low levels of autonomy but become concave at higher levels.[15] Starting with the

[15] As central bank autonomy reaches high levels, ceteris paribus, politicians' preference sets will no longer be convex because the benefits from bashing are outweighed by the disbenefits from being less able to influence monetary policy.

current, suboptimal, combination of autonomy and secrecy,[16] with regard to central bankers and politicians the feasible reform set would consist of all combinations of central bank secrecy and central bank autonomy which leave each group at least no worse off in terms of total benefits. If the non-bank public's benefits vary (inversely) with the rate of inflation, the monetary reformer would simply choose from the two feasible sets the combination of autonomy and secrecy which most reduces the steady state rate of inflation, that is, where the intersection of the feasible sets is tangent to the best iso-inflation contour. As politicians' preferences become concave when central bank autonomy reaches high levels (see footnote 15), the optimal reform might involve combining increases in autonomy with *increases* in secrecy, so as to leave politicians no worse off while reducing steady state inflation.[17]

The preceding example suggests that the recent literature on monetary policy might be useful in developing programs for optimal restructuring of national central banks. In Europe the Delors Report (1989) and the Maastricht Agreement have already initiated this process by requiring that all central banks be restructured along more autonomous lines. Because these instructions do not specify in detail exactly how this is to be accomplished, the preceding analytical framework should be quite useful in advancing the process. In nations where the monetary institutional status quo is more firmly entrenched, the reform process would be more vexing than in nations with Maastricht-endorsed institutional flexibility. Nevertheless, because it is painless for the principle actors at the same time that it improves inflation performance, the possibility of optimal central bank restructuring, as outlined above, should be of interest throughout the world.

The Delors Report also proposes a European Central Bank (ECB) that has a structure which features nearly maximum autonomy and maximum secrecy. While such a combination would be blissful for central bankers (it was initially proposed by central bankers), in a politically integrated Europe, it is unlikely that politicians and other interest groups would continue to endorse it. Maximum central bank secrecy could be suboptimal in terms of inflation performance and maximum central bank autonomy would be suboptimal in terms of the well being of politicians. The early history of the Federal Reserve shows that challenges to the hegemony of central bankers by politicians, public interest reformers, and interest groups can result in internecine struggles which paralyze monetary policy. This costly prospect

[16] For most nations the current combination of central bank secrecy and central bank autonomy have been rendered suboptimal by the recent advances in the areas of monetary policy research discussed earlier.

[17] Further improvement in inflation performance would occur if the size of the central bank's operating budget were, automatically tied inversely to the inflation rate, as originally suggested in (Havrilesky, 1972). This inflation penalty can also be used as a means of enforcing the central bank's precommitment, that is, reducing secrecy (see n. 14).

can be avoided by restructuring the proposed ECB. The preceding model can be employed to identify combinations of central bank secrecy and central bank autonomy which, when compared to the proposed ECB structure, improve inflation performance and leave politicians better off while requiring some sacrifice by central bankers.[18]

[18] There are a large number of critical analyses of the Delors Report. Most of these focus on the path to the proposed ECB rather than its ultimate proposed structure. An excellent example with a useful bibliography is Fratianni and von Hagen (1992). For a detailed model of optimal European Central Bank restructuring see Havrilesky (1993b).

References

Acheson, Keith and John F. Chant, 1973, Bureaucratic theory and the choice of central bank goals, Journal of Money, Credit and Banking 5, 637–655.

Alesina, Alberto and Jeffrey Sachs, 1988, Political parties and the business cycle in the United States, 1948–1984, Journal of Money, Credit and Banking 10, 63–82.

Alt, James, 1991, Leaning into the wind or ducking out of the storm? U.S. monetary policy in the 1980s, in A. Alesina and G. Carliner, eds., Politics and economics in the 1980s (University of Chicago Press, Chicago, IL).

Balke, Nathan S., 1991, Partisanship theory, macroeconomic outcomes, and endogenous elections, Southern Economic Journal 57, 920–935.

Beck, Nathaniel, 1987, Elections and the Fed: Is there a political monetary cycle? American Journal of Political Science 31, no.1, 194–216.

Beck, Nathaniel, 1990, Congress and the Fed: Why the dog does not bark at night, in: Thomas Mayer, ed., The political economy of American monetary policy (Cambridge University Press, New York).

Chappell, Henry, 1986, Party differences in macroeconomic policies and outcomes, American Economic Review 76, 71–74.

Chappell, Henry and William R. Keech, 1985a, The political viability of rule-based monetary policy, Public Choice 46, no. 2, 125–140.

Chappell, Henry and William R., Keech, 1985b, A new view of political accountability for economic performance, American Political Science Review 79, 10–27.

Chappell, Henry, Thomas Havrilesky and Rob McGregor, 1993a, Partisan monetary policies: Presidential impact through the power of appointment, Quarterly Journal of Economics.

Chappell, Henry, Thomas Havrilesky and Rob McGregor, 1993b, Monetary policy reactions for individual FOMC members, Working paper.

Chappell, Henry, Thomas Havrilesky and Rob McGregor, 1993c, Monetary policy preferences of individual FOMC members: Evidence from the memoranda of discussion, Working paper.

Cukierman, Alex, 1992, Central bank strategy, credibility and independence: Theory and evidence (MIT Press, Cambridge, MA).

Delors Report, 1989, Committee for the study of economic and monetary union, Report on economic and monetary union in the European Community (Office for Official Publications of the EC, Luxembourg).

Dewald, William G. and Harry G. Johnson, 1963, An objective analysis of the objectives of American monetary policy, 1952–61, in: Deane Carson, ed., Banking and monetary studies (Irwin, Homewood, IL) 171–189.

Ellis, Christopher, 1989, An equilibrium politico-economic model, Economic Inquiry 27, 521–528.

Ellis, Christopher and Mark Thoma, 1991, Partisan effects in economies with variable electoral terms, Journal of Money, Credit, and Banking 23, 728–741.

Fair, Ray, 1978, The effect of economic events on votes for the president, Review of Economics and Statistics 60, 159–173.

Fratiani, Michele and Jürgen von Hagen, 1992, The European monetary system and European monetary union (Westview Press, Boulder, CO).

Friedman, M., 1982, Monetary policy: Theory and practice, Journal of Money, Credit and Banking 14, 98–118.

Froyen, Richard, Thomas Havrilesky and Roger Waud, 1993, Political and special interest pressures on U.S. monetary policy, Working paper.

Gärtner, Manfred, 1994, Democracy, elections and macroeconomic policy: Two decades of progress, European Journal of Political Economy, this issue.

Gildea, John, 1990, FOMC dissent voting, in: Thomas Mayer, ed., The political economy of American monetary policy (Cambridge University Press, New York) 211–222.

Grier, Kevin, 1987, Presidential elections and Federal Reserve policy: An empirical test, Southern Economic Journal 54, 475–486.

Grier, Kevin, 1989, On the existence of a political monetary cycle, American Journal of Political Science 33, 376–389.

Grier, Kevin, 1991, Congressional influence on U.S. monetary policy: An empirical test, Journal of Monetary Economics 28, no.2, 201–220.

Grier, Kevin, 1993, The political business cycle in the United States, Working paper.

Havrilesky, Thomas, 1967, A test of monetary policy action, Journal of Political Economy 75, 299–304.

Havrilesky, Thomas, 1972a, A new program for more monetary stability, Journal of Political Economy 80, 171–175.

Havrilesky, Thomas, 1972b, Finding the optimal monetary strategy with information constraints, Journal of Finance.

Havrilesky, Thomas, 1977, The optimal monetary policy instrument, Southern Economic Journal 43, 1288–1297.

Havrilesky, Thomas, 1987, A partisanship theory of monetary and fiscal policy regimes, Journal of Money, Credit and Banking 19, 308–325.

Havrilesky, Thomas, 1988, Monetary policy signaling from the adminstration to the Federal Reserve, Journal of Money, Credit and Banking 20, 83–101.

Havrilesky, Thomas, 1990, The influence of the Federal Advisory Council on Monetary Policy, Journal of Money, Credit and Banking 22, 37–50.

Havrilesky, Thomas, 1992, Tracking the influences of politicians on monetary policy, American Banker.

Havrilesky, Thomas, 1993a, The pressures on American monetary policy (Kluwer Academic Publishers, Norwell, MA).

Havrilesky, Thomas, 1993b, A model of optimal European central bank restructuring, Working paper.

Havrilesky, Thomas and John Gildea, 1992, Reliable and unreliable partisan appointees to the Board of Governors, Public Choice 73, 397–417.

Havrilesky, Thomas and James Granato, 1993, Determinants of inflationary performance: Central bank autonomy vs. corporatist structures, Public Choice, May.

Havrilesky, Thomas and Robert Schweitzer, 1990, A theory of FOMC dissent voting with evidence from the time series, in: Thomas Mayer, ed., The political economy of American monetary policy, (Cambridge University Press, New York) 192–210.

Havrilesky, Thomas, Robert Sapp and Robert Schweitzer, 1975, Tests of the Federal Reserves reaction to the state of the economy, 1964–1974, Social Science Quarterly 55, 835–852.

Haynes, S. and J. Stone, 1988, Does the political business cycle dominate United States unemployment and inflation? Some new evidence, in: T. Willett, ed., Political business cycles: The political economy of money, inflation and unemployment, 276–293 (Duke University Press, Durham, NC).

Haynes, S. and J. Stone, 1989, An integrated test for electoral cycles in the U.S. economy, Review of Economics and Statistics 71, 426–434.

Hetzel, Robert L., 1990, The political economy of monetary policy, in: Thomas Mayer, ed., The political economy of American monetary policy (Cambridge University Press, New York) 99–114.

Hibbs, Douglas A., 1977, Political parties and macroeconomic policy, American Political Science Review 71, 1467–1487.

Hibbs, Douglas A., 1987, The American political economy: Macroeconomics and electoral politics in the United States (Harvard University Press, Cambridge, MA).

Hibbs, Douglas A., 1992, Partisan theory after fifteen years, European Journal of Political Economy 8, 361–373.

Kane, Edward J., 1980, Politics and Fed policy-making: The more things change, the more they remain the same, Journal of Monetary Economics, 6, 199–212.

Kane, Edward J., 1993, Bureaucratic self interest as an obstacle to monetary reform, in: Thomas Mayer, ed., The political economy of American monetary policy (Cambridge University Press, New York).

Kettl, Donald, 1986, Leadership at the Fed (Yale University Press, New Haven, CT).

Khoury, Salwa, 1993, The Federal Reserve reaction function: A specification search, in: Thomas Mayer, ed., The political economy of American monetary policy (Cambridge University Press, New York).

Nordhaus, W., 1975, The political business cycle, Review of Economic Studies 42, 169–190.

Pierce, James, 1979, The myth of congressional supervision of monetary policy, Journal of Monetary Economics 4, 363–370.

Potts, Glenn T. and Dudley G. Luckett, 1978, Policy objectives of the Federal Reserve System, Quarterly Journal of Economics 92, 525–534.

Reuber, G.L., 1964, The objectives of Canadian monetary policy, 1949–1961: Empirical trade-offs and the reaction function of the authorities, Journal of Political Economy 72, 109–132.

Schneider, Fredrich and Bruno S. Frey, 1988, Politico-economic models of macroeconomic policy: A review of the empirical evidence, in: Thomas D. Willett, ed., Political business cycles (Duke University Press, Durham, NC).

Shughart, William F. and Robert D. Tollison, 1983, Preliminary evidence on the use of inputs by the Federal Reserve System, American Economic Review 73, 291–304.

Shughart, William F. and Robert D. Tollison, 1986, Institutional evolution of Federal Reserve hegemony, Cato Journal 5.

Toma, Mark, 1982, Inflationary bias of the Federal Reserve System: A bureaucratic perspective, Journal of Monetary Economics 10, 163–190.

Wagner, Richard E., 1986, Central banking and the Fed: A public choice perspective, Cato Journal 6, no. 2, 519–538.

Wagner, Richard E., 1980, Public choice, monetary control and economic disruption, in: P. Whiteley, ed., Models of politicaleconomy (Sage, New York) 201–220.

Weingast, Barry, 1984, The Congressional bureaucratic system: A principal–agent perspective, Public Choice 44, 147–191.

Weintraub, Robert R., 1978, Congressional supervision of monetary policy, Journal of Monetary Economics 14, 341–362.

Wood, John H., 1967, A model of Federal Reserve behavior, in: George Horwich, ed., Monetary process and policy: A symposium (Irwin, Homewood, IL) 135–166.

Woolley, John T., 1984, Monetary politics: The Federal Reserve and the politics of monetary policy (Cambridge University Press, New York).

NAM National Association of Manufacturers

MANUFACTURING MAKES AMERICA STRONG

TESTIMONY OF

JERRY J. JASINOWSKI
PRESIDENT
NATIONAL ASSOCIATION OF MANUFACTURERS

BEFORE THE
JOINT ECONOMIC COMMITTEE
ON HUMPHREY-HAWKINS AND THE FEDERAL RESERVE

MARCH 16, 1995

1331 Pennsylvania Avenue, NW, Suite 1500 - North Tower, Washington, DC 20004-1790
(202) 637-3000 • Fax (202) 637-3182

89-805 O - 96 - 7

Manufacturing: The Key to Economic Growth

- ✓ U.S. manufacturing's direct share of the Gross Domestic Product (GDP) has averaged more than 21 percent since World War II. And nearly half of economic activity depends indirectly on manufacturing.

- ✓ U.S. manufacturing productivity growth averaged 3 percent during the 1980s compared with almost zero growth in the rest of the U.S. economy.

- ✓ U.S. manufacturing exports have been the *single main source of strength* in the current economy — contributing 30 percent to 40 percent of the nation's economic growth since 1987.

- ✓ Each $1 billion of exports creates 20,000 new jobs. Since 1985, exports have saved 4 million jobs in U.S. communities.

- ✓ Manufacturing jobs on average pay 15 percent more than jobs elsewhere in the economy.

- ✓ Manufacturing provides the bulk of technological advances and innovation for the economy.

The National Association of Manufacturers (NAM) is the nation's oldest and largest broad-based industrial trade association. Its more than 13,000 member companies and subsidiaries, including 9,000 small manufacturers, are located in every state and produce approximately 85 percent of U.S. manufactured goods. Through its member companies and affiliated associations, the NAM represents every industrial sector, 185,000 businesses and more than 18 million employees.

The NAM's mission is to enhance the competitiveness of manufacturers by shaping a legislative and regulatory environment conducive to U.S. economic growth in a global economy, and to increase understanding among policymakers, the media and the general public about the importance of manufacturing to America's economic strength and standard of living.

Founded one hundred years ago in Cincinnati, the NAM is proud to celebrate its centennial in 1995.

The NAM is headquartered in Washington, D.C., and has regional offices across the nation.

-NAM-

Inflation Only or Multiple Targets? As a general principle, the NAM has always argued in favor of low and stable rates of inflation. Nevertheless, we are skeptical of the view that the Fed should only consider inflation in setting its monetary targets. Inflation is just one component of nominal GDP. The other component is of course real output. This point, while straightforward, is worth emphasizing. For any rate of monetary growth, there is an implied growth rate of nominal GDP, and hence of real GDP. It makes more sense for the Fed to consider both the inflationary component and the real component.

Some of the arguments for targeting inflation only assume that real growth automatically converges back on trend after an initial period of disinflation. The trend, however, is determined by technological advance. The causes of technological advance, such as investment in computers and R&D, are not independent of the cycle. It would therefore be possible for the Federal Reserve to depress the growth rate over long periods of time if it keeps monetary policy too tight.

Structural Changes and Inflation The emphasis in focusing on inflation alone is a bit surprising, since in the last few years inflation has been modest while slow growth has been a more prominent problem. The economy has been undergoing structural changes that will lead to lower average inflation than in prior decades.

One of these changes is less aggressive wage and price setting. Since the 1980s, nearly unprecedented worldwide competition coupled with price resistance on the part of purchasers has tended to keep prices lower. Simultaneously, workers have kept wage bids lower in an effort to preserve jobs.

Another structural change is that the trend in productivity may be picking up. One of the reasons why manufacturing productivity has been so strong over the last few years has been computerization. Suppose that the Federal Reserve assumes that the inflation rate will remain stable only at an extremely tight monetary policy that guarantees a permanently lower rate of growth, whereas (because of a rise in productivity) the inflation rate will remain stable at a somewhat looser policy that allows a higher growth rate. Clearly, society as a whole is better off with the higher growth rate.

Should The Federal Reserve Aim For Zero Inflation? NAM believes that the Federal Reserve should aim for a low, stable rate of inflation. This rate is not necessarily zero, but could be positive. As a practical matter, trying to lower the inflation rate from its current level of about 2.5 percent down to zero would be costly.

In the early 1980s, it required two successive recessions and an unemployment rate peaking at 10.8 percent to force the inflation rate from 10 percent in 1981 to under 4 percent by 1985. This disinflation was clearly necessary. But the unemployment cost of this disinflation lasted almost a decade. Similarly, driving the inflation rate from 4.4 percent in 1989 to 2.3 percent in 1994 required four years of slow growth, from 1989 to 1992.

The cost of forcing the inflation rate to zero may be prohibitive. At high rates of inflation, expectations become increasingly important in wage-price setting. A credible commitment by the central bank to lower inflation can reduce these expectations. But at very low rates of inflation, expectations are often a minor factor. Instead, wage and price setting is based primarily on conditions in markets. The result is that in order to bring inflation to zero, the central bank must create enough slack so that market conditions will force wages and prices down. There will always be some structural rigidities or market imperfections that will prevent wages and prices from adjusting rapidly. The result is that it may require a long and deep recession to squeeze inflation down from its current level of just over 2 percent down to zero.

Another cost associated with driving the inflation rate to zero has to do with relative prices. Historically, the rate of inflation in manufacturing is lower than in the rest of the economy. For instance, in 1982-93, the rate of inflation in manufacturing was 2.3 percent per year, compared to 4.2 percent annually in services. This results from higher productivity and greater international competition. The implication is that industry bears a disproportionate cost in achieving a zero inflation rate. Arguably, since service sectors with little competition such as medical care and legal services will probably show positive inflation rates even during recessions, achieving an average inflation rate of zero might require a negative inflation rate in manufacturing.

Similarly, the costs of disinflation are greater in manufacturing. Historically, the decline in industrial production during recessions has been about three times as large as the decline in GDP. In some sense, trying to hold the overall inflation rate to zero would be imposing an excessive penalty on the goods-producing sectors of the economy.

Finally, it should be noted that some widely-used price measures such as the CPI tend to overstate the inflation rate. For instance, in 1994, the CPI increased by 2.7 percent, but the implicit deflator for personal consumption expenditures increased by only 2.1 percent, a difference of 0.6. Trying to achieve a zero rate of inflation as measured by the CPI would be costlier than for a more accurate measure such as one of the implicit deflators.

TESTIMONY OF

JERRY J. JASINOWSKI
PRESIDENT
NATIONAL ASSOCIATION OF MANUFACTURERS

BEFORE THE
JOINT ECONOMIC COMMITTEE
ON HUMPHREY-HAWKINS AND THE FEDERAL RESERVE

MARCH 16, 1995

I am Jerry Jasinowski, President of the National Association of Manufacturers. The NAM is the nation's oldest and largest broad-based industrial association. It has more than 13,000 member companies, including 9,000 small manufacturers, located in every state, which produce approximately 85 percent of the nation's manufactured goods.

We appreciate the opportunity to appear today before the Joint Economic Committee. We will address the two issues emphasized in these hearings. First, is it desirable under the Humphrey-Hawkins law for the Federal Reserve to have to consider unemployment as well as inflation in its policy decisions, or should the Fed concentrate entirely on inflation? Second, if the Federal Reserve were to try to bring the inflation rate down to zero, what would the costs be?

Inflation Only or Multiple Targets?

As a general principle, the NAM has always argued in favor of low and stable rates of inflation. Certainly, nobody wants to go back to the experience of 1965-82 when the economy went through inflationary booms followed by deep recessions. For this reason, we

would favor any policies that tend to keep the business cycle stable.

Nevertheless, we are skeptical of the view that the Fed should only consider inflation in setting its monetary targets. This view ignores the fact that inflation is just one component of nominal GDP. The other component is of course real output. This point, while straightforward, is worth emphasizing. For any rate of monetary growth, there is an implied growth rate of nominal GDP, and hence of real GDP. Arguing that the Fed should consider only inflation is comparable to saying that monetary policy should ignore the real output component of nominal output. It makes more sense for the Fed to consider both the inflationary component and the real component.

There is of course a more subtle premise behind the argument that the Fed should concentrate exclusively on inflation. This is the idea that once wage and price expectations adjust to the desired inflation rate, real GDP will grow at something near its potential rate.

Unfortunately, this idea is a bit too simplistic. First of all, it presumes that the velocity of money is fairly stable over time. About twenty years ago, some economists argued that the Federal Reserve should adopt a policy of fixed money supply targets. If the velocity of money grew at a stable rate, sooner or later inflation would drop to zero (or some negligibly small rate), and real output would grow at potential.

Nevertheless, when central banks first began to target monetary aggregates in the late 1970s, velocity began to fluctuate wildly. In the United States, the velocity of M1 fell sharply in the early 1980s, forcing the Federal Reserve to abandon the target. More recently, the velocity of M2 has increased sharply, with the result that monetary policy looked tighter in the early 1990s than its really was.

This experience was not limited to the United States, but occurred in virtually every major industrial country. During the 1980s, the Bank of Canada, the Bank of England, and the Bundesbank were forced to change the monetary aggregate they were targeting because of unstable and unpredictable velocity fluctuations.

In other words, if the Fed had rigidly adhered to a fixed money supply target, this would not have resulted in a more stable growth path for the economy. Instead, due to the velocity fluctuations, real growth would have been destabilized. The decision to move away from targeting monetary aggregates and use interest rates as short-term policy instruments was a very sensible one.

Similarly, the idea that the Fed should look only at inflation does not imply that real output growth would become more stable. It might become less stable.

Consider the following scenario. Suppose the Fed were to tighten monetary policy and velocity were to fall, much as it did in the 1981-82 recession. The cost of reducing inflation, i.e., the loss in output, would be greater. It would be easy to avoid this if the Fed were to operate with simultaneous targets for output and inflation.

There are other reasons to suspect that the output costs could be higher than generally realized. As mentioned earlier, some of the monetarist literature assumes that real growth converges back on trend after an initial period of disinflation. But what determines the trend in output? Most growth theorists now accept the conclusion of Robert Solow -- the long-term trend in per capita output is determined primarily by the rate of technological advance.

Econometric models approximate technological advance by fitting a linear trend to total factor productivity. But this means of course that in the long run the growth path will

always converge back on this trend. Stated another way, the conclusion that the economy reverts to trend in the long run is based on the way in which the models are constructed.

Recently, there has been alot of debate about this in the academic literature. Quite a bit of the new work has argued that the trend itself can shift substantially over time. What could account for a break in the trend? Since the trend is determined by the rate of technological advance, one way to measure the trend is to use empirical measures like R&D. Over the last few years, there also is evidence of technological improvements in manufacturing corporations, which have been made possible by investment in computers. The growth rates of R&D and investment in computers are not constant, however, but change in response to interest rates, the profitability of firms, and business cycle conditions.

Here is the essence of our argument. Changes in monetary policy affect the business cycle, which in turn affects investment in R&D and computer technology. For example, if a recession is sufficiently prolonged, firms become illiquid, and are forced to cut costs drastically in order to survive. Investment in research is curtailed, skilled employees such as scientists and engineers are laid off, and less money is available for computers.

To put it another way, the trend in output is not always independent of the cycle. It would therefore be possible for the Federal Reserve to depress the growth rate over long periods of time if it keeps monetary policy too tight.

Let's look at a concrete example -- the Federal Reserve's current policy choices. Over the last fifteen months, the Federal Reserve raised interest rates by 3 percentage points in order to slow the economy and bring inflation under control. But by Chairman Greenspan's own policy statements, the Fed expected the inflation rate to be higher than it

actually was and the growth rate to be lower than it actually was. In reality, despite a robust 4 percent gain in GDP, the inflation rate in 1994 came to only 2.1 percent year-on-year, as measured by the implicit GDP deflator (2.3 percent on a fourth-quarter to fourth-quarter basis).

Looking back at 1994, there was not much threat of inflation -- the inflation rate actually declined over the year, while growth conditions were quite healthy after a long period (1989-92) in which growth rates were substandard. If the Fed had raised interest rates even more -- and some bond market analysts argued for much larger rate increases -- we would not have had the same gains in output and employment, but the gains in controlling inflation would have been minor.

Structural Changes and Inflation

The emphasis in these hearings on focusing on inflation alone is a bit surprising, since in the last few years inflation has been modest while slow growth has been a more prominent problem. In this respect, we would argue that the economy has been undergoing structural changes that will lead to lower average inflation than in prior decades.

One of these changes is less aggressive wage and price setting. Since the 1980s, nearly unprecedented worldwide competition coupled with price resistance on the part of purchasers has tended to keep prices lower. Simultaneously, workers have kept wage bids lower in an effort to preserve jobs. This new, disinflationary mentality, which has become quite pervasive in the manufacturing sector, has a deeper implication. With price

expectations permanently lower, it has become possible to produce more output at lower inflation than in prior decades.

Another structural change is that the trend in productivity may be picking up. Looking out to the long run, the Federal Reserve has indicated it believes that potential output -- the long-run growth rate that is consistent with stable inflation -- is only about 2.5 percent per year. This is a rather pessimistic estimate. Assuming 1.2 percent annual growth in the labor force during the late 1990s, this implies that the trend in productivity is a mere 1.3 percent per year.

This rather low rate of productivity growth is of course extrapolated from the 1980s, when productivity was high in manufacturing but low throughout the rest of the economy. Nevertheless, one of the reasons why manufacturing productivity has been so strong over the last few years has been technological advance. Specifically, as firms have computerized, many aspects of the production process have become more efficient. Examples are just-in-time inventory control and computer-aided design, which makes it possible for engineers to design new products in less time and at a lower cost. At the current time, the trend in productivity in the manufacturing sector is probably in the area of 3 percent per year.

As computerization spreads to the service sector, we can expect to see productivity picking up throughout the economy during the late 1990s. So far, the evidence on this isn't clear. Our internal calculations suggest that the trend in productivity may be in the process of picking up to about 1.6 percent per year, rather than the 1.3 percent assumed by the Federal Reserve.

Without wishing to defend this number until more data becomes available, it is useful

to consider the implications. Suppose that the Federal Reserve assumes that the inflation rate will remain stable only at an extremely tight monetary policy that guarantees a permanently lower rate of growth, whereas in fact the inflation rate will remain stable at a somewhat looser policy that allows a higher growth rate. Clearly, society as a whole is better off with the higher growth rate.

Should The Federal Reserve Aim For Zero Inflation?

As stated at the outset, NAM believes that the Federal Reserve should aim for a low, stable rate of inflation. This rate is not necessarily zero, but could be positive. As a practical matter, trying to lower the inflation rate from its current level of about 2.5 percent down to zero could be costly.

To get a handle on what these costs are, I will briefly review the experience of the last two disinflationary episodes. In the early 1980s, it required two successive recessions and an unemployment rate peaking at 10.8 percent (in December 1982) to force the inflation rate from 10 percent in 1981 to under 4 percent by 1985. This disinflation was clearly necessary, given the extremely high inflation rates in the late 1970s. Nevertheless, it took a long time for the unemployment rate to return to its natural rate. At 5.8 percent in 1979, the unemployment rate had probably been slightly below its natural rate when the disinflation started. It was not until 1989 that the unemployment rate fell to 5.3 percent, again somewhat below the natural rate. So the unemployment cost of this disinflation lasted almost a decade.

Similarly, driving the inflation rate from 4.4 percent in 1989 to 2.3 percent in 1994

required four years of slow growth, from 1989 to 1992. The unemployment rate rose from 5.3 percent in 1989 to 7.4 percent in 1992. Again, the evidence is that bringing inflation down requires long periods of low growth and high unemployment.

By implication, the cost of forcing the inflation rate to zero may be prohibitive. At high rates of inflation, expectations become increasingly important in wage-price setting. A credible commitment by the central bank to lower inflation can reduce these expectations. But at very low rates of inflation, expectations are often a minor factor. Instead, wage and price setting is based primarily on conditions in markets. The result is that in order to bring inflation to zero, the central bank must create enough slack so that market conditions will force wages and prices down. In any economy, there will always be some structural rigidities or market imperfections that will prevent wages and prices from adjusting rapidly. The result is that it may require a long and deep recession to squeeze inflation down from its current level of just over 2 percent down to zero.

Another cost associated with driving the inflation rate to zero, which is not widely known, has to do with relative prices. Historically, the rate of inflation in manufacturing is lower than in the rest of the economy. For instance, in 1982-93, the rate of inflation in manufacturing was 2.3 percent per year, compared to 4.2 percent annually in services. This results from higher productivity and greater international competition. The implication is that industry bears a disproportionate cost in achieving a zero inflation rate. Arguably, since service sectors with little competition such as medical care and legal services will probably show positive inflation rates even during recessions, achieving an average inflation rate of zero might require a negative inflation rate in manufacturing.

Similarly, the costs of disinflationary recessions are greater in manufacturing. Historically, the decline in industrial production during recessions has been about three times as large as the decline in GDP. In some sense, trying to hold the overall inflation rate to zero would be imposing an excessive penalty on the goods-producing sectors of the economy.

Finally, it should be noted that some widely-used price measures such as the CPI tend to overstate the inflation rate. For instance, in 1994, the CPI increased by 2.7 percent, but the implicit deflator for personal consumption expenditures increased by only 2.1 percent, a difference of 0.6 percent. Similarly, in 1994 the fixed-weight deflator for GDP also increased by 0.6 percent more than the implicit deflator. Clearly, trying to achieve a zero rate of inflation as measured by the CPI would be costlier than for a more accurate measure such as one of the implicit deflators.

Conclusions

As a general principle, the nation's manufacturing industries benefit most from an environment characterized both by low stable inflation and by stable growth. For this reason, we argue that the Federal Reserve should consider the implications of monetary policy for real growth as well as inflation. This is hardly a radical idea. Since any monetary policy the Fed chooses implies a path for nominal GDP, it is useful for the Fed to consider the real GDP component as well as the inflation component.

As for driving the inflation rate to zero within some fixed time frame, e.g., the end of the decade, this is not something that we would support at the present time. We polled the

NAM Board of Directors on this issue at the last meeting, and a majority of 71 percent argued in favor of holding interest rates at or near their current levels, rather than raising them. A significant minority -- 27 percent -- argued that the Fed had already tightened too much, and should begin to lower interest rates. Given the stresses experienced by manufacturing during the last major disinflation, industry needs a monetary policy that is sufficiently accommodative to allow the expansion to continue. Therefore, the short-term policy choice should clearly be to keep monetary policy on its present course, not to undertake a new round of disinflation.

ACCOUNTABILITY AND RESPONSIBILITY IN THE CONDUCT OF MONETARY POLICY

MANDATING A STABLE PRICE LEVEL RULE

by
David I. Meiselman
Professor of Economics
Director, Graduate Economics Program in Northern Virginia
Virginia Polytechnic Institute and State University

Hearings before the Joint Economic Committee
U.S. Congress
on the Humphrey Hawkins Act
Washington, D.C.
March 16, 1995

It is most appropriate that the Joint Economic Committee hold hearings on the Humphrey-Hawkins Act and the Federal Reserve at this time. Humphrey-Hawkins, the Full Employment and Balanced Growth Act of 1978, was passed at the height of beliefs that government could effectively forecast, plan and control the detailed operation of the economy, even one as large, as complex, and as open to international economic forces as the American economy. The 1960's and 1970's was also the period when there was widespread belief that governments, central banks and international bureaucrats could effectively fine tune monetary and fiscal policies and exchange rates to tame the business cycle and achieve foreign exchange rate stability.

I recently reread the act and it is a fascinating relic of another era, a time before the widespread public acknowledgement of the failures of statism and fine tuning all

around the world and the associated collapse of socialisms. One result has been to start shedding many of the powers and functions accumulated by central governments and authorities all around the world. There are even the beginnings of moves to curb the vast discretionary powers of central banks and to establish standards of accountability for their actions.

The United States lagged behind many other countries in recognizing both the ineffectiveness, and worse, the material carnage of statism and its inevitable destruction of personal freedom as well as the futility and failures of monetary and fiscal fine tuning. Both major political parties and some potential third parties in the United States are now well on the route to finally joining the rest of the world in questioning, more rejecting, long accepted conventional political and economic wisdom, and, I may add, they are in the process of effectively converting many old reformers into contemporary reactionaries.

As I read it, the Humphrey-Hawkins Act establishes a number of laudable goals for the Federal Government and the American economy. These include full employment, defined as a 3% unemployment rate of all people over the age of 20, zero inflation by 1988, and a balanced budget. The Act also calls for policies leading to a high and sustained rate of private capital formation, and to encouraging exports. An important part of the Act sets up a system of counter-cyclical fiscal policy fine tuning, which consists mainly of planned increases in federal government spending, including accelerated or standby public works and various training and job counseling programs to be turned on

and off during the business cycle. In practice, many such "temporary" pump priming spending programs were late in getting started, usually when the economy was already in recovery, ineffective at best and frequently became permanently imbedded in a bloated federal budget. The business cycle remained with us, but the federal budget grew and grew. Although much of the Act focuses on Keynesian demand management and assumes both its effectiveness and ease of implementation, it is significant that there are no tax cuts to counter recessions, only more government spending.

The core of the Humphrey-Hawkins Act is an elaborate and complex set of fact finding and consultative procedures as well as procedures for forecasting and then setting various goals and targets of national policy. Title III of the Act contains the detailed policies and procedures for Congressional review and involvement. Some of these largely revolve around the Economic Report of the President, with the Joint Economic Committee having a central role in these elaborate forecasting, planning and consultative activities.

Section 108, labeled "Monetary Policy" directs the Board of Governors of the Federal Reserve to transmit to Congress no later than February 20 and July 20 of each year an independent written report reviewing and analyzing recent economic developments. It also requires statements about the objectives and plans of the Fed regarding changes in monetary and credit aggregates for the coming year "taking account of past and prospective developments in employment, unemployment, production, investment, real income, productivity, international trade and payments, and prices" and

"the relationship of (these) objectives and plans to the short-term goals set forth in the most recent Economic Report of the President . . ." Despite major attention paid to interest rates by the public and despite the central role of interest rates in the Fed's own operating procedures, the Act makes no reference to interest rates in the Monetary Policy section.

In any event, these Fed reports to the Congress are referred to the Banking Committee of the Senate and the Banking Committee of the House. The Act requires the Federal Reserve Board to consult with each Committee on the reports. In turn, each Banking committee is required to submit to its respective body a report containing its views and recommendations regarding the Fed's intended policies, but for many years the House Committee essentially ignored this requirement. Thus, the Joint Economic Committee is essentially bypassed in dealing with the Fed, and the Congress and the relevant Committees have not taken their statutory responsibilities seriously. In effect, hardly anybody on Capital Hill seems to have cared, despite the constitutional grant of monetary powers to the Congress, "to coin money and regulate the value thereof." Since the value of money is measured by the price level, the constitution is clear and explicit about congressional responsibility for mandating and/or monitoring a stable price level goal.

As a practical matter, the requirements of the Act are further weakened, perhaps even eliminated, by the concluding portion of Section 108, which states that, "Nothing in

the Act shall be interpreted to require that the objectives and plans with respect to the ranges of growth or diminution of the monetary and credit aggregates disclosed in the reports submitted under this section be achieved if the Board of Governors and the Open Market Committee determine that they cannot or should not be achieved. . ." Instead, the Fed need only explain later "the reasons for any revisions to or deviation from such objectives and plans." The minutes of the Open Market Committee suggest that such revisions and the recognition of such deviations came after the fact, which is not surprising given that the Fed directly targets interest rates and only indirectly has an intermediate run money supply target as well.

Although the Fed has been free to set whatever monetary targets it wishes, including multiple target ranges that are so broad as to render them virtually hollow and empty, over the years the Fed has frequently missed its own monetary targets. This has impaired the Fed's credibility but the Congress, itself, has imposed neither penalties nor much effective oversight or criticism of the Fed's performance, nor has Congress changed the rules or set up effective, meaningful standards of accountability.

Indeed, most of the Humphrey-Hawkins Act has turned out to be an empty exercise in public policy theater of questionable practical significance in shaping or influencing actual public policies or outcomes. Moreover, the goals of zero inflation, 3% unemployment and a balanced budget have never been close to being achieved or even taken seriously.

Perhaps the only useful aspect of the Act is that it does require the Fed to make some public report on its performance and monetary targets at hearings that attract such wide attention. Although the reports and hearings are better than nothing, they are seriously flawed and structured to insulate or absolve the Fed of any commitment to and any accountability or responsibility for achieving and maintaining what they can attain by monetary policy, namely, a long-run stable price level. Moreover, the goal of stable prices is also clearly mandated in Section 2A of the Federal Reserve Act which states, "The Board of Governors of the Federal Reserve System and the Federal Open Market Committee shall maintain long run growth of the monetary and credit aggregates commensurate with the economy's long run potential to increase production so as to promote effectively the goals of maximum employment, stable prices and moderate long-term interest rates." The law seems pretty clear, but the Fed has never been held accountable for carrying out this part of the Federal Reserve Act, either.

Stable prices and a credible commitment to stable prices is precisely what the Fed can do to best achieve the other goals of maximum employment and moderate long-term interest rates. However, it is dismaying that neither the Fed nor the Congress seems to have paid much attention to the requirements of the Federal Reserve Act itself. The Fed has clearly not achieved the goals of either the Federal Reserve Act or the Humphrey-Hawkins Act, nor has the Fed consistently tried. Congressional oversight has failed, too, and there is no apparent enforcement mechanism for this section of the Federal Reserve

Act. Thus, Congress, itself shares complicity in these flawed arrangements and in the often poor results of Fed policies and operations.

With respect to monetary policy, in retrospect it was inevitable, indeed unavoidable that the Fed could not achieve the multiple goals of the Humphrey-Hawkins Act, even if it wished to do so. The Fed can essentially control a monetary aggregate via its direct control of the monetary base, currency plus bank reserves. The monetary base changes when the Fed alters the amount of Federal Reserve credit, the other side of the Fed's balance sheet. Using Federal Reserve credit, essentially writing a check on itself, the Fed can create money out of thin air, vulgarly called printing money, enabling the Fed to intervene in financial markets to buy Treasury securities, extend loans to banks or others, to buy foreign exchange and so forth. Thus, the Fed can directly impact financial markets by its own buying and selling, even using its enormous buying and selling power to fix or peg interest rates or prices in particular markets, such as the federal funds market. Alternatively, the Fed can buy foreign exchange by selling monetary base dollars to keep the dollar from appreciating, or the Fed can borrow and/or sell foreign exchange for dollars to keep the foreign exchange value of the dollar from falling. Similarly, the Fed can target the stock of money or the dollar price of gold, but not both. Thus, the Fed can achieve either a stable price level or a stable dollar price of gold, but not both.

But these initial financial market impacts of Fed intervention are soon swamped by the consequences of the changes in Federal Reserve credit and the monetary base that

financed the Fed's borrowing, lending and trading operations. Given our fractional reserve banking system, a change in each dollar of monetary base results in several times greater change in the money supply and in total bank credit. Thus, people far removed from the initial transaction find they have more (or less) cash and available credit without knowing that Fed operations were responsible.

It also turns out that the longer-term effects of monetary change usually differ from the initial impact of Fed operations or of short-period changes in money. With varying and imprecise lags, the early effects of money may affect real variables such as sales, employment and production. Over the longer run, the initial short-run real effects of monetary change dissipate and vanish. Only the price level is permanently changed. In the short run, monetary policy can and does affect employment and business conditions, especially when the Fed surprises markets or creates uncertainty. In the long run, monetary policy can only affect the level of prices or create essentially permanent uncertainty.

Thus, there are certain targets and goals the Fed can reasonably achieve and others that it cannot. There are combinations of targets and goals the Fed cannot possibly attain, particularly since the Fed has essentially only one instrument under its control, the monetary base, and one instrument can at best achieve only one independent target at a time. For example, the Fed can target the stock of money, as contemplated by the Humphrey-Hawkins Act, or the Fed can target the federal funds rate or exchange

rates. It cannot do both. If the Fed intervenes in foreign exchange markets, it cannot also achieve either a money supply target or an interest rate target. Similarly, even over short periods of time the Fed can, in principle, achieve either a stable domestic price level or fixed exchanged rates. The Fed cannot achieve both. If the Fed employs its one instrument but keeps shifting from one target to another, it runs the risk of both increasing uncertainty and achieving no target at all.

Moreover, because of lags, variable lags at that, in the effects of monetary change, the limitations of our knowledge, and the literal impossibility of having permanent real effects of changes in nominal money, it is dangerous folly to expect the printing press to achieve and sustain any specific level of employment and output. Indeed, both recent and ancient history are littered with the wrecks of regimes that tried to inflate their way to prosperity or to use the printing press to cover up or offset the detrimental effects of other public policies.

In addition, because so much of the Humphrey-Hawkins Act depends on accurate forecasting, the inability of even the best and the brightest to make accurate economic forecasts, even of economic aggregates, to say nothing of the smaller details required by the Act, raises serious questions about the feasibility of the Humphrey-Hawkins and related procedures that depend on accurate forecasts, including the Fed itself citing future inflation, as now. Moreover, how can any of the forecasts, themselves, be accurate when no forecaster, including the Fed's own forecasters, know in advance what Fed monetary

policy will be, one reason for the absence of consistently good forecasts by anybody, public or private.

It is also dangerous folly to expect or depend on the Fed to achieve what is beyond its power to attain. The best possible monetary policy cannot create jobs or production. It can only prevent the instability, the uncertainty and the loss of employment and income resulting from poor monetary policy. In my judgement, the best possible monetary policy aims to achieve a stable and predictable price level. Poor Federal Reserve monetary policy was a major factor in causing the Great Depression of the 1930's and the double digit inflations of more recent years. Better Federal Reserve policy helped make possible the economic growth and relative price stability of the 1950's and 1960's as well as the improved economic performance and reduced inflation of the past several years. Just as the good record of the 50's and 60's did not preclude the double digit inflations of the 1970's, itself primarily the result of double digit money growth, even the current Fed performance is no guarantee that future Federal Reserve actions will focus on achieving price stability or that future Feds will not get us back on the high inflation roller coaster of the 70's and early 80's. This absence of credibility is surely an important element in current high real interest rates.

One result of the Humphrey-Hawkins Act is to impair Fed accountability for its actions. When the Fed fails to achieve one target or goal, it can, and usually does, point to another target it is aiming for. In addition, because members of Congress differ among

themselves regarding the importance of the items on the menu of targets and goals, there is little focused or coherent monitoring or critique of the Federal Reserve and monetary policy coming from the Congress to whom, in principle, the Fed reports and to whom they are accountable.

The effect of these arrangements is to have a set of formal reports and a large number of hearings and briefings, all of which give the appearance of close Congressional monitoring of the Fed and of Fed accountability for its actions.

But this is all a public policy Potemkin village because behind all of the facade of hearings, reports and meetings there is little substance because the Fed is not required to achieve or be committed to achieving any attainable or useful goal, such as a stable price level. One inevitable result is that the Fed is effectively not held accountable for its actions, and the Congress does not have a standard for evaluating or monitoring Fed performance. What's left is the Fed, a creature of Congress, and independent of the Executive Branch, granted enormous monetary and financial powers, formally reporting to Congress, but de facto largely independent of Congress, too. The appearance of accountability, but its lack of substance, may be one reason the Fed appears to welcome the Humphrey-Hawkins hearings and procedures.

The analogy between the Fed, independent of the Executive (but not the Legislative Branch) and the independent Judiciary Branch is not valid. The Fed is not like the

independent judiciary, the third branch of government. Judges are required to follow the laws passed by Congress, signed by the President, and their rulings and activities are subject to judicial review. There is no such effective legal directive or framework for use of the monetary powers of the Fed, nor is there any effective review, whatever the constitution in fact says about the congress regulating the value of money, which is the price level.

An attainable and useful goal of monetary policy is a stable long-run price level, and the Fed is best directed to achieving and maintaining the goal that is already explicit in the Federal Reserve Act, itself. In my judgement, there is now no practical point at this time to arguing about the detailed and complex points of Fed operations as to how the goal of a stable price level is to be achieved. Those are technical, engineering details best arrived at by the Fed itself once the stable price level rule is mandated by Congress, with the Fed held accountable for attaining the goal and responsible for working out and making public the operating details of how they intend to reach the goal within the very broad monetary powers it already has. The Congress would then have the responsibility to monitor the Fed's performance and to hold the Fed accountable for the results. To make the mandate enforceable, Congress must also have the power to remove Federal Reserve Governors from office or to impose penalties for serious, consistent or willful failures. If Congress cannot enforce the mandate for a stable price level, it may well turn into yet another empty exercise in public policy theater, like Humphrey-Hawkins, itself.

Even with respect to the technical and operating details of managing a monetary policy directed to achieving a stable price index, the Fed may miss the target from time to time even under the best of circumstances. The Federal Reserve has an impressive array of technical and professional talent, and they would then have the requirement and the incentive to learn by doing, so I would expect their performance to improve through time. It is up to Congress to provide the framework that would help make this possible. Indeed, a credible commitment to a stable price level itself has important self stabilization properties. By reducing uncertainty, it also would contribute significantly to enhanced efficiency and lower interest rates.

Of course, the Fed can commit itself to achieving a stable price level without any legislated mandate. Making the stable price level commitment public would, in fact, help achieve the goal and reduce the frictions of getting there. For now, if the Fed has a specific inflation goal, let them state it publicly and commit themselves to achieving it rather than pointing to unspecified, unverifiable future inflation or inflation expectations to justify their policies. Such public commitment to a stable price level goal would be most welcome but would not be as effective as a mandate because future Feds could easily change or disregard plans and commitments made by the current Board of Governors and Open Market Committee.

Although there is some inevitable disagreement about details, there is growing support for the principle of a mandated target and goal of a stable price level. Several

years ago Congressman Neal proposed such a mandate, and the Board of Governors, itself, came out in support of the proposed legislation. More recently, I believe Chairman Greenspan voiced similar support for a stable price level goal as have several Federal Reserve Bank Presidents. New Zealand and Canada have already done so. Only this morning I read a speech delivered yesterday by the President of the Federal Reserve Bank of St. Louis that is in agreement with the general positions given in my testimony. In fact, he states, "The Fed cannot be fully accountable if it continues to have multiple policy objectives. Accountability in terms of price stability represents an achievable and measurable objective that is likely of affect inflation expectations and improve the performance of policymakers." To which I add my amen.

It is time for the United States to mandate a stable price level and to hold public officials accountable for achieving it. Amending or eliminating the Humphrey-Hawkins Act would be a helpful step in that direction, especially if combined with the kind of price level stabilization, accountability and oversight I have outlined.

ISBN 0-16-052414-8