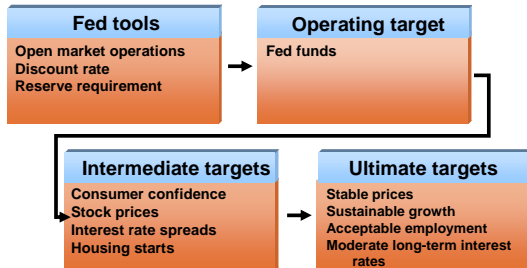


Offensive Defensive Monetary Policy

Ultimately what all of this is
about?



The Complex Nature of Monetary Policy



Offensive and Defensive Actions

- **Defensive actions** are designed to maintain the current monetary policy.
- **Offensive actions** are designed to have expansionary or contractionary effects on the economy.



The Fed Funds Rate as an Operating Target



- The Fed looks at the Federal funds rate to determine whether monetary policy is tight or loose.

The Fed Funds Rate as an Intermediate Target



- If the Federal funds rate is above the Fed's target range, it buys bonds.
- This increases reserves and lowers the Federal funds rate.

The Fed Funds Rate as an Intermediate Target



- If the Federal funds rate is below the Fed's target range, it sells bonds.
- This decreases reserves and raises the Federal funds rate.

The Complex Nature of Monetary Policy



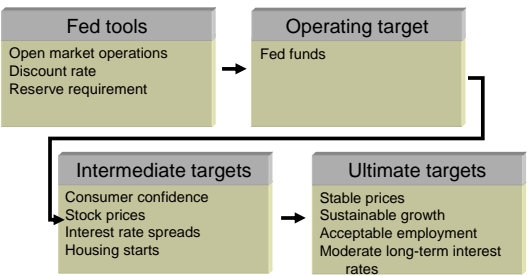
- The Fed's ultimate target is price stability, acceptable employment, sustainable growth, and moderate long-term interest rates.
- These targets are indirectly affected by changes in the Fed funds rate.

The Complex Nature of Monetary Policy



- The Fed watches intermediate targets to see if it is on track.
- Intermediate targets include consumer confidence, stock prices, interest rate spreads, housing starts, and a host of others.

The Complex Nature of Monetary Policy



The Taylor Rule



- Set the Fed funds rate at 2 percent plus current inflation if the economy is at desired output and desired inflation.

The Taylor Rule



- If the inflation rate is higher than desired, increase the Fed funds rate by 0.5 times the difference between desired and actual inflation.

The Taylor Rule



- If output is higher than desired increase the Fed funds rate by 0.5 times the percentage deviation.

The Taylor Rule



- Formally the Taylor rule is:

Fed funds rate = 2% + Current inflation
+ 0.5 X (actual inflation less desired inflation)
+ 0.5 X (percent deviation of aggregate output from potential)

Monetary Policy in the AS/AD Model**



- In AS/AD model, monetary policy is seen working primarily through its effect on interest rates.

Contractionary Monetary Policy



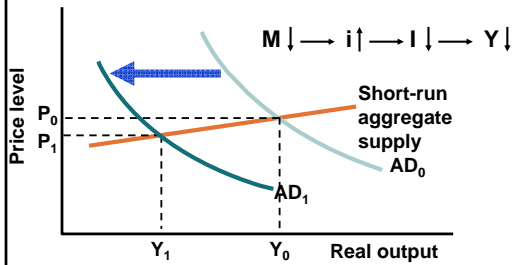
- The Fed decreases the money supply.
- The interest rates go up.
- As interest rates go up, the quantity of investment goes down.

Contractionary Monetary Policy

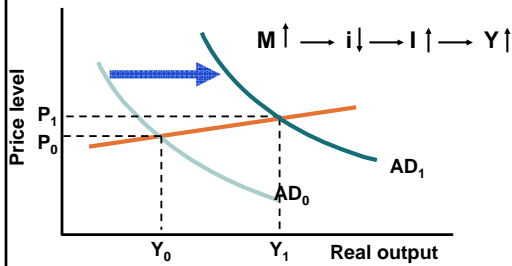


- As investment goes down, aggregate demand goes down.
- Aggregate equilibrium demand and income go down by a multiple of decrease in investment.

Contractionary Monetary Policy in the AS/AD Model*



Expansionary Monetary Policy*

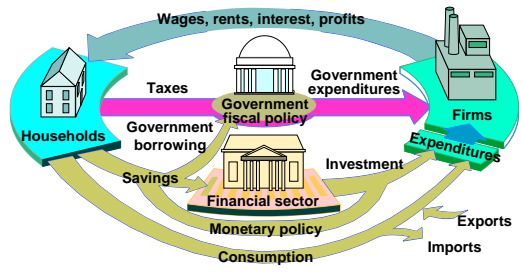


Monetary Policy in the Circular Flow*



- Expansionary monetary policy tries to expand the economy by channeling more saving into investment.
- Contractionary monetary policy tries to reduce inflationary pressures by restricting demand for consumer loans and investment

Monetary Policy in the Circular Flow



Emphasis on the Interest Rate*



- A rising interest rate indicates a tightening monetary policy.
- A falling interest rate indicates a loosening of monetary policy.

Emphasis on the Interest Rate



- A natural conclusion is that the Fed should target interest rates in setting monetary policy.

Real and Nominal Interest Rates



- There is a problem in using interest rates as a measure of the tightness or looseness of monetary policy.
- That problem is the real/nominal interest rate problem.

Real and Nominal Interest Rates



- **Nominal interest** rates are those you actually see and pay.
- **Real interest rates** are those adjusted for expected inflation.

Real and Nominal Interest Rates



- The real interest rate cannot be observed since it depends on expected inflation, which cannot be directly observed.

$$\text{Nominal interest rate} = \text{Real interest rate} + \text{Expected inflation rate}$$

Real and Nominal Interest Rates and Monetary Policy



- Making a distinction between nominal and real interest rates adds another uncertainty to the effect on monetary policy.

Real and Nominal Interest Rates and Monetary Policy



- Most economists believe that a monetary regime, not a monetary policy, is the best approach to policy.
- Expansionary monetary policy will lead to expectations of increased inflation.
- Increased inflation expectations will lead to higher nominal interest rates, leaving real interest rates unchanged.

Real and Nominal Interest Rates and Monetary Policy



- A **monetary regime** is a predetermined statement of the policy that will be followed in various situations.
- A **monetary policy** is a policy response to events which is chosen without a predetermined framework.

Real and Nominal Interest Rates and Monetary Policy



- The Fed is currently following a monetary regime that involves feedback rules that center on the Federal funds rate.
- If inflation is above its target, the Fed raises the Fed funds rate.

Problems in the Conduct of Monetary Policy*



- The problems of monetary policy:
 - Knowing what policy to use.
 - Understanding the policy you're using.
 - Lags in monetary policy.
 - Liquidity traps
 - Political pressure.
 - Conflicting international goals.

Knowing What Policy to Use



- The potential level of income must be known.
- Otherwise you don't know whether to use expansionary or contractionary monetary policy.

Understanding the Policy You're Using



- You must know whether the policy being used is expansionary or contractionary in order to use monetary policy effectively.

Understanding the Policy You're Using



- The money multiplier is influenced by both the amount of cash people hold as well as the lending process at the bank.
- Neither of these are stable numbers.

Understanding the Policy You're Using



- Then there are interest rates.
- If interest rates rise, is it because of expected inflation or is it that the real interest rate is going up?

Lags in Monetary Policy



- Monetary policy takes time to work.
 - The Fed must recognize what the situation in the economy is.
 - Then it must develop a consensus for action.
 - Then businesses and individuals have to react to the policy change.

Liquidity Trap



- Just because the Fed drops interest rates, that does not necessarily mean that people or businesses will go out and borrow money.

Liquidity Trap



- **Liquidity trap** – a situation in which increasing reserves does not increase the money supply, but simply leads to excess reserves.

Political Pressure



- The Fed is not totally insulated from political pressure.
- Presidents place great pressure on the Fed to loosen the purse strings, especially during an election year.

Conflicting International Goals



- Monetary policy is conducted in an international arena.
- It must be coordinated with other nations.
