

Name _____ Date _____ Class _____

STUDY GUIDE**Chapter 15, Section 1**

For use with textbook pages 407–413

THE FEDERAL RESERVE SYSTEM**KEY TERMS**

member banks Commercial banks that are members of, and hold stock in, the Federal Reserve System (page 407)

bank holding company A corporation that owns one or more banks (page 410)

Regulation Z Federal regulation under which the Federal Reserve has the authority to extend truth-in-lending disclosures to millions of individuals who purchase or borrow from corporations, retail stores, automobile dealers, banks, and lending institutions (page 411)

currency The paper component of the money supply (page 413)

coins Metallic forms of money (page 413)

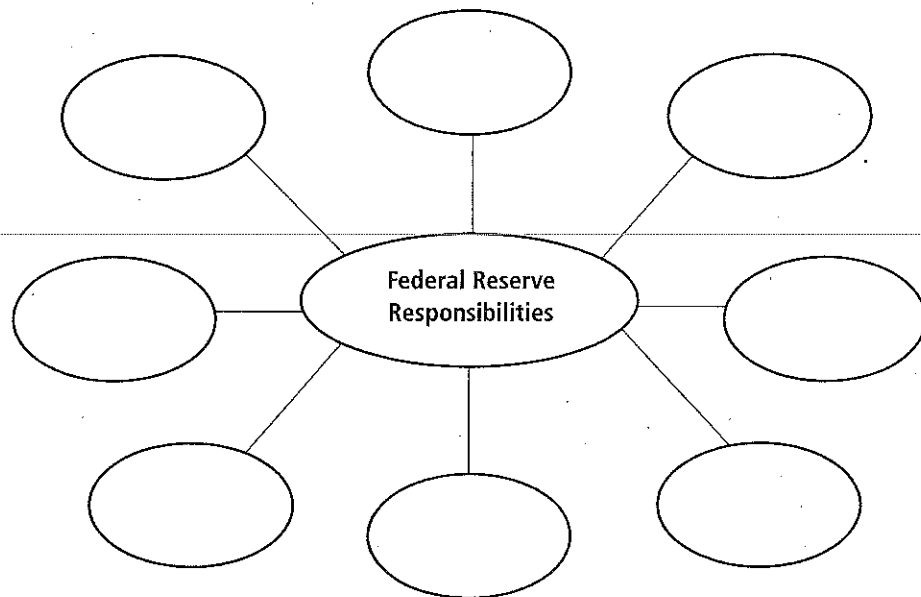
DRAWING FROM EXPERIENCE

If you have a checking account, have you ever wondered what happens after you write a check? Do you know what happens to paper money that is worn out?

This section focuses on the different responsibilities of the Federal Reserve.

ORGANIZING YOUR THOUGHTS

Use the diagram below to help you take notes as you read the summaries that follow. Think about the various ways the Fed affects people's daily lives.



STUDY GUIDE (continued)

Chapter 15, Section 1

READ TO LEARN

Introduction (page 407)

The Federal Reserve System—"the Fed"—was established in 1913 as America's central bank. It sets the nation's monetary (money) policy. It also has many other jobs. Because everyone uses money and takes part in the economy, the Fed's actions affect everyone.

1. Why should ordinary Americans pay attention to the actions of the Federal Reserve?

Structure of the Fed (page 407)

The Federal Reserve System divides the country into 12 districts. Each district has a Federal Reserve bank located in a major city, as well as a number of branch banks. **Member banks** of the system can borrow money from the Federal Reserve bank. All national banks (banks chartered, or approved, by the national government) must belong to the Federal Reserve System. Some state-chartered banks also belong. The Fed was established as a corporation, which is an organization owned by many individuals. However, member banks, not individuals, own the Fed's stock.

Though the Fed is owned by member banks, it is run by government officials. The Fed is organized in the following way:

- A. Board of Governors** The seven members of the board are appointed by the president and approved by the Senate. They serve 14-year terms. One person is named to act as chairperson. The board sets rules and supervises the system.
- B. Federal Reserve District Banks** There are 12 Federal Reserve district banks. Each district bank has its own president and board of directors. The district banks take deposits from member banks. They also lend money to banks and thrift institutions.
- C. Federal Open Market Committee (FOMC)** This committee makes most of the Fed's monetary policy. Its members are the Board of Governors and the presidents of five of the 12 Federal Reserve district banks. They meet regularly to make decisions about interest rates and the money supply.
- D. Advisory Committees** Three committees advise the Fed's Board of Governors. Representatives from the 12 district banks form the Federal Advisory Council, which reports on the overall economy. The Consumer Advisory Council reports on consumer credit. Representatives from savings banks and other savings institutions make up the Thrift Institutions Advisory Council.

2. Which group of Federal Reserve officials decides monetary policy? Who are its members?

STUDY GUIDE (continued)**Chapter 15, Section 1**

☐ **Regulatory Responsibilities** (page 410)

The Fed supervises many parts of the American banking system.

- A. The Fed checks the money that state-chartered member banks set aside. This reserved money is used to pay checks that bank customers write. The reserves are also used to control the money supply.
 - B. The Fed regulates bank holding companies. **Bank holding companies** are corporations that own one or more banks. Other government agencies may regulate the banks themselves.
 - C. Many banks from foreign countries operate branches in the United States. Some also own shares in U.S. banks. The Fed supervises and regulates these foreign banking operations. It also supervises the overseas operations of American banks.
 - D. The Fed must approve mergers of state banks that are members of the Federal Reserve System. (A merger is a combination of two or more banks or businesses into one.) Other government agencies approve other mergers. The Comptroller of the Currency approves the merger of two national banks, while the FDIC approves mergers of nonmember state banks.
3. How is a bank holding company different from a bank?
- _____
- _____

☐ **Other Federal Reserve Services** (page 411)

Besides regulation and supervision, the Fed provides important services:

- A. **Clearing checks** What actually happens when you pay someone with a check? The reserves of member banks are used as the check moves through the banking system until it returns to the check writer's own bank. Parts of the operation are handled by computers.
 - B. **Carrying out consumer laws** When you buy something on credit, you pay a little at a time until you've paid the whole debt, plus interest. The Truth-in-Lending law requires that customers who buy on credit must be given full information about the interest they will pay, how long they can take to pay, and other items. **Regulation Z** gives the Fed authority to require banks, stores, and other lenders to follow truth-in-lending procedures for borrowers.
 - C. **Maintaining currency** The Federal Reserve banks produce and store **currency**, or paper money, which is printed by the Bureau of Engraving and Printing. **Coins**, which are metal forms of money, are produced by the Bureau of the Mint and also sent to Federal Reserve banks. The Fed sends banks new money and destroys worn-out money.
 - D. **Government financial services** The Fed is the federal government's bank. It sells government securities and savings bonds. It also keeps accounts into which tax payments are deposited. The Fed pays out checks such as Social Security payments.
4. What are two services provided by the Fed that do not involve regulation?
- _____
- _____

STUDY GUIDE Chapter 15, Section 2

For use with textbook pages 415-424

MONETARY POLICY

KEY TERMS

monetary policy The expansion and/or contraction of the money supply in order to influence the cost and the availability of credit (page 415)

fractional reserve system Requirement that banks and other depository institutions keep a fraction of their deposits in the form of legal reserves (page 415)

legal reserves Coins and currency that depository institutions hold in their vaults, plus deposits with Federal Reserve district banks (page 415)

reserve requirement A rule stating that a percentage of every deposit be set aside as legal reserves (page 415)

excess reserves Legal reserves in excess of the reserve requirement (page 416)

liabilities Debts and financial obligations to others (page 416)

assets Properties, possessions, and financial claims on others (page 416)

balance sheet A condensed statement showing assets and liabilities at a given time (page 416)

net worth Excess of assets over liabilities, which is a measure of the value of a business (page 416)

liquidity An asset's potential for being converted into cash in a very short time (page 417)

savings account Interest-bearing bank account that cannot be withdrawn by check; no prior notice is needed in order to withdraw savings (page 417)

time deposit Interest-bearing bank account that cannot be withdrawn by check; prior notice is needed to withdraw time deposits (page 417)

member bank reserve A deposit that a member bank keeps in the Federal Reserve to meet reserve requirements (page 418)

easy money policy Federal Reserve policy that allows the money supply to grow and interest rates to fall (page 419)

tight money policy Federal reserve policy that restricts the growth of the money supply, which drives interest rates up (page 419)

open market operations The buying and selling of government securities in financial markets (page 420)

discount rate Interest rate that the Federal Reserve charges on loans to financial institutions (page 422)

margin requirements Minimum deposits left with a stockbroker to be used as down payments to buy other securities (page 423)

moral suasion The use of persuasion such as announcements, press releases, articles in newspapers and magazines, and testimony before Congress (page 424)

selective credit controls Credit rules pertaining to loans for specific commodities or purposes (page 424)

STUDY GUIDE (continued) **Chapter 15, Section 2**

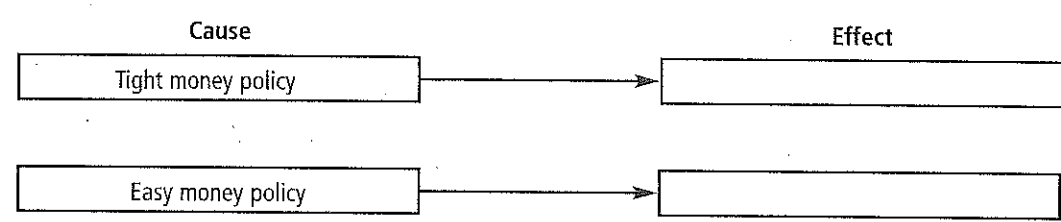
DRAWING FROM EXPERIENCE

Have you ever borrowed money from a bank? Did you wonder just how lenders decide how much interest to charge?

In the last section you read about the many areas in which the Federal Reserve works. This section focuses on how monetary policy affects the economy.

ORGANIZING YOUR THOUGHTS

Use diagram below to help you take notes as you read the summaries that follow. Think about how monetary policy affects different areas of the economy.



READ TO LEARN

● **Introduction** (page 415)

One function of the Federal Reserve is to expand or shrink the money supply. This function is called the Fed's **monetary policy**. Its monetary policy influences how available and how expensive it is to borrow money.

1. Would you expect a larger money supply to make it easier or harder to borrow money? Explain.

● **Fractional Bank Reserves** (page 415)

American banks are required to meet a **reserve requirement**. That is, they must set aside a certain percentage, or fraction, of each deposit as **legal reserves**. The reserves are coins and currency that are held in bank vaults. These reserves are deposited as a **member bank reserve** (MBR) in a Federal Reserve district bank. Once banks have met the reserve requirement, they can lend the remaining funds, their **excess reserves**. This is the **fractional reserve system**.

Like any business, banks keep financial records. They list their **assets** (the valuable things that they own) and **liabilities** (debts) in a record called a **balance sheet**. If you subtract a bank's liabilities from its assets, you get the bank's **net worth**. If a customer makes a \$100 deposit at a bank, it is recorded in two ways on the balance sheet. Because the money is owed to the depositor, it shows as a \$100 liability. But since the bank actually holds it, it also appears as an asset—divided between cash and the required amount of reserves. If the current reserve requirement is 15%, \$15 goes into reserves.

STUDY GUIDE (continued)**Chapter 15, Section 2**

After the bank meets the reserve requirement, it can lend the other \$85 (its excess reserves). It charges the borrower interest, which returns to the bank as income. The bank can also use its excess reserves to buy bonds and other securities. These have **liquidity**, which means they can be changed quickly to cash if needed. A bank may also try to attract more depositors with interest-bearing **savings accounts** and **time deposits**. Banks make profits by paying depositors at interest rates lower than the rates it charges people who borrow.

2. Why do you think banks are required to keep legal reserves?

■ **Fractional Reserves and Monetary Expansion** (page 418)

Under the fractional reserve system, the money supply can grow to be larger than the reserves that banks actually hold. One reason is that excess funds from a deposit can be loaned to others. First, someone opens a new bank account with \$1,000. If the reserve requirement is 15%, the bank sets aside \$150 as reserves. It can lend the other \$850 to other people. The next day, someone borrows \$600, which he or she puts in a demand account at the bank. Again, 15% (\$90) is kept as reserve. Now the bank has \$510 as well as the remaining \$250 from the first deposit—\$760 of excess reserves. At this point, the first depositor has a \$1,000 account at the bank; the borrower has a \$600 account at the bank; and the bank itself has \$760. The money supply has expanded to \$2,360.

As this process goes on, the loans get smaller. At some point the money supply stops growing. If you know the reserve requirement, you can figure how large the money supply can actually grow. If the reserve requirement is 15% (.15):

$$\text{Total Reserves} = .15 (\text{Money Supply})$$

Let x stand for the money supply, and rewrite the equation like this:

$$\text{Total Reserves} = .15 x$$

OR

$$\frac{\$1,000}{.15} = \frac{.15x}{.15}$$

$$\text{Money Supply } (x) = \$6,667$$

Further changes in total reserves can still affect the money supply.

3. What figure determines how large the money supply can grow?

STUDY GUIDE (continued)**Chapter 15, Section 2**

● **Tools of Monetary Policy** (page 419)

The Federal Reserve has five tools of monetary policy. Each tool affects the amount of excess reserves. The amount of excess reserves, in turn, directly affects the size of the money supply. With an **easy money policy**, the Fed lets interest rates fall so that the money supply grows. People buy on credit, and sales and production rise. Businesses invest money. With a **tight money policy**, interest rates rise and the money supply is not allowed to grow. This slows economic growth.

The five tools of monetary policy are:

- A. Reserve requirement** The Fed can raise or lower the reserve requirement. A lower reserve requirement allows more money to be loaned, so that the monetary supply expands. A higher reserve restricts loans. This is a powerful policy tool but not often used.
 - B. Open market operations** The Fed can buy and sell government securities. This is its most popular tool of monetary policy. It affects the excess reserves—and the money available for loans—in the banking system. If the Fed buys securities, it uses its own funds to write a check. That adds to the reserve funds in the banking system. On the other hand, the Fed can contract the money supply by selling government securities. That draws reserves out of member banks. These operations are run by the Federal Open Market Committee (FOMC).
 - C. Discount rate** The Fed's third major tool is the discount rate, the interest rate the Fed charges on loans. Member banks may borrow from the Fed to (1) make up for drops in its reserves, or (2) to meet seasonal needs.
 - D. Margin requirements** When a person or company buys something on margin, it has only part of the cash needed for the purchase. This practice was common in the stock speculation leading up to the Great Depression of the 1930s. People could buy stock with as little as 10% of its price. Margin requirements today are at least 50%. Although the Fed does not use margin requirements as a policy tool, it does use them to affect risk-taking on stocks.
 - E. Moral suasion** The chairperson or other speakers for the Federal Reserve may express their opinions publicly. When this happens, bankers, investors, politicians, and others pay attention and may act on what they hear.
 - F. Selective credit controls** This tool, which controls the credit available for specific goals or products, is seldom used. In wartime, however, selective credit controls were sometimes used to control buying of cars or other consumer goods, in order to free up resources for wartime use.
4. What is the difference between an easy money policy and a tight money policy?

STUDY GUIDE Chapter 15, Section 3

For use with textbook pages 426–431

MONETARY POLICY, BANKING, AND THE ECONOMY

KEY TERMS

- prime rate** The best or lowest rate that commercial banks charge their customers (page 427)
- quantity theory of money** Principle that changes in the supply of money affect the general level of prices (page 427)
- monetizing the debt** Federal Reserve policy that creates enough extra money to offset the deficit spending in order to keep interest rates from changing (page 427)
- real rate of interest** The market rate of interest minus the rate of inflation (page 428)
- M1** Component of money supply that represents the transactional components of the money supply, or the components that most closely match money's role as a medium of exchange (page 429)
- M2** A measure of money that includes those components most closely conforming to money's role as a store of value (page 430)

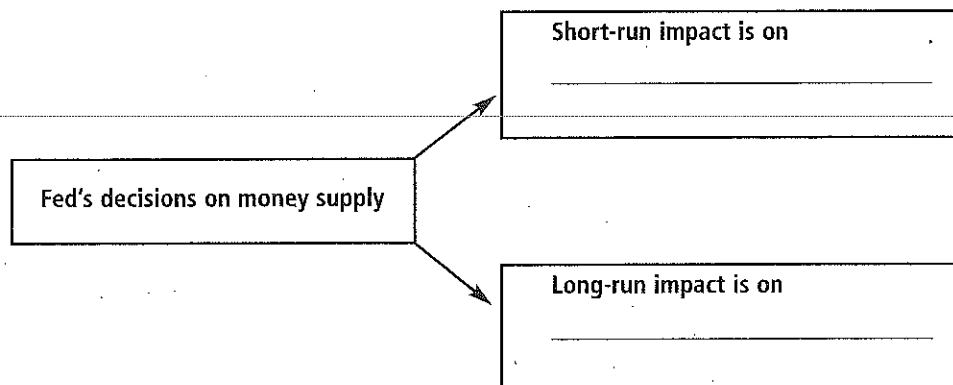
DRAWING FROM EXPERIENCE

Do you have a credit card? Do you get offers for credit cards in the mail even though you don't have a credit history? Why do you think you receive these offers?

In the last section, you read about the Federal Reserve's monetary policy. This section focuses on how changes in the money supply affect the economy.

ORGANIZING YOUR THOUGHTS

Use the diagram below to help you take notes as you read the summaries that follow. Think about how the money supply affects the overall economy.



STUDY GUIDE (continued)**Chapter 15, Section 3****READ TO LEARN****Short-Run Impact** (page 426)

In the short run, the Fed's monetary policies affect interest rates—that is, the price people and businesses pay to borrow money. If the Fed lets the money supply increase, the cost of credit goes down. If the money supply decreases, the cost of credit (the interest rate) goes up. One important tool is the **prime rate**, which is the interest rate that commercial banks charge their best customers. The Fed's decisions are sometimes controversial. For example, in 1981 it allowed the prime rate to go above 20%. This policy was aimed at long-term goals rather than short-term goals.

1. In the short run, what is the impact of the Fed's decisions about the money supply?

Long-Run Impact (page 427)

Over time, changes in the money supply affect the general level of prices. This idea is called the **quantity theory of money**. Many events in history back up this theory. For example, in the 1600s the Spanish mined the great amounts of gold and silver in their American colonies. This large amount of gold and silver caused very bad inflation in Europe. Large amounts of paper currency printed in wartime in the United States had the same effect.

Sometimes the Fed makes the money supply grow. It does this so that unusual spending will not create a shortage and send interest rates up. To prevent the rise of interest rates during the Vietnam War, the Fed decided to **monetize the debt**—create enough extra money to offset the government's deficit spending. The Fed continued this policy into the late 1970s. However, in the long run, prices and interest rates continued to rise. The growing money supply made inflation worse. In 1980 the Fed then turned to a tight money policy with high interest rates to bring down inflation.

Like other measures in the economy, interest rates can be affected by inflation. To find the **real rate of interest**, you must subtract the rate of inflation from the market interest rate. For example, if the interest rate is 18 percent and the inflation rate is 10 percent, the real interest rate is just 8 percent.

2. What is the goal of monetizing the debt?

Other Monetary Policy Issues (page 429)

When the Fed decides on monetary policy, it has to consider a number of issues:

- A. How long will the policy take to show results?** Effects of policy changes may not be seen for as long as two years.
- B. What parts of the economy will be affected most?** For example, a rise in interest rates may place a heavier burden on loans made for large purchases such as houses and automobiles. That will hurt the home-building and automobile industries as well as consumers.

STUDY GUIDE (continued)

Chapter 15, Section 3

C. *Changes in interest rates may determine whether people buy now or in the future.*

For example, when interest rates are high, people may decide to wait for lower rates or to save instead of buying on credit. Similarly, inflation affects buying decisions. With rising prices, for example, people may buy now, fearing that the price will continue to go up.

There are so many ways to hold money—from cash in your pocket to long-term deposits—that the Fed has defined two types of money supply:

- A. **M1** represents money used in transactions—money as a medium of exchange. Examples include cash, demand deposits, other check-writing accounts, and traveler's checks.
- B. **M2** adds in the forms of money used to store value. In addition to M1, M2 includes savings deposits, small time deposits, and money market funds.

3. What are the functions of M1 and M2?

☐ **The Politics of Interest Rates** (page 430)

Although the Fed is the central bank, it is owned by member banks, not the government. In addition, members of the Board of Governors serve long terms. This means that they will serve through several presidential administrations, and be less affected by political pressure than if they only served a short time. Nevertheless, the Fed is often under great political pressure. It tries hard to maintain its independence.

Politicians up for re-election seek low interest rates to make the economy grow and please voters. The Fed, however, focuses on long-term economic health. Some critics have tried to reduce the Fed's independence but have not succeeded.

4. In what ways is the Fed politically independent?
