

chapter

2

Security Markets: Present and Future

objectives

1. Understand the functions of the financial markets.
2. Explain the role that the investment banker plays in the distribution of securities.
3. Discuss the differences between organized exchanges and over-the-counter markets.
4. Understand the impact of electronic markets on the efficiency of the markets.
5. Discuss the future outlook for the capital markets.
6. Understand the important legislation that affects the operations of the capital markets.

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THE MARKET ENVIRONMENT

The financial markets have changed dramatically during the last decade, and they continue to change at a rapid pace. This period has been one of deregulation, new laws, mergers, global consolidation, online (Internet) brokerage, and electronic communication networks (ECNs). These structural changes have been accompanied by 24-hour trading, decimalization of stock quotes, and intense global competition.

The last part of the 1990s was punctuated with mergers and consolidations both global and domestic. The 1998 merger between Citicorp (the parent of CitiBank) and Travelers Insurance (including the Salomon Smith Barney division) created Citigroup. This merger caused a significant change in the way competitors thought about financial services. For the first time since the 1930s we had an institution that was able to sell insurance, underwrite securities, perform brokerage functions, and offer commercial banking under the same roof. This had been prohibited by the Glass Steagall Act, which was enacted after the “Great Crash” of 1929 to keep one bank from being both a commercial bank and an investment bank. Citigroup legally had a three-year window to divest the insurance assets and was allowed like JP Morgan to keep its investment banking business in a holding company. However, the combination forced Congress to think about U.S. banks’ ability to compete globally, and in 1999 the U.S. Congress passed the Gramm-Leach-Bliley Act allowing financial institutions to offer full financial services. Shortly after, Chase and JPMorgan merged and other commercial banks gobbled up smaller investment banks and brokerage firms. American financial institutions were starting to look more like European universal banks and would be able to compete more effectively around the globe during the 21st century.

The roaring bull market from 1995 through 1999 gave investors returns of more than 20 percent each year. This was unfortunately followed by a major market decline that began in 2000 and continued into the winter of 2002.

On September 11, 2001, the World Trade Center in New York City and the Pentagon in Washington, D.C., were attacked by terrorists. In New York both towers and many surrounding buildings were destroyed, and thousands of lives were lost. This act of terror caused significant physical damage to the financial system, but less than one week later the New York Stock Exchange opened with a record trading volume of more than 2.3 billion shares. Despite the significant decline in stock prices at the time, many thought that the ability to generate this much volume was an indication of the strength of our financial system. Trading occurred from satellite backup facilities in Connecticut, Midtown Manhattan, and Jersey City, New Jersey. The New York Board of Trade opened up in a backup facility in Brooklyn, trading pits and all. It is clear that the markets could not have accomplished this feat without the technological improvements that have characterized the last decade.

Unfortunately, the economy was already in a recession, and the devastation both psychological and physical was enough to eliminate any chance for the economy to generate positive economic growth in the third quarter. The stock market had already declined significantly from its highs, with the Dow Jones Industrial Average falling from a high of 11,436 on May 21, 2001, to 8,376 on September 20, 2001, for a drop of 26.76 percent. At the same time the over-the-counter Nasdaq Composite Index dropped from 3,913 on September 20, 2000, to 1,451 one year later—a one-year drop of almost 63 percent (not including the fall

www.citicorp.com
www.travelers.com
www.citigroup.com



from its high of over 5,000 in March 2000). The nature of these stock market indexes is more fully explored in Chapter 3.

During this period of great grief and turmoil, many e-mail messages, websites, and talk shows were asking Americans to buy common stock when the market opened on September 17, 2001. This would be the patriotic thing to do and would help the market from suffering declines. Most market professionals argued against this logic by stating that markets were here to reflect reality and expectations and that there was nothing that could be done artificially to keep markets from falling or rising if expectations were negative or positive. In fact the markets did fall. Some industry groups such as the airlines and hotels/motels plunged between 25 and 50 percent in one day. Other companies in the defense industry rose more than 50 percent. In the eyes of the market participants, the markets did their job in reflecting the new reality facing Americans and the rest of civilized world. Markets have gone up and down throughout history, including periods of prosperity, recession, war and other catastrophic events. What are markets supposed to do?

MARKET FUNCTIONS

Many times people will call their stockbroker and ask, “How’s the market?” What they are referring to is usually the market for common stocks as measured by the Dow Jones Industrial Average, the New York Stock Exchange Index, or some other measure of common stock performance. The stock market is not the only market. There are markets for each different kind of investment that can be made.

A **market** is simply a way of exchanging assets, usually cash, for something of value. It could be a used car, a government bond, gold, or diamonds. There doesn’t have to be a central place where this transaction is consummated. As long as there can be communication between buyers and sellers, the exchange can occur. The offering party does not have to own what he sells but can be an agent acting for the owner in the transaction. For example, in the sale of real estate, the owner usually employs a real estate broker/agent who advertises and sells the property for a percentage commission. Not all markets have the same procedures, but certain trading characteristics are desirable for most markets.

Market Efficiency and Liquidity

In general, an **efficient market** occurs when prices respond quickly to new information, when each successive trade is made at a price close to the preceding price, and when the market can absorb large amounts of securities or assets without changing the price significantly. The more efficient the market, the faster prices react to new information; the closer in price is each successive trade; and the greater the amount of securities that can be sold without changing the price.

For markets to be efficient in this context, they must be liquid. **Liquidity** is a measure of the speed with which an asset can be converted into cash at its fair market value. Liquid markets exist when continuous trading occurs, and as the number of participants in the market becomes larger, price continuity increases along with liquidity. Transaction costs also affect liquidity. The lower the cost of buying and selling, the more likely it is that people will be able to enter the market.

Competition and Allocation of Capital

An investor must realize that all markets compete for funds: stocks against bonds, mutual funds against real estate, government securities against corporate securities, and so on. The competitive comparisons are almost endless. Because markets set prices on assets, investors are able to compare the prices against their perceived risk and expected return and thereby choose assets that enable them to achieve their desired risk-return trade-offs. If the markets are efficient, prices adjust rapidly to new information, and this adjustment changes the expected rate of return and allows the investor to alter investment strategy. Without efficient and liquid markets, the investor would be unable to do this. This allocation of capital occurs on both secondary and primary markets.

Secondary Markets

Secondary markets are markets for existing assets that are currently traded between investors. These markets create prices and allow for liquidity. If secondary markets did not exist, investors would have no place to sell their assets. Without liquidity, many people would not invest at all. Would you like to own \$10,000 of Microsoft common stock but be unable to convert it into cash if needed? If there were no secondary markets, investors would expect a higher return to compensate for the increased risk of illiquidity and the inability to adjust their portfolios to new information.

Primary Markets

Primary markets are distinguished by the flow of funds between the market participants. Instead of trading between investors as in the secondary markets, participants in the primary market buy their assets directly from the source of the asset. A common example would be a new issue of corporate bonds sold by AT&T. You would buy the bonds through a brokerage firm acting as an agent for AT&T's investment bankers. Your dollars would flow to AT&T rather than to another investor. The same would be true of buying a piece of art directly from the artist rather than from an art gallery.

Primary markets allow corporations, government units, and others to raise needed funds for expansion of their capital base. Once the assets or securities are sold in the primary market, they begin trading in the secondary market. Price competition in the secondary markets between different risk-return classes enables the primary markets to price new issues at fair prices to reflect existing risk-return relationships. So far, our discussion of markets has been quite general but applicable to most free markets. In the following sections, we will deal with the organization and structure of specific markets.

ORGANIZATION OF THE PRIMARY MARKETS: THE INVESTMENT BANKER

The most active participant in the primary market is the investment banker. Since corporations, states, and local governments do not sell new securities daily, monthly, or even annually, they usually rely on the expertise of the investment banker when selling securities.

Underwriting Function

The **investment banker** acts as a middleman in the process of raising funds and, in most cases, takes a risk by underwriting an issue of securities. **Underwriting** refers to the guarantee the investment banking firm gives the selling firm to purchase its securities at a fixed price, thereby eliminating the risk of not selling the whole issue of securities and having less cash than desired. The investment banker may also sell the issue on a **best-efforts** basis where the issuing firm assumes the risk and simply takes back any securities not sold after a fixed period. A very limited number of securities are **sold directly** by the corporation to the public. Of the three methods of distribution, underwriting is far and away the most widely used.

With underwriting, once the security is sold, the investment banker will usually make a market in the security, which means active buying and selling to ensure a continuously liquid market and wider distribution. In the case of best efforts and for direct offerings by the issuer, which are even smaller than best efforts, the firm assumes the risk of not raising enough capital and has no guarantees that a continuous market will be made in the company's securities.

Corporations may also choose to raise capital through private placements rather than through a public offering. With a private placement, the company may sell its own securities to a financial institution such as an insurance company, a pension fund, or a mutual fund, or it can engage an investment banker to find an institution willing to buy a large block of stock or bonds. Most private placements involve bonds (debt issues) instead of common stock.

Table 2-1 on page 32 presents a historical picture of private and public bond offerings. Beginning in the 1980s, the economic recovery and falling interest rates stimulated a huge increase in the volume of bonds issued. Between 1980 and 1985, new debt issues tripled and then doubled again in one year from 1985 to 1986 as companies overdosed on debt to finance mergers, acquisitions, leveraged buyouts, and stock repurchases. From 1986 through 1990, new debt issues remained in a narrow band, but falling interest rates in 1993 again caused an increased period of bond financing and a peak in debt funds raised. During the 1990s publicly offered bonds approximated 80 percent of the funds raised with private placements accounting for about 20 percent. Table 2-1 demonstrates that publicly offered bonds issued through underwriters as opposed to privately placed issues are by far the most popular method of raising debt capital.

Distribution

In a public offering, the distribution process is extremely important, and on some large issues, an investment banker does not undertake this alone. Investment banking firms will share the risk and the burden of distribution by forming a group called a **syndicate**. The larger the offering in dollar terms, the more participants there generally are in the syndicate. For example, the tombstone advertisement in Figure 2-1 on page 33 for the Sprint Corporation's \$3.697 billion combined issue of PCS common stock (cell phone division) and Sprint Capital Corporation Equity Units illustrates the participation of investment banks in the syndicate and the globalization of the investment banking community.

JPMorgan was the lead-managing underwriter and was joined by Merrill Lynch and UBS Warburg as major partners in the underwriting syndicate. Several foreign banks were part of the international syndicate. UBS Warburg and Credit

www.sprint.com
www.jpmorgan.com
www.ml.com
www.ubswarburg.com

TABLE 2-1

Gross Proceeds of Corporate Bonds Publicly Offered and Privately Placed in the United States

Year	Total Issues	Publicly Offered		Privately Placed	
		Amount	Percentage of Total	Amount	Percentage of Total
1970	30,315	25,384	83.73	4,931	16.27
1975	42,755	32,583	76.21	10,172	23.79
1980	53,206	41,587	78.16	11,619	21.84
1985	165,754	119,559	72.13	46,195	27.87
1986	312,697	231,936	74.17	80,761	25.83
1987	301,349	209,279	69.45	92,070	30.55
1988	329,919	202,215	61.29	127,704	38.71
1989	298,813	181,393	60.70	117,420	39.30
1990	276,259	189,271	68.51	86,988	31.49
1991	389,822	286,930	73.61	102,892	26.39
1992	471,502	378,058	80.18	93,444	19.82
1993	608,255	487,029	80.07	121,226	19.93
1994	441,287	365,222	82.76	76,065	17.24
1995	496,296	408,804	82.37	87,492	17.63
1996	469,172	386,280	82.33	82,892	17.67
1997	566,766	467,130	82.42	99,636	17.58
1998	611,290	489,390	80.06	121,900	19.94
1999	686,320	551,284	80.32	135,036	19.68
2000	767,805	623,762	81.24	144,043	18.76

Suisse First Boston are Swiss-owned investment banks, while ABN AMRO Rothschild LLC is a Dutch investment bank. These three international banks are both commercial banks and investment banks, and for years they have had the flexibility to compete against U.S. commercial banks and investment banks on unequal footing. As discussed earlier, the U.S. Congress passed the Gramm-Leach-Bliley Act in 1999, repealing the Glass Steagall Act, which prohibited banks from offering both investment banking services and commercial banking services. Now U.S. banks can offer commercial and investment banking services as well as insurance and brokerage.

Firms are listed in the tombstone advertisement from the lead banker on the upper left, JPMorgan in this case, to the smallest banker in the bottom right. The firms at the top of the advertisement have agreed to underwrite the largest number of shares and the firms on the bottom have taken the smallest number of shares. The actual number of shares allocated to each investment banker is listed in the prospectus filed with the Securities and Exchange Commission (SEC). It should be noted that the investment bankers make a commitment to purchase (at a discount from the public price) and sell their allotted shares. If the PCS common stock price falls below the intended offering price of \$24.50 while the shares are still being sold to the public, the investment bankers in the syndicate will not make their original estimated profit on the issue. If the stock price drops too much below \$24.50, perhaps to \$23.00, the investment bankers could lose money on the offering.

For most original offerings, the investment banker is extremely important as a link between the original issuer and the security markets. By taking much of

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\$3,697,250,000



Sprint Corporation
80,500,000 Shares
PCS Common Stock, Series 1

Price \$24.50 Per Share

Joint Book-Running Managers

JPMorgan

Merrill Lynch & Co.

UBS Warburg

ABN AMRO Rothschild LLC

Banc of America Securities LLC

Credit Suisse First Boston

Lehman Brothers

Dain Rauscher Wessels

First Union Securities, Inc.

Robertson Stephens

The Williams Capital Group, L.P.

Sprint Corporation
Sprint Capital Corporation

69,000,000 Equity Units

Price \$25.00 Per Unit

Joint Book-Running Managers

JPMorgan

Merrill Lynch & Co.

UBS Warburg

ABN AMRO Rothschild LLC

Banc of America Securities LLC

Credit Suisse First Boston

Lehman Brothers

the risk, the investment banker enables corporations and others to find needed capital and also allows investors an opportunity to participate in the ownership of securities through purchase in the secondary market. The Sprint Corporation lists 80.5 million shares for its PCS cell phone division and 69 million shares for its Sprint Capital Corporation division. The total raised by the sale of the common stock and equity units was \$3.7 billion. The offering included more than 50 million shares of Sprint PCS held by Deutsche Telekom. After the issue was completed, Sprint was expected to keep about \$2 billion.

The demand for the offering was strong for a stock market that was certainly in a bear market by most measures (August 2001). Sprint had originally intended to offer 70 million shares but had given the underwriters an additional 10.5 million shares as an overallotment option for the common stock. The bankers exercised all these extra shares, and the total soared to 80.5 million shares.

The passage of the Gramm-Leach-Bliley Act is expected to have a significant effect on the structure of the investment and commercial banking industries. One continuing trend of the act will be the increased willingness of large financial institutions to take more risk. To consider that in our Sprint example, only 11 investment banking firms were able to absorb \$3.7 billion of risk is an indication of the trend. Ten years ago the number of bankers would have been more than triple that number, and the offering size would have been no more than \$1 billion.

More mergers—creating firms such as Citigroup with its Travelers Insurance Division and its Salomon Smith Barney brokerage and investment banking business—will occur. Chase Bank and JPMorgan merged as well as many other commercial banks and investment banks. The insurance industry is in the process of moving from mutual companies owned by their policyholders to stock companies owned by their stockholders. By moving to a stock company, the insurance companies will have the ability to merge with other financial companies through an exchange of stock. Expect continued mergers between insurance companies and other financial service companies over the next decade.

Another change that has affected the distribution and underwriting process is the increased use of shelf registration under SEC Rule 415. A shelf registration allows issuing firms to register their securities with the SEC and then sell them at will as funds are needed in the future. Over time, this allows bankers to buy portions of the shelf issue and immediately resell the securities to institutional clients without forming the normal syndicate or tying up capital for several weeks. Shelf registration is more popular with bond offerings than common stock offerings, where the traditional syndicated offering tends to dominate.

Investment Banking Competition

Table 2-2 on the next page shows the top 10 lead underwriters of U.S. debt and equity offerings for the year 2001 from January 1 to September 14, three days after the World Trade Center terrorist act. The list of bankers remains relatively the same from year to year with some bankers moving up or down the list due to mergers and the fund-raising activities of their clients. The total market share of the top 10 bankers has remained fairly stable over time, creeping up from 81 percent of the total funds in 1995 to 83.4 percent during this 2001 period. With 10 bankers accounting for 83.4 percent of the total, hundreds of smaller bankers are left to fight for the other 16.6 percent.

While investment bankers want to be on the top 10 underwriters list, they are more concerned about underwriting fees than about the number of issues in

TABLE 2-2**Top 10 Underwriters of U.S. Debt and Equity by Proceeds
January 1, 2001 through September 14, 2001**

Manager	Amount (in billions)	Market Share	Number of Deals
Merrill Lynch & Co.	\$ 279.7	14.2%	1,446
Citigroup/Salomon Smith Barney	256.3	13.0	969
Credit Suisse First Boston	199.1	10.1	1,146
JPMorgan	168.2	8.5	788
Lehman Brothers	157.7	8.0	730
Morgan Stanley	143.0	7.2	595
Goldman Sachs & Co.	138.4	7.0	600
Banc of America Securities LLC	117.9	6.0	707
UBS Warburg	99.5	5.0	416
Deutsche Bank AG	87.5	4.4	408
	<u>\$1,647.3</u>	<u>83.4</u>	<u>7,805</u>
Industry totals	\$1,977.2	100.0%	11,248

Source: Dow Jones News Retrieval 09-17-01.

TABLE 2-3**Top 10 Managers of U.S. Debt and Equity Disclosed Fees from New Issue Underwriting
January 1, 2001 through September 14, 2001**

Manager	Amount (in billions)	Market Share	Number of Deals
Citigroup/Salomon Smith Barney	\$1.301	17.1%	506
Morgan Stanley	1.155	15.2	289
Goldman Sachs & Co.	1.040	13.7	229
Merrill Lynch & Co.	0.961	12.7	427
Credit Suisse First Boston	0.737	9.7	332
Lehman Brothers	0.527	7.0	269
JPMorgan	0.482	6.4	399
Banc of America Securities LLC	0.370	4.9	200
UBS Warburg	0.256	3.4	155
Deutsche Bank AG	0.204	2.7	176
	<u>\$7.033</u>	<u>92.8%</u>	<u>2,982</u>
Industry totals	\$7.593	100.0%	3,296

Source: Dow Jones News Retrieval 09-17-01.

which they were the lead underwriter. Table 2-3 shows a slightly different ranking when looking at fees versus gross proceeds from underwriting. The reason for this difference is that some underwriting business, such as the sale of common stock, has higher fees than the sale of debt. Investment banks specializing in common stock or other high margin products can make more money with a smaller number of offerings and with lower proceeds. This is demonstrated by

TABLE 2-4 Underwriting Market Segments

U.S. domestic
 Straight debt
 Convertible debt
 Junk bonds
 Investment grade debt
 Mortgage debt
 Collateralized securities
 Preferred stock
 Common stock
 IPOs
 International debt
 U.S. issuers
 Municipal new issues

Goldman Sachs ranked seventh in Table 2-2 but third in Table 2-3. The same could be said for Merrill Lynch, ranked first in Table 2-2 but fourth in Table 2-3. Merrill Lynch dominates the amount of proceeds as lead underwriter, but they do a lot of lower risk business, thus reaping smaller underwriting fees.

Bringing private companies public for the first time is called an **initial public offering (IPO)**, and distribution costs to the selling company are much higher than offerings of additional stock by companies that are already public. Average fees from IPOs are usually between 1.5 and 2.0 percent higher than the fees for secondary offerings of publicly traded stock. The Sprint Corporation offering in Figure 2-1 is called a secondary offering because the shares were already listed on the New York Stock Exchange. The fees for the Sprint offering were lower than if the offering had been an IPO.

Underwriting competition is like a decathlon; there are many events for each contestant. Table 2-4 provides a list of the categories in which investment bankers compete. While Merrill Lynch is the dominant player in many of the segments, firms such as Goldman Sachs dominate the common equity category, and DLJ (now part of Bear Stearns) dominates the junk bond market. Each firm competes on their expertise.

The worldwide market is becoming more important to all investment bankers, and Table 2-5 on the next page looks at the top 25 global underwriters of debt and equity. As in Table 2-2, the top 10 have the lion's share of the market, but there are many well-known names in the bottom 15 companies. Throughout the table there are four German underwriters, three Swiss, two British, one Dutch, one Japanese, one French, and one Scottish investment banking underwriter. The top 10 underwriters account for more than 75 percent of the total proceeds. As global combinations continue, the bottom 15 underwriters will either be forced to merge with smaller banks to enhance economies of scale and increase their competitive power or be absorbed by the bigger banks looking for an ever-larger market share. The European markets are more fragmented than the U.S. markets, and a competitive environment with less regulation is emerging in countries such as Germany and France.

TABLE 2-5

**Top 25 Underwriters of Global Debt and Equity
by Proceeds
January 1, 2001 through September 14, 2001**

Manager	Amount (in billions)	Market Share	Number of Deals
Merrill Lynch & Co.	\$ 331.9	12.0%	1,494
Citigroup/Salomon Smith Barney	309.6	11.2	985
Credit Suisse First Boston	240.4	8.7	957
JPMorgan	215.6	7.8	775
Morgan Stanley	200.7	7.3	634
Lehman Brothers	181.1	6.6	642
Goldman Sachs & Co.	176.9	6.4	573
UBS Warburg	156.4	5.7	634
Deutsche Bank AG	149.2	5.4	528
Banc of America Securities LLC	120.1	4.3	548
Bear Stearns & Co. Inc.	79.2	2.9	303
ABN AMRO	64.4	2.3	571
Barclays Capital	52.6	1.9	213
Dresdner Kleinwort Wasserstein	40.6	1.5	187
HSBC Holdings PLC	34.6	1.3	227
Royal Bank of Scotland Group	31.3	1.1	109
Nomura Securities	21.9	0.8	135
Societe Generale	20.0	0.7	65
Countrywide Securities Corp.	16.4	0.6	306
BANK ONE Corp.	15.7	0.6	89
Commerzbank AG	14.7	0.5	86
First Union Corp.	14.1	0.5	99
HypoVereinsbank AG	13.6	0.5	66
Westdeutsche Landesbank Giro	12.3	0.4	68
	<u>\$2,513.1</u>	<u>91.0%</u>	<u>10,294</u>
Industry totals	\$2,764.7	100.0%	11,930

Source: Dow Jones News Retrieval 09-17-01.

ORGANIZATION OF THE SECONDARY MARKETS

Once the investment banker or the Federal Reserve (for U.S. government securities) has sold a new issue of securities, it begins trading in secondary markets that provide liquidity, efficiency, continuity, and competition. The **organized exchanges** fulfill this need in a central location where trading occurs between buyers and sellers. The **over-the-counter markets** also provide markets for exchange but not in a central location. A new type of market that has developed in the last several years is the **ECN** or **electronic communication network**. In the next sections we will present an overview of each market.

Organized Exchanges

Organized exchanges are either national or regional, but both are organized in a similar fashion. Exchanges have a central trading location where securities are bought and sold in an auction market by brokers acting as agents for the buyer and seller. Stocks usually trade at various trading posts on the floor of the exchange. Brokers are registered members of the exchanges, and their number is fixed by each exchange. The national exchanges are the New York Stock Exchange (NYSE) and the American Stock Exchange (AMEX). Both these exchanges are governed by a board of directors consisting of one-half exchange members and one-half public members.

The regional exchanges began their existence trading securities of local firms. As the firms grew, they became listed on the national exchanges, but they also continued to trade on the regionals. Many cities, such as Chicago, Cincinnati, Philadelphia, and Boston, have regional exchanges. Today, most of the trading on these exchanges is done in nationally known companies. Trading in the same companies is common between the NYSE and such regionals as the Chicago Stock Exchange, the Pacific Coast Exchange in San Francisco and Los Angeles, and the smaller regionals. More than 90 percent of the companies traded on the Chicago and Pacific Coast Exchanges are also listed on the NYSE. This is referred to as dual trading.

October 20, 1987, the day after the crash of '87, was the busiest day in the history of the New York Stock Exchange until October 28, 1997, the day after the next crash. On October 27, 1997, the stock market moved down significantly and ranked as one of the 10 worst days in market history. What did make history however, was the 1.2 billion shares traded on the New York Stock Exchange the next day. This compares to 685 million shares on October 27, 1987. Perhaps the greatest triumph however was the record number of shares traded on the first day the New York Stock Exchange opened after being closed for almost one week after the attacks on the World Trade Center. The 2.368 billion shares set a record for the NYSE. The other markets (such as Chicago, Nasdaq, and Boston) also showed significant increases in volume from the previous record days. This data can be examined in Table 2-6.

By Market	Monday 27-Oct-87	Monday 28-Oct-97	Monday 17-Sep-01
New York	685,496,330	1,195,836,620	2,368,326,910
Chicago	28,857,300	40,187,200	95,613,840
CBOE	56,600	74,000	6,300
Pacific	20,331,100	20,001,000	8,512,700
NASD/Nasdaq Intermarket	59,636,200	85,585,150	157,846,400
Philadelphia	9,009,600	10,619,700	14,530,700
Boston	10,793,100	13,995,100	43,359,000
Cincinnati	9,605,000	8,432,100	10,205,400
Composite	823,785,230	1,374,731,570	2,698,401,250

Source: Various issues of *The Wall Street Journal*.

Consolidated Tape

Although dual listing and trading have existed for some time, it was not until June 16, 1975, that a consolidated ticker tape was instituted. This allows brokers on the floor of one exchange to see prices of transactions on other exchanges in the dually listed stocks. Any time a transaction is made on a regional exchange or over-the-counter in a security listed on the NYSE, this transaction and any made on the floor of the NYSE are displayed on the composite tape. The composite price data keep markets more efficient and prices more competitive between exchanges at all times.

The NYSE and AMEX are both national exchanges and for years did not allow dual listing of companies traded on their exchanges, but as of August 1976, securities were able to be dually listed between these exchanges. There doesn't seem to be any advantage to this since both are located in New York City, and traditionally, shares that trade on one exchange are not traded on the other.

Table 2-7 on page 40 displays the number of trades (not number of shares) on all markets participating in the consolidated tape. Trading volume has steadily increased from 1988 to 2000, doubling almost every four years. Market share has been relatively stable between the major players with the New York Stock Exchange averaging about 74 percent over the last five years (bottom half of table) followed by Nasdaq at close to 11 percent and the Chicago Stock Exchange (CHX) averaging about 5.5 percent during the same time. The NYSE is seeing tough competition from the other exchanges and the over-the-counter Nasdaq system. While the New York Stock Exchange has approximately 73 percent of total trades, each trade is quite large relative to its competitors, and it has managed to maintain close to 83 percent of the total dollar volume from 1988 to 2000.

Listing Requirements for Firms

Securities can be traded on an exchange only if they have met the listing requirements of the exchange and have been approved by the board of governors of that exchange. All exchanges have minimum requirements that must be met before trading can occur in a company's common stock. Since the NYSE is the biggest exchange and generates the most dollar volume in large, well-known companies, its listing requirements are the most restrictive.

Initial Listing Although each case is decided on its own merits, there are minimum requirements that are specified by the exchanges. These requirements set minimums for the net income of the firm, the market value of publicly held shares, the number of shares publicly held, and the number of stockholders owning at least a round lot of 100 shares. Other exchanges such as the Chicago Stock Exchange have similar requirements, but the amounts are smaller. We have a web exercise at the back of the chapter that takes you to the New York Stock Exchange website where you can look up the latest minimum standards for companies wanting to be listed on the NYSE.

Corporations desiring to be listed on exchanges have decided that public availability of the stock on an exchange will benefit their shareholders by providing liquidity to owners or by allowing the company a more viable means for raising external capital for growth and expansion. The company must pay annual listing fees to the exchange and additional fees based on the number of shares traded each year.

TABLE 2-7 Consolidated Reported Trades

Consolidated Tape Trades by Market, 2000										
	NYSE*	PSE	CHX**	PHLX	BSE	CSE	NASD	INST***	CBOE	Total
2000	220,739,392	6,910,943	16,825,364	3,214,078	9,091,805	7,324,681	31,455,042	0	444	295,561,749
1999	169,405,684	8,279,262	13,758,573	2,692,976	7,323,563	4,437,849	26,994,867	0	629	232,893,403
1998	135,897,193	6,604,518	10,055,265	2,426,065	4,942,783	3,322,434	19,255,326	0	1,641	182,505,225
1997	102,601,803	5,712,875	6,375,353	2,392,148	2,850,194	3,443,128	14,463,766	0	2,388	137,841,655
1996	75,200,205	4,816,909	4,403,600	2,053,439	1,847,777	3,370,843	11,027,891	0	512	102,721,176
1995	58,630,094	4,443,064	4,281,216	1,784,669	2,096,402	3,263,961	8,994,455	0	0	83,493,861
1994	49,121,044	3,549,380	3,890,199	1,693,062	1,640,202	2,167,923	6,466,497	0	0	68,528,227
1993	46,476,295	3,806,226	4,050,348	1,851,256	1,687,649	1,704,590	6,351,196	2,301	0	65,929,861
1992	30,557,805	3,541,541	3,909,578	1,554,026	1,485,169	867,926	4,957,152	13,270	0	46,886,467
1991	27,167,350	3,274,499	3,240,894	1,147,522	1,361,572	298,665	3,847,067	11,542	0	40,349,111
1990	19,148,610	2,355,273	2,810,029	875,100	1,090,871	181,470	2,468,490	9,797	0	28,939,640
1989	19,727,062	2,378,200	2,970,627	965,448	900,529	125,215	1,419,914	7,794	0	28,494,789
1988	17,738,727	2,051,304	2,366,607	782,674	565,878	84,176	706,539	7,678	0	24,303,583

*Data after 1988 include rights and warrants.

**MSE changed its name to CHX on July 8, 1993.

***INST totals included in NASD after March 1, 1993.

Distribution of Consolidated Tape Trades, 1988-2000										
Year	NYSE*	PSE	CHX**	PHLX	BSE	CSE	NASD	INST***	CBOE	Total
2000	74.68%	2.34%	5.69%	1.09%	3.08%	2.48%	10.64%	0.00%	0.00%	100.00%
1999	72.74	3.55	5.91	1.16	3.14	1.91	11.59	0.00	0.00	100.00
1998	74.46	3.62	5.51	1.33	2.71	1.82	10.55	0.00	0.00	100.00
1997	74.43	4.14	4.63	1.74	2.07	2.50	10.49	0.00	0.00	100.00
1996	73.21	4.69	4.29	2.00	1.80	3.28	10.74	0.00	0.00	100.00
1995	70.22	5.32	5.13	2.14	2.51	3.91	10.77	0.00	0.00	100.00
1994	71.68	5.18	5.68	2.47	2.39	3.16	9.44	0.00	0.00	100.00
1993	70.49	5.77	6.14	2.81	2.56	2.59	9.63	0.00	0.00	100.00
1992	65.17	7.55	8.34	3.31	3.17	1.85	10.57	0.03	0.00	100.00
1991	67.33	8.13	8.03	2.84	3.37	0.74	9.53	0.03	0.00	100.00
1990	66.17	8.14	9.71	3.02	3.77	0.63	8.53	0.03	0.00	100.00
1989	69.23	8.35	10.43	3.39	3.16	0.44	4.98	0.03	0.00	100.00
1988	72.99	8.44	9.74	3.22	2.33	0.35	2.91	0.03	0.00	100.00

*Data after 1988 include rights and warrants.

**MSE changed its name to CHX on July 8, 1993.

***INST totals included in NASD after March 1, 1993.

Participating markets: NYSE, New York; AMEX, American; PSE, Pacific; CHX, Chicago; PHLX, Philadelphia; BSE, Boston; CSE, Cincinnati; CBOE, Chicago Board Options Exchange; NASD, National Association of Securities Dealers; INST, Instinet.

Source: NYSE: Website Summary 2000. This series includes every transaction in NYSE-listed issues as reported to the Consolidated Tape.

Delisting The New York Stock Exchange also has the authority to remove (delist) a security from trading when the security fails to meet certain criteria. There is much latitude in these decisions, but generally, a company's security may be considered for delisting if there are fewer than 1,200 round-lot (100 shares)

owners, 600,000 shares or fewer in public hands, and the total market value of the security is less than \$5 million. A company that easily exceeded these standards on first being listed may fall below them during hard times.

Membership for Market Participants

We've talked about listing requirements for corporations on the exchange, but what about the investment houses or traders that service the listed firms or trade for their own account on the exchanges? These privileges are reserved for a select number of people. The NYSE has 1,366 members who own "seats," which may be leased or sold with the approval of the NYSE. Multiple seats are owned by many member firms such as Merrill Lynch, so the number of member organizations totals 1,192. In recent years, the price of NYSE seats ranged from a low of \$35,000 in 1977 to a high of \$2,650,000 in early 1999. Prices fluctuate with market trends, going up in bull markets and down in bear markets. The members owning these seats can be divided into five distinct categories, each with a specific job.

Commission Brokers The **commission brokers** represent commission houses, such as Merrill Lynch, that execute orders on the floor of the exchange for customers of that firm. Many of the larger retail brokerage houses have more than one commission broker on the floor of the exchange. If you call your account executive (stockbroker) and place an order to buy 100 shares of ExxonMobil, the account executive will send your order to the NYSE where it will be transmitted to one of the firm's commission brokers who will go to the appropriate trading post and execute the order.

Floor Brokers You can imagine that commission brokers could get very busy running from post to post on a heavy volume day. In times like these, they will rely on some help from **floor brokers**, who are registered to trade on the exchange but are not employees of a member firm. Instead, floor brokers own their own seat and charge a small fee for services.

Registered Traders The **registered traders** own their own seats and are not associated with a member firm (such as Merrill Lynch). They are registered to trade for their own accounts and do so with the objective of earning a profit. Because they are members, they don't have to pay commissions on these trades; but in so trading, they help to generate a continuous market and liquidity for the market in general. There is always the possibility that these traders could manipulate the market if they acted in mass, and for that reason, the exchanges have rules governing their behavior and limiting the number of registered traders at one specific trading post.

Odd-Lot Dealers Odd lots (less than 100 shares) are not traded on the main floor of the exchange, so if a customer wants to buy or sell 20 shares of AT&T, the order will end up being processed by an **odd-lot dealer**. Dealers own their own inventory of the particular security and buy and sell for their own accounts. If they accumulate 100 shares, they can sell them in the market, or if they need 20 shares, they can buy 100 in the market and hold the other 80 shares in inventory. A few very large brokerage firms, such as Merrill Lynch, make their own odd-lot market in actively traded securities, and it is expected that this trend will

become common at other large commission houses. Odd-lot trading on other exchanges is usually handled by the specialist in the particular stock.

Specialists The **specialists** are a very important segment of the exchange and make up about one-fourth of total membership. Each stock traded has a specialist assigned to it, and most specialists are responsible for more than one stock. Specialists have two basic duties with regard to the stocks they supervise. First, they must handle any special orders that commission brokers or floor brokers might give. For example, a special order could limit the price someone is willing to pay for AOL-Time Warner stock to \$45 per share for 100 shares. If the commission broker reaches the AOL trading post and AOL is selling at \$46 per share, the broker will leave the order with the specialist to execute if and when the stock of AOL falls to \$45 or less. The specialist puts these special limit orders in his “book” with the date and time entered so he can execute orders at the same price by the earliest time of receipt. A portion of the broker’s commission is then paid to the specialist.

The second major function of specialists is to maintain continuous, liquid, and orderly markets in their assigned stocks. This is not a difficult function in actively traded securities, such as General Motors, Du Pont, and AT&T, but it becomes more difficult in those stocks where there are no large, active markets. For example, suppose you placed an order to buy 100 shares of Brush Engineering at the market price. If the commission broker reaches the Brush Engineering trading post and no seller is present, the broker can’t wait for one to appear since he has other orders to execute. Fortunately, the broker can buy the shares from the specialist who acts as a dealer—in this case buying for and selling from his own inventory. To ensure ability to maintain continuous markets, the exchange requires a specialist to have \$500,000 or enough capital to own 5,000 shares of the assigned stock, whichever is greater. At times, specialists are under tremendous pressure to make a market for securities. A classic case occurred when President Reagan was shot in the 1980s, and specialists stabilized the market by absorbing wave after wave of sell orders.

The New York Stock Exchange keeps statistics on specialist performance and their ability to maintain price continuity, quotation spreads, market depth, and price stabilization. These data are given in Table 2-8 on page 43. Price continuity is measured by the size of the price variation in successive trades. Column 1 is the percentage of transactions with no change in price or a minimum change of $\frac{1}{8}$ of a dollar. Column 2 presents the percentage of the quotes where the bid and asked prices were equal to or less than $\frac{1}{4}$ of a point. Market depth (Column 3) is displayed as a percentage of the time that 1,000 to 3,000 shares of volume failed to move the price of the stock more than $\frac{1}{8}$ of a point. Finally, the NYSE expects specialists to stabilize the market by buying and selling from their own accounts against the prevailing trend. This is measured in Column 4 as the percentage of shares purchased below the last different price and the percentage of shares sold above the last different price.

While these statistics are not 100 percent, it would be quite unreasonable for us to expect specialists to maintain that kind of a record in all types of markets. However, some critics of the specialist system on the NYSE think these performance measures could be improved by having more than one specialist for each stock. Many market watchers believe competing dealers on the over-the-counter market provide more price stability and fluid markets than the NYSE specialist system.

TABLE 2–8 Market Quality and Specialists' Stabilization

NYSE Market Quality and Specialists' Stabilization, 1989–2000				
	Price Continuity	Quotation Spreads	Market Depth*	Stabilization Rate
2000	97.2%	92.4%	91.7%	81.1%
1999	98.1	94.2	88.4	82.8
1998	97.4	92.2	85.3	82.7
1997	97.7	93.5	86.9	80.0
1996	98.2	93.6	90.0	75.0
1995	98.2	93.1	90.8	74.6
1994	97.4	90.8	88.6	76.3
1993	97.1	88.9	88.3	77.6
1992	96.4	86.4	87.1	78.3
1991	95.9	84.6	85.5	80.9
1990	95.8	84.5	84.4	83.1
1989	95.9	81.5	87.1	86.0

*After 1988 based on 3,000 shares of volume—all other years on 1,000 shares of volume.

Source: NYSE Website, Summary 2000.

Somewhat in response to these criticisms, the New York Stock Exchange created computer systems that help the specialists manage order inflows more efficiently. **Super Dot** (designated order transfer system) allows NYSE member firms to electronically transmit all market and limit orders directly to the specialist at the trading post or the member trading booth. This order routing system takes orders and communicates executions of the orders directly back to the member firm on the same electronic circuit.

As a part of Super Dot, specialists are informed through OARS (Opening Automated Report Service) of market orders received before the opening bell. This preopening knowledge allows specialists to know whether the supply and demand for a stock is in balance because OARS pairs the buy and sell orders. If a sell imbalance exists, the specialist knows before opening that the price will open lower than yesterday's closing price.

The NYSE reports that 98.5 percent of all market orders on Super Dot were received, processed, and reported back to the originator within two minutes. Another feature of Super Dot that greatly aids the specialist is the **Electronic Book**. This database covers stocks listed on the NYSE and keeps track of limit orders and market orders for the specialist. You can imagine the great improvement in recording, reporting, and error elimination over the old manual entry in the "specialist's book."

OTHER ORGANIZED EXCHANGES

The American Stock Exchange

The American Stock Exchange trades in smaller companies than the NYSE, and except for one dually listed company on the NYSE in 1983, the stocks traded on the AMEX are different from those on any other exchange. Because many of the small



Quoting Common Stock Prices in Decimals

For years the tradition on the New York Stock Exchange and other U.S. markets was to quote stock prices in eighths of a point or \$0.125. This tradition applies to the bid and ask prices for stocks. For example, the specialist on the NYSE or the dealer on Nasdaq will quote a bid price of $32\frac{1}{8}$ and an asked price of $32\frac{1}{4}$. In other words, the specialist stands ready to buy 100 shares at the bid price of \$32.125 and to sell 100 shares at the asked price of \$32.25. The $\frac{1}{8}$ (\$0.125) difference between the bid and the asked price is called the spread. The spread is the profit made by the specialist or the dealer if they can buy and sell 100 shares at the quoted bid-ask prices.

On over-the-counter markets where stocks of some small companies trade between \$1 and \$5 per share, these lower priced stocks' bid and ask prices are often quoted in sixteenths (\$0.0625) and occasionally in thirty-seconds (\$0.03125). Additionally, quotes in thirty-seconds are also found in the markets for U.S. Treasury securities. Because the U.S. government bond markets are so competitive and trade in such large quantities, the small spread does not necessarily translate into small commissions. A \$1 million U.S. Treasury bond trade at a $\frac{1}{32}$ spread would be a profit of \$312.50 to the dealer. As you can see, even turning fractions into decimals doesn't give very round numbers.

Traditions often take a long time to die, but the Securities and Exchange Commission gave the major U.S. stock markets until April 9, 2001, to convert the pricing of stocks and options to decimals. In August 2000 seven NYSE issues began pricing in decimals and *The Wall Street Journal* started quoting prices in decimals by rounding off $\frac{1}{8}$ to \$0.13 and $\frac{3}{8}$ to \$0.38 and so forth. The number of companies quoting in decimals was increased to 50 companies by September 25, 2000, and now a tradition that was in use since the 1700s will no longer be the standard practice.

The judgment on decimalization is still inconclusive. What are the advantages and disadvantages of trading stocks in decimals? The proponents of this plan think that decimals are less confusing and that as markets become more global, decimals are more

consistent with other world markets. Decimals are easier to understand and have less mystery to the average individual trader. From the point of view of the individual who trades stocks, a spread in decimals is more likely to provide a smaller spread and therefore allow investors the ability to sell at higher prices or buy at lower prices. In other words, the investor can buy and sell at a smaller spread.

The negative side of this proposal is that dealers and specialists will have smaller spreads and therefore smaller profits on every trade. For actively traded stocks with large volumes, it is hoped that the lost profits on the smaller spread will be made up with higher volume. For thinly traded stocks (those with small volumes), there is some concern that the markets will become less liquid because market makers will decide not to make markets in these stocks because of the small profit opportunities. If this happens, markets for some stocks could become less efficient. On the other hand, spreads have always been higher on less liquid (not actively traded) securities, and there is no reason that the spread could not be \$0.12 or \$0.13—close to the traditional $\frac{1}{8}$.

By February 2001, the transition to decimals, while not totally complete, was drawing complaints from institutional traders. Their concern was that specialists were able to step in front of institutional traders by offering a penny more or less and therefore were able to skim a little profit for themselves before the institutions bought the stock from the specialist in large blocks. By September 2001, spreads had fallen by about 30 to 40 percent on actively traded stocks, which in fact benefited the investors and penalized the specialists. One unforeseen complaint was by some technical analysts who complained that the advance-decline breadth of the market measures was no longer giving meaningful signals because a move of one cent could cause a stock to end up on the advance list *or* the decline list. They felt that one cent was not a meaningful price change. Over time we will find more surprises, but so far the system seems to have more benefits than disadvantages.

companies on the AMEX do not meet the liquidity needs of large institutional investors, the AMEX has been primarily a market for individual investors.

In an attempt to differentiate itself from the NYSE, the AMEX traded warrants in companies for many years before the NYSE allowed them. Even now, the AMEX has warrants listed for stocks trading on the NYSE. The AMEX also trades put and call options on approximately 200 stocks, with most of the underlying common stocks being listed on the NYSE. This market has been a stabilizing force for the AMEX.

To become more innovative and to attract more business, the American Stock Exchange announced plans in 1991 to trade options in foreign stock indexes. By 1997 the AMEX was trading put and call options on the indexes of the stock markets of Mexico, Hong Kong, and Japan. Additionally they also made markets in puts and calls for specific industry indexes such as computer technology, consumer companies, high-tech Internet companies, and pharmaceutical companies. After merging with Nasdaq in the late 1990s, it appears that a divorce is on the horizon.

The Chicago Board Options Exchange

Trading in call options started on the Chicago Board Options Exchange (CBOE) in April 1973 and proved very successful. The number of call options listed grew from 16 in 1973 to more than 500 in 2000. A **call option** gives the owner the right to buy 100 shares of the underlying common stock at a set price for a certain period. The CBOE standardized call options into three-month, six-month, and nine-month expiration periods on a rotating monthly series. Other sequences have since been developed. The CBOE and the AMEX currently have many options that are dually listed, and the competition between them is fierce. The two exchanges also trade put options (options to sell). A number of smaller regional exchanges also provide for option trading, and the New York Stock Exchange sold its option business to the CBOE in 1997.

A new wrinkle in the options game has been options on stock market indexes or industry groupings (called subindexes). The CBOE offers puts and calls on the Standard & Poor's 500 Index and the Dow Jones Industrial Average; the AMEX has options on the AMEX Market Value Index, and so on. More about these markets will be presented in Chapter 17.

Futures Markets

Futures markets have traditionally been associated with commodities and, more recently, also with financial instruments. Purchasers of commodity futures own the right to buy a certain amount of the commodity at a set price for a specified period. When the time runs out (expires), the futures contract will be delivered unless sold before expiration. One major futures market is the Chicago Board of Trade, which trades corn, oats, soybeans, wheat, silver, plywood, and Treasury bond futures. There are also other important futures markets in Chicago, Kansas City, Minneapolis, New York, and other cities. These markets are very important as hedging markets and help set commodity prices. They are also known for their wide price swings and volatile speculative nature.

In recent years, trading volume has increased in foreign exchange futures such as the West German mark, Japanese yen, and British pound as well as in Treasury bill and Treasury bond futures. One important product having a direct

effect in the stock market is the development of futures contracts on stock market indexes. The Chicago Mercantile Exchange, Chicago Board of Trade, New York Futures Exchanges (a division of the NYSE), and the Kansas City Board of Trade have all developed contracts in separate market indexes such as the Standard & Poor's 500, the Dow Jones Industrial Average, and the Value Line Index. Market indexes will be presented in the following chapter, and we will spend more time discussing futures markets in Chapters 16 and 17.

OVER-THE-COUNTER MARKETS

Unlike the organized exchanges, the over-the-counter (OTC) markets have no central location where securities are traded. Being traded over-the-counter implies the trade takes place by telephone or electronic device and dealers stand ready to buy or sell specific securities for their own accounts. These dealers will buy at a bid price and sell at an asked price that reflects the competitive market conditions. By contrast, brokers on the organized exchanges merely act as agents who process orders. The National Association of Securities Dealers (NASD), a self-policing organization of dealers, requires at least two market makers (dealers) for each security, but often there are 5 or 10 or even 20 for government securities. As previously mentioned, the multiple-dealer function in the over-the-counter market is an attractive feature for many companies in comparison to the single specialist arrangement on the NYSE and other organized exchanges.

OTC markets exist for stocks, corporate bonds, mutual funds, federal government securities, state and local bonds, commercial paper, negotiable certificates of deposits, and various other securities. These securities make the OTC the largest of all markets in the United States in dollar terms.

In the OTC market, the difference between the bid and asked price is the spread; it represents the profit the dealer earns by making a market. For example, if XYZ common stock is bid 10 and asked 10.50, this simply means the dealer will buy at least 100 shares at \$10 per share or will sell 100 shares at \$10.50 per share. If prices are too low, more buyers than sellers will appear, and the dealer will run out of inventory unless he raises prices to attract more sellers and balances the supply and demand. If his price is at equilibrium, he will match an equal number of shares bought and sold, and for his market-making activities, he will earn 50 cents per share traded.

Nasdaq

Nasdaq stands for the National Association of Securities Dealers Automated Quotations system. This system is linked by a computer network and provides up-to-the-minute quotations on approximately 6,000 of the OTC stocks traded on the Nasdaq system. These Nasdaq stocks are divided between national market issues and small cap issues. Each is presented separately in *The Wall Street Journal* and other newspapers.¹

¹Publicly traded firms that are not listed on organized exchanges or by the Nasdaq are normally not quoted in newspapers but may be shown on special pink sheets put out by investment houses.

As the name implies, the national market issues represent larger Nasdaq companies that must meet higher listing standards than the small cap market. The standards are not as high as those on the NYSE but cover most of the same areas: net tangible assets, net income, pretax income, public float (shares outstanding in the hands of the public), operating history, market value of the float, a minimum share price, the number of shareholders, and the number of market makers. The web exercise at the end of the chapter will take you through the actual listing requirements of both the NYSE and Nasdaq.

Because the listing requirements are lower than those of the NYSE, many small public companies begin trading on the Nasdaq and many decide to stay there even after they far exceed the requirements for the NYSE. Companies such as Intel, Microsoft, Oracle, and Sun Microsystems trade on the Nasdaq Stock Market; as the names may suggest, this market is popular with technology stocks.

www.intel.com
www.microsoft.com
www.oracle.com
www.sun.com

Nasdaq is currently in the middle of several significant transformations. It is changing its structure from a fully owned subsidiary of NASD (National Association of Security Dealers) to a privately held company. By August 2001, the NASD's stake in Nasdaq had been reduced to less than 30 percent. Nasdaq intends to eventually become a publicly traded company when market conditions make sense. The Nasdaq Stock Market is also registering as a securities exchange under the federal securities laws, which is primarily a legal move. The actual operations of the market will stay the same.

Over the last decade, the Nasdaq Stock Market has taken its place in world equity markets based on its dollar volume of trading activity. The NYSE is first followed by Nasdaq, London, and then Tokyo. This is a dramatic change for a market that was in fifth place in 1990. The U.S. equity market for small-growth companies boomed in the 1990s, and this helped to increase Nasdaq's volume. Additionally, its multiple-dealer system, efficient computerized quotation systems, and enhanced reporting capability are other reasons for the increased competitive nature. To add to its worldwide status, Nasdaq has begun to create Nasdaq stock markets in foreign cities such as Hong Kong.

Debt Securities Traded Over-the-Counter

Debt securities also trade over-the-counter. Actually, government securities of the U.S. Treasury provide the largest dollar volume of transactions on the OTC and account for billions of dollars in trades each week. These securities are traded by government securities dealers who are often associated with a division of a large financial institution, such as a New York, Chicago, or West Coast money market banks or a large brokerage house such as Merrill Lynch. These dealers make markets in government securities, such as Treasury bills and Treasury bonds, or federal agency securities such as Federal National Mortgage Association issues.

Municipal bonds of state and local governments are traded by specialized municipal bond dealers who, in most cases, work for large commercial banks. Commercial paper, representing unsecured, short-term corporate debt, is traded directly by *finance* companies, but a large portion of commercial paper sold by *industrial* companies is handled by OTC dealers specializing in this market. Every security has its own set of dealers and its own distribution system. On markets where large dollar trades occur, the spread between the bid and asked price could be as little as $\frac{1}{16}$ or $\frac{1}{32}$ of \$1 per \$1,000 of securities.

The Third and Fourth Markets: Part of Over-the-Counter Trading

Before the mid-1970s, commissions on the NYSE were fixed. This meant the same commission schedule applied to all transactions of a given size, and one broker could not undercut the other on the New York Stock Exchange. Several OTC dealers, most notably Weeden & Co., decided to make a market in about 200 of the most actively traded NYSE issues and to do this at a much smaller cost than the NYSE commission structure would allow. This trading in NYSE-listed securities in over-the-counter markets became known as the **third market**. The third market diminished in importance for a while as the NYSE became more price competitive. However, in the 1980s and throughout the 1990s, this market has made a comeback. One advantage of the OTC market is that more than one specialist trades a security, making trading flexibility greater. For example, ITT Corporation reported a significant dividend cut and lower earnings after the NYSE was closed, but Jefferies Corporation, an over-the-counter trading firm, traded 3 million shares by the time the NYSE opened the next morning. Another example occurred when the Justice Department announced the breakup of AT&T on a Friday. MCI, a competitor in communications, traded OTC, while AT&T traded on the NYSE. AT&T trading was halted until Monday because the specialist was unable to stabilize the market, whereas the 29 market makers in MCI stock in the OTC market transacted more than \$75 million of securities before AT&T opened on Monday morning. At the time of this writing, much discussion is being held at the New York Stock Exchange about trading hours, revising rules, and generally competing more effectively with the third market and the OTC.

The **fourth market** is that market in which institutions trade between themselves, bypassing the middleman broker (replacing the broker with a computer). Much of the trading in this market is done through Instinet (Institutional Networks Inc.). Instinet provides a low-cost automated stock trading system, with transactions available on more than 3,500 securities, both listed and over-the-counter. The system allows banks, insurance companies, and mutual and pension funds to enter an order over a computer terminal. The computer searches a nationwide trading network until it finds the trader with the best price, then the computer holds the order 30 seconds so that another trader may offer a better price.

ELECTRONIC COMMUNICATION NETWORKS

A new competitor on the block for the exchanges and Nasdaq are the electronic communication networks, or ECNs. These are electronic trading systems that automatically match buy and sell orders at specified prices. ECNs are also known as alternative trading systems (ATSS) and have been given SEC approval to be more fully integrated into the national market system by choosing to either act as a broker-dealer or as an exchange. An ECN's subscribers can include retail and institutional investors, market makers, and broker-dealers. If a subscriber wants to buy a stock through an ECN, but there are no sell orders to match the buy order, the order cannot be executed. The ECN can wait for a matching sell order to arrive, or if the order is received during normal trading hours, the order can be routed to another market for execution. Some ECNs will let their subscribers see their entire order books, and some will even make their order books available on

the web. ECNs bid and asked prices are included in Nasdaq's quotation montage with the best bid and asked price being shown. This helps create more efficient and transparent market prices and demonstrates how Nasdaq's open architecture allows firms with different computer technologies to compete in the same market.

Links to Other Markets ECNs lower the cost of trading by creating better executions and more price transparency, and they are able to trade after the markets are closed in what is known as "after-hours trading." There are nine ECNs, with the four largest being Instinet (www.instinnet.com) owned by Reuters, Archipelago (www.tradearca.com), REDIBook (www.redibook.com), and Island (www.isld.com). These four accounted for 85 percent of the ECN trading volume during the first half of 2001. For example, in terms of Nasdaq volume, as of June 2001, Island had 600 subscribers and executed almost one out of every six trades on Nasdaq, or 16.2 percent of Nasdaq's volume. The other five ECNs are Bloomberg Tradebook (www.bloomberg.com/products/trdbk.html), Brut/Strike (www.ebrut.com), NexTrade (www.nestrade.org), Attain (www.attain.com), and MarketXT (www.marketxt.com). These nine ECNs collectively accounted for approximately 23 percent of the 2000 Nasdaq volume but only 3 percent of the NYSE volume. The disparity between markets occurs because ECNs were not able to trade NYSE-listed stocks through the Inter-market Trading System (ITS) that links the NYSE to the NASD and regional exchanges. The ECNs are, however, linked to Nasdaq and can display their best orders for Nasdaq securities in the Nasdaq system. On August 8, 2000, Archipelago began trading 11 exchange-listed securities and quickly expanded the list. With the repeal of Rule 390, the New York Stock Exchange has given ECNs the right to make markets in all NYSE issues. (Rule 390 prohibited off-exchange trading of listed NYSE securities.) It is expected that each ECN will take advantage of this rule change.

Shortly after revoking Rule 390 the New York Stock Exchange announced plans to develop its own Internet-based electronic stock trading system. This is a defensive move to protect it from the expected loss of volume as more trading on the NYSE moves to ECNs. If the ECNs can capture the same amount of volume from the NYSE as they did from Nasdaq, the loss would definitely be felt. In an attempt to compete after hours, the NYSE will also use its electronic trading system to extend its trading hours into the evening during 2001.

After-Hours Trading Trading after the markets have closed is not something new. Both the New York Stock Exchange and the American Stock Exchange have the ability to trade after the 4.00 P.M. Eastern Standard Time close. The NYSE has two crossing sessions that allow trades to be made until 6:30, when the consolidated tape is turned off. Investors trading after the market closes subject themselves to the risk of price volatility and low liquidity. With the advent of ECNs, trading after hours has in fact increased liquidity, and because ECNs usually take orders at a set price to buy and sell, the order process takes some of the risk out of the business. At first ECNs traded several hundred thousand shares after hours, but by summer 2001, they were trading millions of shares after hours. Using consolidated tape data until 6:30 P.M. an SEC study found that the New York Stock Exchange accounts for most of the after-hours volume in NYSE stocks. However, in the top 10 stocks traded on the Nasdaq after hours, ECNs accounted for between 20 to 66 percent of share volume on the various days of the SEC study.

INSTITUTIONAL TRADING

Financial institutions, such as banks, pension funds, insurance companies, and investment companies (mutual funds), have always invested and traded in securities. However, the growth of these institutions and their participation in the capital markets has been rather stable for the past 20 years. In fact, if we look at the last column of Table 2-9 on institutional trading activity, we can see that block trades of 10,000 shares or more carried out by financial institutions has averaged close to 53 percent since 1984. The highest percentage was 57 percent in 1995, and the lower percentage was 48.7 percent in 1998. It doesn't show up in the table, but in 1965, block trades only accounted for 3.1 percent of total trades.

Over this same time, individual investors have been putting their money into the market through intermediaries such as mutual funds, pension funds, profit-sharing plans, and individual retirement accounts (IRAs). Individuals who directly invest in the stock market have gone up and down with consumer sentiment and market returns. In 1987 the market crash scared many individual investors out of the market, but they came back during the bull market of the 1990s. This increased participation by the individual investor was made easier by the rise of electronic trading on the Internet with prices as low as \$5 per trade. Brokerage

TABLE 2-9 NYSE Block Transactions (10,000 shares or more)

	Transactions		Shares (thousands)	Percentage of Reported Volume
	Total	Daily Average		
1979	97,509	385	2,164,726	26.5%
1980	133,597	528	3,311,132	29.2
1981	145,564	575	3,771,442	31.8
1982	254,707	1,007	6,742,481	41.0
1983	363,415	1,436	9,842,080	45.6
1984	433,427	1,713	11,492,091	49.8
1985	539,039	2,139	14,222,272	51.7
1986	665,587	2,631	17,811,335	49.9
1987	920,679	3,639	24,497,241	51.2
1988	768,419	3,037	22,270,680	54.5
1989	872,811	3,464	21,316,132	51.1
1990	843,365	3,333	19,681,849	49.6
1991	981,077	3,878	22,474,383	49.6
1992	1,134,832	4,468	26,069,383	50.7
1993	1,477,859	5,841	35,959,117	53.7
1994	1,654,505	6,565	40,757,770	55.5
1995	1,963,889	7,793	49,736,912	57.0
1996	2,348,457	9,246	58,510,323	55.9
1997	2,831,321	11,191	67,832,129	50.9
1998	3,518,200	13,961	82,656,678	48.7
1999	4,195,721	16,650	102,293,458	50.2
2000	5,529,152	21,941	135,772,004	51.7

Source: NYSE Fact Book, 2001, www.nyse.com.

www.schwab.com
www.fidelity.com
www.etrade.com
www.ameritrade.com

firms such as Charles Schwab, Fidelity Investments, E-Trade, Ameritrade, and others offered small investors low-cost trades. This was a great benefit. As is always the case, bear markets and recessions cause individuals to move to the sidelines, and 2000 and 2001 were no different. However, with the demographics of the baby boom generation reaching the high-income-savings years, it is expected that the individual investor will continue to have a significant place in our stock markets.

THE NATIONAL MARKET SYSTEM AND THE FUTURE

Since 1975 the future of the markets was dictated by government regulations, institutional investors, and technology. A national market system was mandated by Congress in the Securities Amendments Act of 1975. This was envisioned as a coordinated national system of security trading with no barriers between the various exchanges or the over-the-counter markets. One of the first links between these markets was the composite tape that reflects trades on all exchanges for listed NYSE companies. This was shown on page 40 in Table 2-7. The composite tape helps create competition between specialists in different markets, making markets in the same stock through dual trading on the regional markets.

The future becomes the past quickly and it is sometimes easier to go back in time and look forward. If we consider the changes in the use of computer technology and the rise of electronic trading systems through ECNs and Internet-based trading, we can see that the future has arrived. How the market will evolve over the next decade is always an interesting question that depends on many things, including regulation.

Our view is that the electronic markets will continue to make inroads on traditional markets such as the New York Stock Exchange. There will be more international companies seeking capital across their home country's borders, and this need for global capital will stimulate global markets to merge. There has already been talk of a merger between Nasdaq and the London market. As markets and exchanges such as Nasdaq and the NYSE have publicly traded stock, they could be purchased by other international exchanges unless, of course, the government does not allow cross-border mergers of exchanges.

Individual investors will trade online through the Internet not only on discount broker sites such as E-Trade and Ameritrade, but also on the site of mainline old retail brokers such as Merrill Lynch and Salomon Smith Barney. This is already happening, but the volume will increase. Technology will bring the costs of trading even lower, and market volumes will continue to rise. Global companies such as Sony, McDonalds, Coca-Cola, and Daimler-Chrysler will trade 24 hours a day on the world's exchanges. Most of what we predicted in previous editions of this text has already occurred; only time will tell if the trend will extend.



REGULATION OF THE SECURITY MARKETS

Organized securities markets are regulated by the **Securities and Exchange Commission (SEC)** and by the self-regulation of the exchanges. The OTC market is controlled by the National Association of Securities Dealers. Three major laws govern the sale and subsequent trading of securities. The **Securities Act of 1933** pertains to new issues of securities, while the **Securities Exchange Act of 1934** deals with trading in the securities markets. The **Securities Acts Amendments**

of 1975 is the last major piece of legislation, and its main emphasis is on a national securities market. The primary purpose of these laws was to protect unwary investors from fraud and manipulation and to make the markets more competitive and efficient.

Securities Act of 1933

The Securities Act of 1933 was enacted after congressional investigations of the abuses present in the securities markets during the 1929 crash and again in 1931. The act's primary purpose was to provide full disclosure of all pertinent investment information whenever a corporation sold a new issue of securities. It is sometimes referred to as the "truth in securities" act. The Securities Act has several important features:

1. All offerings except government bonds and bank stocks that are to be sold in more than one state must be registered with the SEC.²
2. The registration statement must be filed 20 days in advance of the date of sale and include detailed corporate information. If the SEC finds the information misleading, incomplete, or inaccurate, it will delay the offering until the registration statement is corrected. The SEC in no way certifies that the security is fairly priced but only that the information seems to be factual and accurate. Under certain circumstances, the previously mentioned shelf registration is being used to modify the 20-day waiting period concept.
3. All new issues of securities must be accompanied by a *prospectus*, a detailed summary of the registration statement. Included in the prospectus is usually a list of directors and officers; their salaries, stock options, and shareholdings; financial reports certified by a certified public accountant (CPA); a list of the underwriters; the purpose and use for the funds to be provided from the sale of securities; and any other reasonable information that investors may need to know before they can wisely invest their money. A preliminary prospectus may be distributed to potential buyers before the offering date, but it will not contain the offering price or underwriting fees. It is called a red herring because stamped on the front in red letters are the words "Preliminary Prospectus."
4. Officers of the company and other experts preparing the prospectus or registration statement can be sued for penalties and recovery of realized losses if any information presented was fraudulent or factually wrong or if relevant information was omitted.

Securities Exchange Act of 1934

This act created the Securities and Exchange Commission to enforce the securities laws. It was empowered to regulate the securities markets and those companies listed on the exchanges. Specifically, the major points of the 1934 act are as follows:

²Actually, the SEC did not come into existence until 1934. The Federal Trade Commission had many of these responsibilities before the formation of the SEC.

1. Guidelines for insider trading were established. Insiders must hold securities for at least six months before they can sell them. This is to prevent them from taking quick advantage of information that could result in a short-term profit. All short-term profits were payable to the corporation. Insiders were generally thought to be officers, directors, major stockholders, employees, or relatives of key employees. In the last two decades, the SEC widened its interpretation to include anyone having information that was not public knowledge. This could include security analysts, loan officers, large institutional holders, and many others who had business dealings with the firm.
2. The Federal Reserve Board of Governors became responsible for setting margin requirements to determine how much credit one had available to buy securities.
3. Manipulation of securities by conspiracies between investors was prohibited.
4. The SEC was given control over the proxy procedures of corporations (a proxy is an absent stockholder vote).
5. In its regulation of companies traded on the markets, it required certain reports to be filed periodically. Corporations must file quarterly financial statements with the SEC, send annual reports to the stockholders, and file 10-K reports with the SEC annually. The 10-K report has more financial data than the annual report and can be very useful to an investor or loan officer. Most companies will now send 10-K reports to stockholders on request. The SEC also has company filings available on the Internet under its retrieval system called EDGAR.
6. The act required all securities exchanges to register with the SEC. In this capacity, the SEC supervises and regulates many pertinent organizational aspects of exchanges such as listing and trading mechanics.

The Securities Acts Amendments of 1975

The major focus of the Securities Acts Amendments of 1975 was to direct the SEC to supervise the development of a national securities market. No exact structure was put forth, but the law did assume that any national market would make extensive use of computers and electronic communication devices. Additionally, the law prohibited fixed commissions on public transactions and also prohibited banks, insurance companies, and other financial institutions from buying stock exchange memberships to save commission costs for their own institutional transactions. This is a worthwhile addition to the securities laws since it fosters greater competition and more efficient prices.

Other Legislation

In addition to these three major pieces of legislation, a number of other acts deal directly with investor protection. For example, the Investment Advisor Act of 1940 is set up to protect the public from unethical investment advisers. Any adviser with more than 15 public clients (excluding tax accountants and lawyers) must register with the SEC and file semiannual reports. The Investment Company Act of 1940 provides similar oversight for mutual funds and investment companies dealing with small investors. The act was amended in 1970 and currently gives the NASD authority to supervise and limit commissions and investment advisory fees on certain types of mutual funds.

Another piece of legislation dealing directly with investor protection is the Securities Investor Protection Act of 1970. The **Securities Investor Protection Corporation (SIPC)** was established to oversee liquidation of brokerage firms and to insure investors' accounts to a maximum value of \$500,000 in case of bankruptcy of a brokerage firm. It functions much the same as the Federal Deposit Insurance Corporation. SIPC resulted from the problems encountered on Wall Street from 1967 to 1970 when share volume surged to then all-time highs, and many firms were unable to process orders fast enough. A back-office paper crunch caused Wall Street to shorten the hours the exchanges were formally open for new business, but even this didn't help. Investors lost large sums, and for many months, they were unable to use or get possession of securities held in their names. Even though SIPC insures these accounts, it still does not cover market value losses suffered while waiting to get securities from a bankrupt brokerage firm.

Insider Trading

The Securities Exchange Act of 1934 established the initial restrictions on insider trading. However, over the years, these restrictions have often proved to be inadequate. As previously indicated, the definition of *insider* may go beyond officers, directors, and major stockholders to include anyone with special insider knowledge. Both the Congress and the SEC are attempting to grapple with the issue of making punitive measures severe enough to discourage the illegal use of non-public information for profits.³ Current and future legislation is likely to include tougher civil penalties and stiffer criminal prosecution. Also, the penalties for improper action will expand beyond simple recovery of profits to a penalty three or more times the profits involved.

The 1980s saw a rash of insider trading scandals involving major investment banking houses, traders, analysts, and investors. Ivan Boesky and Dennis Levine were the first of the well-known investors to end up in jail, and Michael Milken was not far behind. These insider trading scandals have plagued Wall Street and tarnished its image as a place where investors can get a fair deal.

On balance, all the legislation we have discussed has tended to increase the confidence of the investing public. In an industry where public trust is so critical, some form of supervision, whether public or private, is necessary and generally accepted.

Program Trading and Market Price Limits

Program trading is identified by some market analysts as the primary culprit behind the 508-point market crash on October 19, 1987. **Program trading** simply means computer-based trigger points are established in which large volume trades are initiated by institutional investors. For example, if the Dow Jones Industrial Average (or some other market measure) hits a certain point, a large sale or purchase may automatically occur. When many institutional investors are using program trading simultaneously, this process can have a major cumulative effect on the market. This was thought to be the case not only in the 1987 crash but also for many other highly volatile days in the market.

³Insiders, of course, may make proper long-term investments in a corporation.

The “See-Through” Wall between Security Analysts and Investment Bankers

The SEC and other related regulatory agencies have some of the toughest laws in the United States. Companies and executives that falsely report data can expect to face heavy penalties and even prison time. Just ask famed billionaire Michael Milken, who served a number of years in a federal jail for fraud and illegal insider trading. Much of the tough legislation dates back to the unregulated securities market abuses prior to the Great Market Crash of 1929 and the subsequent passage of the Securities Act of 1933 and the Securities Exchange Act of 1934.

Before you get too satisfied with the thought that the stock market represents an appropriately regulated playing field, though, consider the fact that there is a new form of abuse that our legislative forefathers of the 1930s never even considered—the relationship between security analysts who supposedly analyze and evaluate companies and investment bankers who help sell stock to the public.

Whether it's at Merrill Lynch, Goldman Sachs, Lehman Brothers, or elsewhere, the security analysts who work for the firm are supposed to be free and independent of the investment bankers who also work for the firm.

What this basically means is that the security analyst's responsibility is to provide an unbiased appraisal of the firm's operations and future outlook. Investors have a right to expect that analysts take a hard-nosed approach in “telling it like it is” and “letting the chips fall where they may.” If the company is employing questionable accounting practices or failing to divulge problems in meeting debt obligations, it is up to the security analyst to bring this information to the public's attention, much as an investigative reporter for a newspaper would.

The investor banker, on the other hand, is supposed to bring new business and revenues to the firm. They are intended to be “homers” who root for and support the firm's clients. They are somewhat analogous to a major law firm that represents an important client. One of the investment banker's most important functions is to do initial public offerings (IPOs) for clients in which firms sell their stock to the public for the first time. The investment banker puts the deal together and promotes the issue, including doing “road shows” with the client.

The abuse is that the security analyst has become more and more a part of the home team in promoting the new issue rather than analyzing the stock and giving an unbiased viewpoint. In the wild dot-com IPO market of the late 1990s, security analysts often went so far as to take a piece of the action, thereby insuring a critical report on their part would put a hole in their own pocketbook.

In an August 1, 2001, story in *The Wall Street Journal*, Laura Unger, the SEC's acting chairwoman, was quoted as saying: “Brokerage firms repeatedly obscured the supposed line that separates analysts, who work on behalf of investors, from investment bankers, who work to woo corporate clients.” She further said, “Analysts routinely got involved in possible mergers, acquisitions and corporate-finance deals, and participated in corporate road shows. The firms also told the SEC that analysts' pay is largely based on the profitability of the investment-banking unit, and seven firms said that investment bankers provide input into the bonuses analysts receive.”*

*Jeff D. Opydyke, “Many Analysts Found to Invest in Companies They Covered.” *The Wall Street Journal*, August 1, 2001, pp. C1, C10.

Rule 80A After the crash of 1987, several studies of the role of program trading in creating market volatility were undertaken. In response to concerns that program trading might create market volatility, the NYSE instituted **Rule 80A**. Under Rule 80A as amended by the SEC, all daily up or down movements in the Dow Jones Industrial Average (DJIA) of 50 points or more cause a tick test to go into effect.⁴ In down markets, sell orders can only be executed on an increase in price

⁴The rule specifically applies to stocks in the Standard & Poor's 500 Stock Index to protect against index arbitrage, that is, trading in stocks and stock index futures at the same time in order to profit from price differences between the two.

(a plus tick) and buy orders can only be executed on a decrease in price (a minus tick).

Circuit Breakers In 1989 **circuit breakers** were also put in place; circuit breakers shut down the market for a period of time if there is a dramatic drop in stock prices. Under the initial provisions implemented by the NYSE, the exchange agreed to initiate a 30-minute halt in trading if the Dow Jones Industrial Average went down by 250 points during a given day and a one-hour halt in case of a 400-point decline.

As the market continued to go up during the 1990s, the circuit breakers were raised in February 1997 to a 350-point decline for a 30-minute halt and a 550-point decline for a one-hour break. Both circuit breakers were triggered by the 500-point-plus decline on October 27, 1997. The SEC has informed the New York Stock Exchange that it expects the exchange to continually evaluate the size of the circuit breakers as market conditions change.

Other markets, such as the Nasdaq, the American Stock Exchange, and the Chicago Board of Trade (for stock index futures), have also agreed to discontinue trading if there is a halt on the NYSE.

exploring the web



Website Address	Comments
www.nyse.com	Provides information on regulations and market operations
www.nasdaq.com	Provides information about the Nasdaq market
www.cboe.com	Provides information about options traded on the Chicago Board Options Exchange
www.ipo.com	Contains information, FAQs, and glossary about initial public offerings
www.individualinvestor.com	Contains information about current market conditions and stock information

SUMMARY

A smoothly functioning market is one that is efficient and provides liquidity to the investor. The success of a primary market, in which new issues are generally underwritten by investment bankers, is highly dependent on the

presence of an active resale (secondary) market.

Secondary markets may be established in the form of an organized exchange or as an over-the-counter market. The predominant organized

market is the New York Stock Exchange, but increasing attention is being directed to various other markets. The possibility of a true national market system looms as a consideration for the future, with the completed first step being the development of a consolidated tape among different markets. Nasdaq (National Association of Securities Dealers Automated Quotations system) has done much to improve the communications network in the over-the-counter market and bring competition to the organized exchanges. The creation of ECNs will continue to change the way investors trade.

The dominant role of the institutional investor has had an enormous impact on the markets with higher stock turnover and increasing market

volatility. A major consolidation of market participants has also occurred on Wall Street.

The term *market* is broadening with different types of new investment outlets as witnessed by the expansion of options, futures contracts on stock indexes, options on futures, and many other commodity trading mechanisms. Of equal importance, the term *market* must be viewed from a global viewpoint with securities trading throughout the world on a 24-hour basis.

Finally, problems or imperfections in the marketplace during critical time periods have led to a wide array of securities legislation. The legislation in the 1930s regulated the securities markets and created the SEC. Subsequent laws have dealt with restructuring the market and investor protection.

KEY WORDS AND CONCEPTS

best efforts	31	market	29	Securities and Exchange Commission (SEC)	51
call options	45	Nasdaq	46	Securities Exchange Act of 1934	51
circuit breakers	56	odd-lot dealer	41	Securities Investor Protection Corporation (SIPC)	54
commission brokers	41	organized exchange	37	sold directly	31
efficient market	29	over-the-counter markets	37	specialists	42
Electronic Book	43	primary markets	30	Super Dot	43
electronic communication networks (ECNs)	37	program trading	54	syndicate	31
floor brokers	41	registered traders	41	third market	48
fourth market	48	Rule 80A	55	underwriting	31
initial public offering (IPO)	36	secondary markets	30		
investment banker	31	Securities Act of 1933	51		
liquidity	29	Securities Acts Amendments of 1975	51		

DISCUSSION QUESTIONS

1. What is a market?
2. What is an efficient market?
3. What is the difference between primary and secondary markets?
4. What is the difference between an investment banker providing an underwriting function and a “best-efforts” offering?
5. What is a private placement?
6. What generally determines how firms are listed in a tombstone advertisement?

7. Briefly describe the participants on an exchange.
8. How do critics think the specialist system on the NYSE might be improved?
9. How is the over-the-counter market different from the organized exchanges?
10. What is the highest priority segment of the OTC market in terms of reporting trading activity?
11. What is the Nasdaq, and what service does it perform?
12. Define a block trade. What does the increase in block trades since 1965 tend to indicate about the nature of investors in the market?
13. Indicate the primary purpose of the Securities Act of 1933. Why was it enacted? Does the SEC certify that a security is fairly priced?
14. How has the definition of an insider (inside trader) expanded over the past two decades?
15. Explain the purpose of the Securities Investor Protection Corporation (SIPC).

CRITICAL THOUGHT CASE

The Securities and Exchange Commission is a federal agency created by Congress through the Securities Exchange Acts of 1933 and 1934 to protect investors. The stock market crash of 1929 and the Great Depression led the U.S. Senate to investigate the regulations of the securities industry. The existing laws were found to be inadequate, thus the formation of the securities industry watchdog, the SEC.

One of the main provisions of the 1933 act was to ensure full disclosure of facts by companies offering securities for sale to the public. Companies must submit a registration statement to the SEC for approval before securities can be sold. These statements contain financial information essential to a complete analysis of the investment at hand. A company prospectus disclosing this information is made available to the public.

Recently, disclosure of this information has posed many problems. As the world markets become increasingly competitive, foreign companies have access to important financial information about U.S. companies. In many cases, this same financial information on foreign companies is not available to U.S. companies. But, if foreign companies want to sell stock in the United States, the SEC requires them to submit the same financial information as U.S. companies. Many foreign companies are reluctant to do this because they believe it would give away their competitive advantage.

With the globalization of the world's securities markets, the New York Stock Exchange feels very strongly that to remain the leader in the industry, foreign securities must be traded in the United States. The NYSE has been attempting to attract major foreign companies for listing on the exchange, but many of these companies do not want to comply with the stringent financial disclosure requirements. If action is not taken quickly to rectify the situation, the NYSE believes it may lose its competitive position as the world's largest stock exchange.

The NYSE has been trying for some time to persuade the SEC to reduce corporate financial disclosure requirements for foreign companies. Although the SEC agrees in principle that it would be advantageous to investors to have foreign stocks listed on the exchange, it is not willing to lessen the disclosure standards for foreign companies. Investors would be at risk if this were allowed.

Questions

- Should the SEC, for the sake of maintaining U.S. competitiveness in the world markets, reduce the disclosure requirements for foreign companies?
- If so, is this fair to U.S. companies and investors?
- What are the consequences to the NYSE and New York City if the exchange is no longer the world leader it once was?

STOCK INVESTOR PRO



Please use your AAI Stock Investor Pro CD to complete the following exercises.

- The Stock Investor Pro database contains companies from the New York Stock Exchange (NYSE), the American Stock Exchange (AMEX), and Nasdaq. Determine the respective number of companies in the database that are listed on each of these markets.
- Determine the average number of shares outstanding and the average market capitalization for the firms in the New York Stock Exchange (NYSE).
 - Determine the average number of shares outstanding and the average market capitalization for the firms of the American Stock Exchange (AMEX).
 - Determine the average number of shares outstanding and the average market capitalization for the firms of the Nasdaq.
- Compare the size of the largest 25 firms from the NYSE, AMEX, and Nasdaq, using the market capitalization for the last fiscal quarter (Q1) as the measure.

WEB EXERCISE

This chapter on capital markets focuses on long-term financing and the various stock markets. Each stock market has its own listing requirements, and this exercise will look at the New York Stock Exchange and Nasdaq listing requirements for comparative purposes. First, go to the New York Stock Exchanges website at www.nyse.com.

- Click on “Listed-Companies” on the upper left side.
- Then, click on “Listing Standards” in the left margin.
- Then, click on “U.S. Standards” across the top and answer the following questions in writing.
 - How many round-lot holders are required to be listed?
 - How many public shares need to be outstanding to be listed?
 - What are the earnings requirements to be listed?
 - What is the average global market capitalization requirement to be listed?
- Now go to the Nasdaq website at www.nasdaq.com.
- Scroll down the home page until you see “About the Nasdaq Stock Market” along the right-hand margin. Under the heading, click on “Listing Information.”
- On the next page, click on “Nasdaq Listing Requirements and Fees.”

7. Now click on “Nasdaq National Market Listing Requirements.” Scroll down and answer the following questions in writing for Standard 1 Initial Listing (first numerical column).
- How many round-lot shareholders are required?
 - How many public shares (float) need to be outstanding?
 - What is the pretax income requirement?
 - What is the market value of public float requirement?

Now write a thorough one paragraph comparison of the New York Stock Exchange and Nasdaq initial listing requirements indicating which is more stringent.

*Public float is similar to market capitalization in 3.d for the NYSE. However, public float only covers shares held by the public and not insiders. For this introductory exercise, we will consider them to be the same.

Note: From time to time, companies redesign their websites, and occasionally a topic we have listed may have been deleted, updated, or moved into a different location. Most websites have a “site map” or “site index” listed on a different page. If you click on the site map or site index, you will be introduced to a table of contents that should aid you in finding the topic you are looking for.

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