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THE STOCK MARKET:

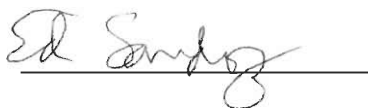
A Simulation in Trade and Investment

An Interactive Qualifying Project Report
submitted to the Faculty
of the

WORCESTER POLYTECHNIC INSTITUTE

in partial fulfillment of the requirements for the
Degree of Bachelor of Science

by



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Approved:



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Abstract

In this stock market simulation initially the stock market and methods of trade were investigated. Following this five companies were selected to invest in over a two-week period. Once the simulated trading was completed all the results and information gained were brought together to be utilized as learning tool about the stock market and society, and how they interact with each other.

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Chapter 1: Introduction

For this Interactive Qualifying Project a stock market simulation will be performed. The first section will describe the objectives of this project. The second section will outline the structure of the paper and the third section will give the timeline of the project.

1.1 Objective

This Interactive Qualifying Project of a stock market simulation has a number of purposes for the user. The first is to educate about the market including; terminology, types of stocks, ways of trade, strategies and inherent risks, summarized as an overall basic understanding of the stock market system. Secondly the experience gained from this simulation will better prepare the user for actual trading in the stock market as opposed to simulated trade. Also an understanding of how the market can affect industry, and conversely how industry can affect the market should be gained from this simulation.

1.2 Structure of the Paper

This paper is separated into five chapters. The first of which is the introduction, this chapter will describe the purpose of the project, the structure of the paper itself and lastly give a timeline for the work surrounding the project itself.

The second chapter entails history and research of the American stock market, including the New York Stock Exchange and the American Stock Exchange. This chapter also includes descriptions of indexes such as The Dow Jones Industrial Average

and the NASDAQ. Multiple strategies for investing in the stock market are also described in this chapter.

The third chapter includes information and research into different companies and possible stocks for investment during the simulation. At the end of this chapter the investments for the simulation are chosen with respective strategies and the reasoning behind their selection.

The fourth chapter covers all of the simulated trading including purchasing and sales of investments and the justification for each transaction.

The fifth chapter summarizes the entire paper and project beginning with an overview of the knowledge gained about the stock market itself. It also includes results from the simulated trading detailing the overall experience of investment and education.

Appendices at the end include any charts, graphs, bibliographical references or other information utilized for the project not included in the previous chapters.

1.3 Project Timetable

The duration of this project will span a seven week timetable beginning May 29th and ending July 18. The first week and a half from May 29th through June 8th will be used for researching the stock market including different types of investment and strategies to be utilized.

Beginning on June 9th through June 20th the simulated trading will be performed. Through this time period there is actually only ten days that the stock market is open for

trading. During this time additional research into the history of the stock market will also be performed.

After the actual simulated trading has ended on June 20th the results of the transactions can be compiled and evaluated. This information will make up the bulk of the results of the paper which should be in a rough draft form by the beginning of the sixth week of the project.

The remaining time will be used for corrections and additions to the paper with a final product to be delivered at the end of E-term

Chapter 2: About the Stock Market

The idea of buying "stock" in a company is something that has been around for centuries. In its simplest form a partner in a business who gives financial support but is not involved in the day-to-day business is much the same as an individual investing in the stock market on just a different scale.

2.1 History of U.S. Markets

The first organized stock exchange in the United States wasn't created until 1792. Prior to this individuals would buy or sell investments on their own. In 1817, the Stock Exchange Office, working out of 22 Wall Street in New York City, changed its name to the New York Stock and Exchange Board. By 1863, after moving six times, the board was renamed the New York Stock Exchange (NYSE) and found its final home at Wall and Broad Streets, where it still does business today.

A competitor to the NYSE was originally known as The Curbstone Brokers. This group also working out of New York originally did their work outside in all types of weather. They met at night to auction shares based on prices set earlier in the day at the NYSE's auction. The Curbstone Brokers did two things that set them apart from the NYSE. The first was that they were willing to sell single shares, where the NYSE sold a minimum of 100. The second thing they didn't was deal with the stock of smaller companies that the NYSE thought were not important enough to be listed. In 1919 The Curbstone Brokers, who had been established for more than 100 years, finally purchased

a building on Wall Street, and in 1953 this group changed their name to what is known today as the American Stock Exchange (AMEX).

As interest and business in the markets increased so did their complexity. One major change was in 1873 when trading hours were set from ten in the morning until three in the afternoon on weekdays and from ten until noon on Saturdays. These hours changed again in the early 1950s but since 1974 the hours have been from 10 AM until 4 PM on weekdays only.

2.2 Stock Indexes

There are a number of different stock indexes which are used to determine or quantify the value of a stock. Some of the more common are; the American Stock Exchange Index, New York Stock Exchange Composite, Standard & Poor's 500 Composite, the Dow Jones Industrial Average, and the NASDAQ Composite Index. Each one of these indexes uses a different method to calculate or determine the value of stocks. For example, the Dow Jones Industrial Average is based on a sample of stocks while the New York Stock Exchange Index is based on all the stocks it has listed.

2.3 Stock Categories

Stocks are separated into seven different categories. The first five to be described here after make up the bulk of all stocks and the final two have a much smaller percentage and are decidedly different than the previous categories.

Basic stocks are from companies that produced products or services sold to other businesses or durable goods sold to the consumer. A consumer stock is from companies producing products for consumption or as low-priced items that are sold through advertisements. Energy stocks encompass oil, gas, coal, uranium and the products and services for producing and transporting them. Technology stocks are from components and equipment with high-technology content, sold primarily to other businesses. These are usually capital goods. The first of the two individual categories is Inflation Beneficiaries. These are products that are perceived to rise in price more than the inflation rate and a benefit from a weak dollar. And the final category is labeled as miscellaneous which covers the remainder of stocks not listed above.

2.4 Strategies of Stock Investing

The technical approach is to study the market rather than companies or the economy. From the market's history one tries to forecast trends and prices, which includes market data and not business records or company prospects. Individuals using this method believe the market is the best forecaster of trends and they're concerned with how the market moves not why.

A fundamental approach deals with the investment values, earnings, dividends, assets, managerial abilities, trends, national economy, and corporate securities. With this approach an investor studies economic, financial, and scientific data. The data includes sales numbers, profitability ratios, new products, managerial abilities profit figures in

industrial surveys. After analyzing this data profits can be forecasted and projected which can help in determining future values of stocks.

Channel trading is a method where investor sets high and low prices for particular stocks. When the stock reaches its low point the stock is purchased and if and when it reaches the high point the stock is sold regardless of other factors surrounding the changes in price.

Day trading is a very work intensive strategy which requires the investor to continuously monitor the activity of the stock market looking for favorable fluctuations in the market. Once a change in stock value has been identified the day trader has to be able to react quickly to take advantage of the situation.

Long-term trading describes a method where an investor buys into a particular stock anticipating holding onto it for many months or even years. The hope here is that the value of the stock will increase over time at a rate greater than that of inflation.

Of these strategies some are methods of trading stocks and others are ways of deciding how or when to trade a particular stock. There is also a random walk theory. This theory states that the stock market is unpredictable and is a game of chance. Randomness is the movement without pattern, design, or purpose. This suggests that there is no memory of the past and the past has no influence on the present or future of the stock market or stock values.

Chapter 3: Companies Selected for Trading

In this chapter the five companies that were used for this stock market simulation will be discussed. Information on each of the companies will be provided, which will include: who they are, what type of company and the services that they provide. Following this, reasons for each company selection will be given and the type of strategy that will be utilized during the trade of their stock.

3.1 Clear Channel Communications, Inc., (CCU)

Clear Channel Worldwide, headquartered in San Antonio, TX, is a global leader in the out-of-home advertising industry with radio and television stations, outdoor displays, and entertainment venues in 66 countries around the world. Including announced transactions, Clear Channel operates approximately 1,225 radio and 39 television stations in the United States and has equity interests in over 240 radio stations internationally. Clear Channel also operates approximately 776,000 outdoor advertising displays, including billboards, street furniture and transit panels around the world. Clear Channel Entertainment is a leading promoter, producer and marketer of live entertainment events and also owns leading athlete management and marketing companies.

There were a number of factors in the decision to choose CCU stock. The first of which is that CCU has a large percentage of the market share and they are very stable company. The stability does two things, the first of which is that the stock is very

unlikely to take a quick downturn but at the same time you are less likely to make a large profit in the short period of time. This stock and would be of wise investment over a long period of time. Another strong factor in purchasing this stock was the analyst rating of 1.57. This puts the rating between buy and strong buy. Although the CCU stock price was a bit high in comparison to their recent history it was in an uptrend at the beginning of this simulation as shown in the figure below.

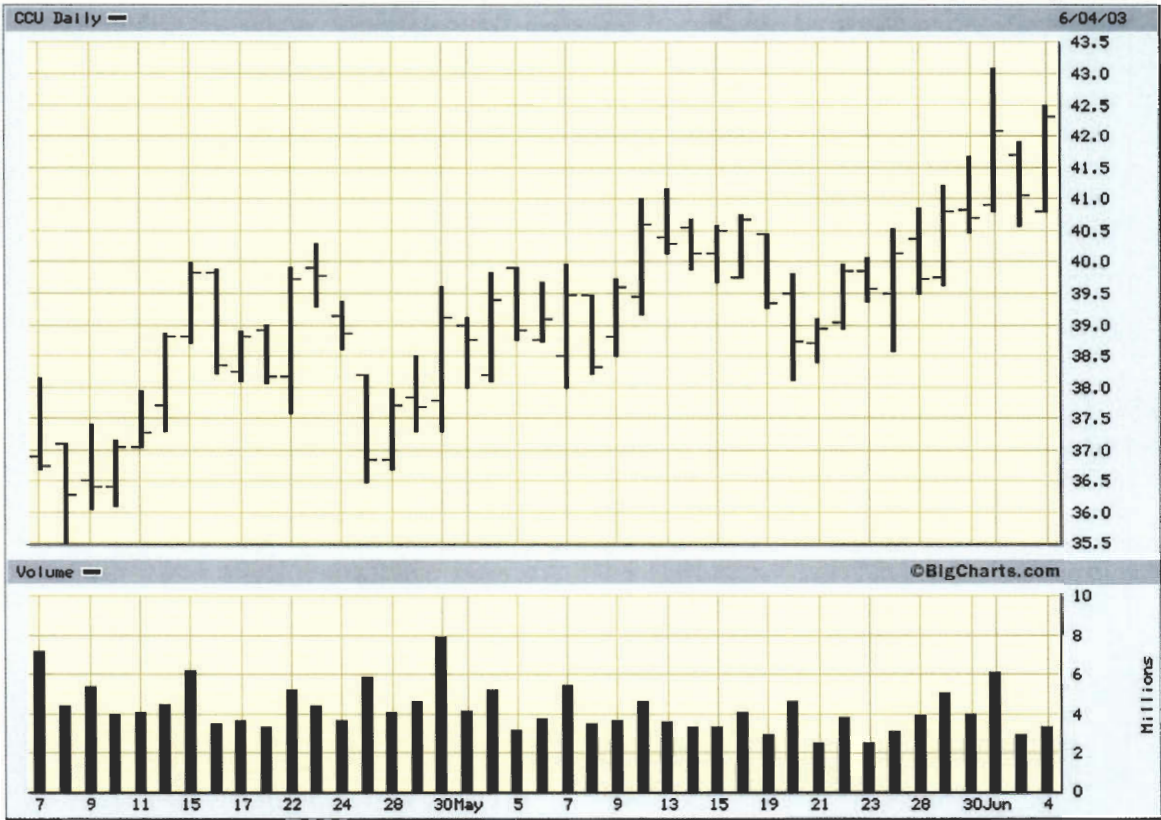


Figure 1: CCU Stock History Prior to Simulated Trade

Strategy for this stock is to rely on CCU's stable stock history and hope for moderate gains over the two-week simulated trade period. A moderate gain would be in the 3-5 percent range, which is considerably more than you would receive from a bank savings account in a two-week period.

3.2 Inverness Medical Innovations, Inc., (IMA)

Inverness Medical Innovations, which was previously Inverness Medical Technology, was recently acquired by Johnson & Johnson. This company is based in Waltham Massachusetts. IMA is engaged in the development, manufacture and marketing of consumer healthcare products, including self-test diagnostic products for the women's health market and vitamins and nutritional supplements. They are also one of the industry leaders in the field of blood glucose monitoring and diabetes self-management. IMA is in the scientific and technical instruments industry.

During the background research of this company and prior to the beginning of the actual trade simulation, it was discovered that IMA was involved in negotiations on a large financial settlement with the Pfizer Company. Speculation surrounding this favored a ruling to IMA's benefit. A large increase in IMA's working capital had the potential to increase the value of their stock, which made this an ideal time to buy IMA stock before the value increased. Because the settlement could go in favor of the Pfizer Company it makes this a risky investment. Although with more risk comes the potential for more profit. Another factor in the decision to purchase IMA stock was that their analyst rating was 1.5, which is halfway between buy and strong buy. As shown in the following chart,

IMA stock was on an upward trend and there was an increase in volume at the beginning of June, which gives a positive indication.

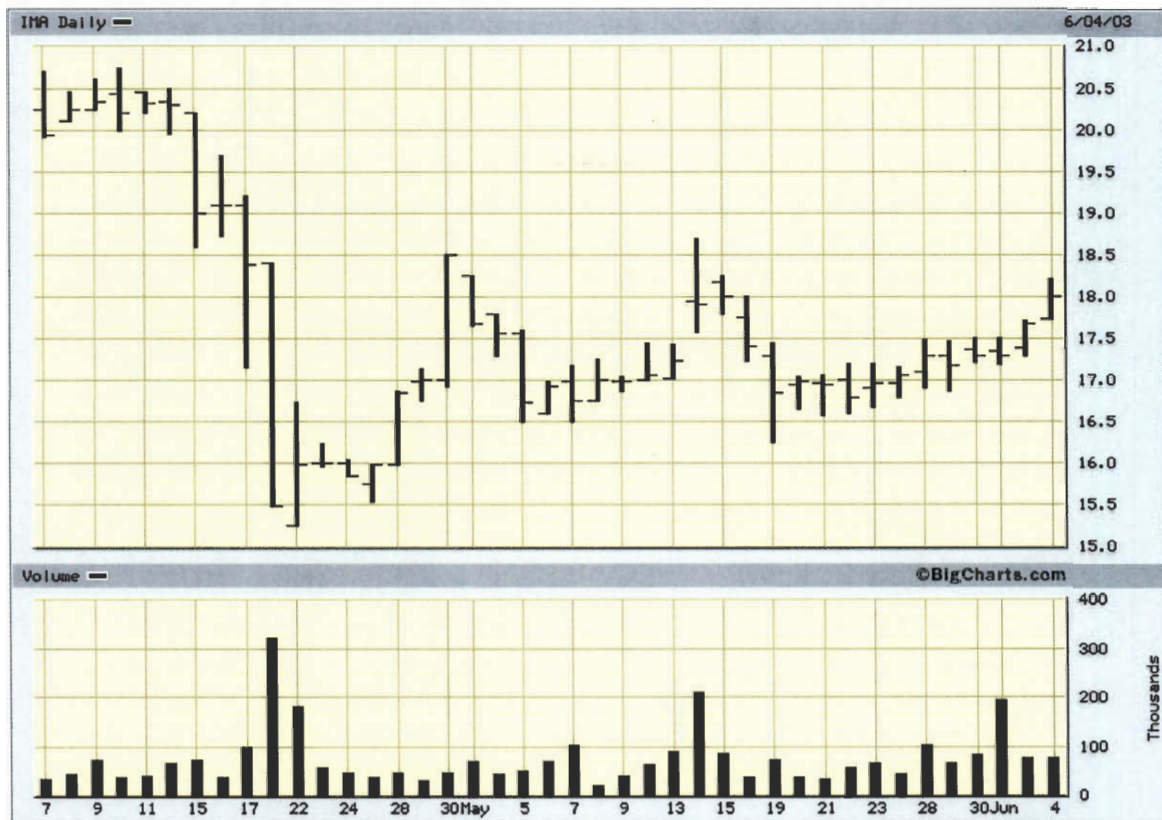


Figure 2: IMA Stock History Prior to Simulated Trade

Choosing a strategy to utilize with a stable stock such as IMA is difficult to do for the short two-week trading period we will be using. The anticipated action is to purchase IMA stock and hopefully the value will increase with a favorable ruling in their settlement with Pfizer.

3.3 Pfizer Inc., (PFE)

Pfizer discovers, develops, manufactures, and markets leading prescription medicines for humans and animals and many of the world's best-known consumer brands. This pharmaceutical company is based out of New York City, New York. There innovative, value-added products improve the quality of life of people around the world and help them enjoy longer, healthier, and more productive lives. The company has three business segments: health care, animal health and consumer health care, and there products are available in more than 150 countries.

Pfizer is a stable company that holds a large portion of the market share in their industry. In the recent past Pfizer is associated with numerous cutting-edge medications one of them being Lipitor, the top-selling drug in the world. Because Pfizer is such a large corporation with lots of backing it is a safe company to invest in especially in the long-term. Some of the reasons it was chosen for this short two-week simulation are as follows: it had an analyst rating of 1.41, J.P. Morgan rates its coverage at overweight, and there is a tremendous amount of positive news about Pfizer products getting approval from the FDA. Also at the time of this simulation the Pfizer stock prices were in a bit of an upturn, as shown in the following figure, which indicates a good time to buy in.

Although Pfizer's stock prices were a bit high at the time the decision was made to purchase their stock, there were strong indications that the stock would continue in this manner for a bit longer. The strategy for this stock is to hope that the upward trend will continue during the remainder of this simulation, which will result in moderate gains over the short period of time of this simulation.

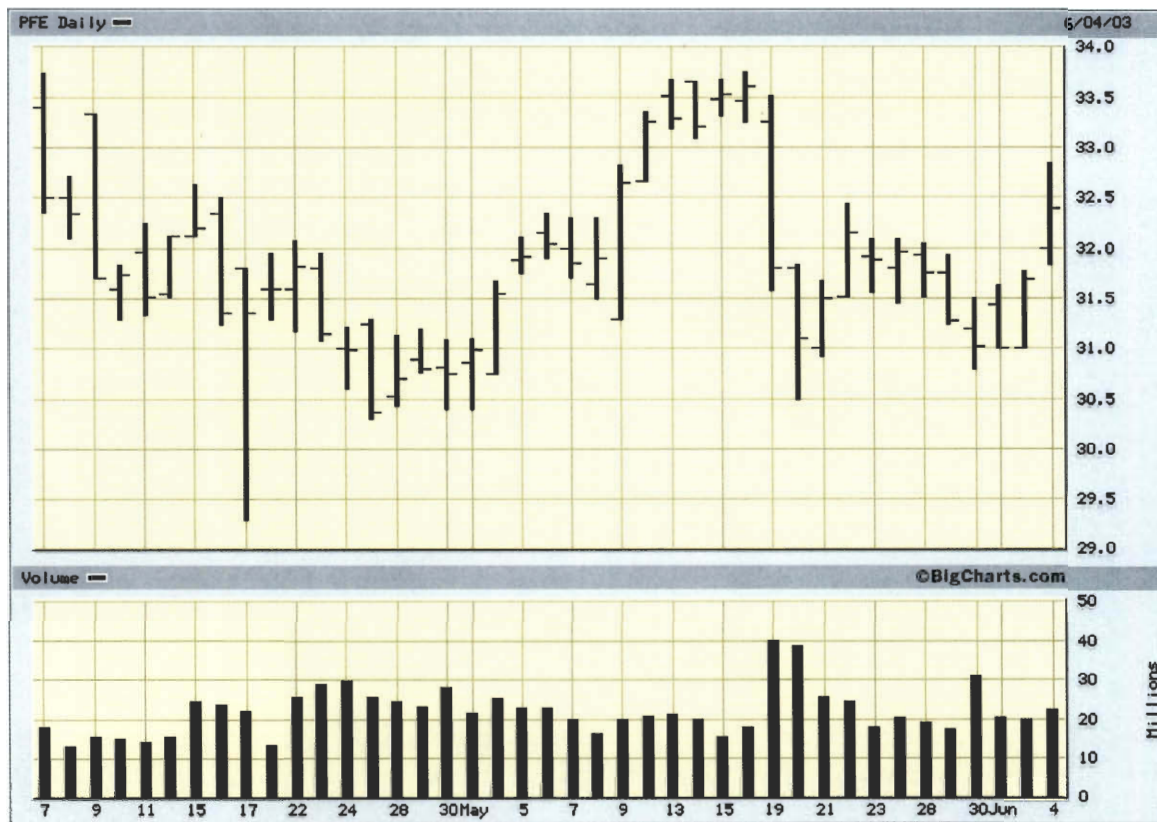


Figure 3: PFE Stock History Prior To Simulated Trade

3.4 Sirius Satellite Radio, (SIRI)

Operating from its corporate headquarters in New York City’s Rockefeller Center, Sirius Satellite Radio is building a digital satellite radio system that will broadcast up to 100 channels of music and entertainment programming to motorists throughout the continental United States. The company plans to offer channels of commercial-free music and channels of news, sports and entertainment programming for a monthly subscription fee.

SIRIUS' 60 streams of commercial-free music cover nearly every genre - from heavy metal and hip-hop to country, dance, jazz, Latin, classical, and beyond. The 40 other SIRIUS streams include an unmatched lineup of world-class sports, news, talk and entertainment.

Programming comes from such top names as NPR, ABC News, BBC World Service, ESPN, CNBC, Radio Disney, and E! Entertainment. SIRIUS broadcasts programs in Spanish, as well as shows focused on comedy, public affairs, the arts, and the trucking life.

Although SIRIUS is a relatively new company, which makes them less stable than the previous companies in this stock market simulation, I decided to invest in their company. There had been a tremendous amount of information in the news about satellite radio companies in the recent past and SIRIUS's stock was rising quickly because of the escalating interest, which can be seen in the figure on the following page. SIRIUS recently signed an agreement with Ford Motor Company to install their receivers in Ford vehicles. Even though their stock had increased so much in the recent past I felt that in the short amount of time for this stock market simulation, there was still potential for the value to increase. At this time the SIRIUS stock analyst rating was 3.00 which is categorized as hold.

The strategy for this stock is to buy a large number of shares because of the inexpensive price of each share. Because of the low price, small changes in value equal a bigger percentage of the total investment. But because this stock is much more volatile than the others it needs to be watched more closely.



Figure 4: SIRI Stock History Prior To Simulated Trade

3.5 United Technologies Corp., (UTX)

United Technologies Corp. (UTC) is a \$28.2 billion global corporation, with six operating companies and a standalone Research Center. UTC employs approximately 155,000 people worldwide and operates in 180 different countries. It is the 49th largest U.S. corporation and a component of the Dow Jones industrial average. UTC companies are leaders in aerospace, military and commercial aviation products, including helicopters and jet engines and in commercial building technologies including climate control,

elevator design and the design and production of environmentally clean, hydrogen fuel cells.

UTC had been in negotiations to buy Chubb PLC, a London-based electronic security company, at the beginning of this stock market simulation. I anticipated that this purchase would help increase the value of their stock. Also their analyst rating at the time was 2.07, which is rated at buy. Although the UTC stock was quite high compared their recent past I felt there was still potential for increased during this simulation.

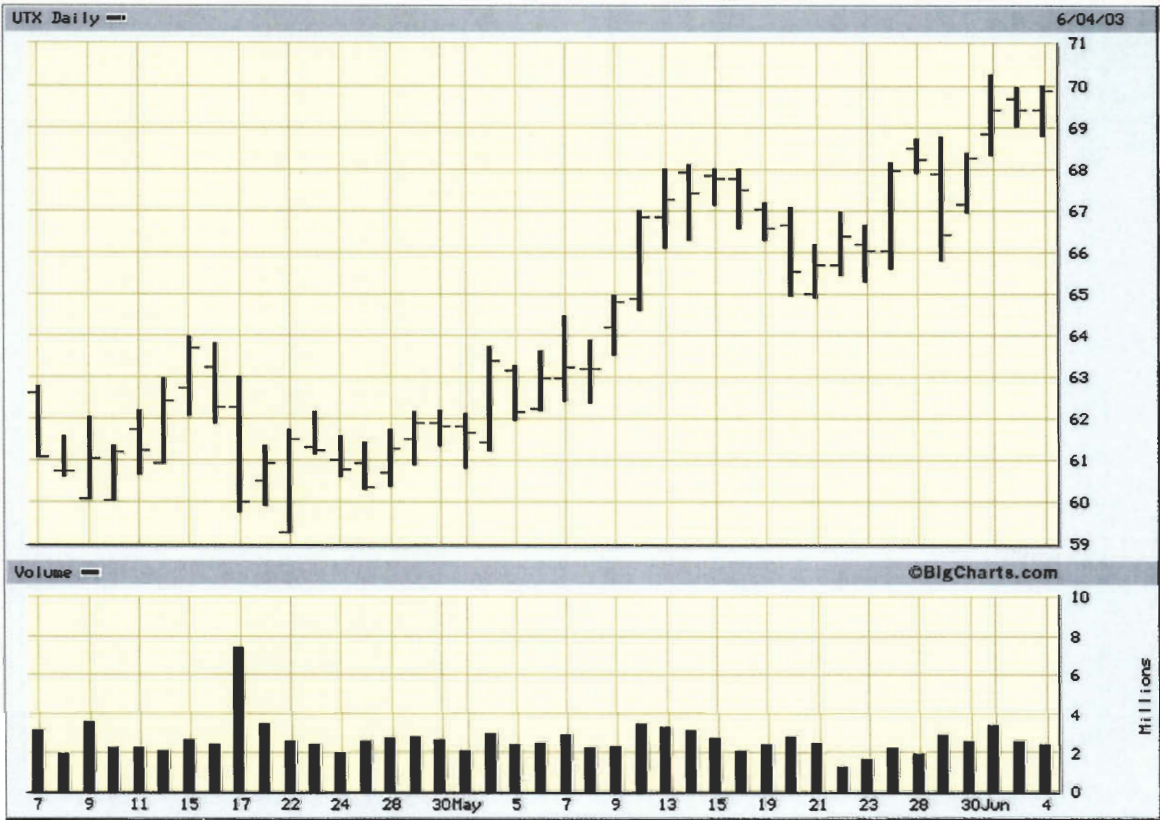


Figure 5: UTX Stock History Prior To Simulated Trade

The strategy for UTC stock is to buy in before they complete their deal with Chubb PLC and hopefully during this simulation the effect of the purchase will increase the value of their stock.

In this chapter we have reviewed the five companies that will be used during this simulation. Additionally we have looked into recent stock history and available news surrounding each company's activities. In the next chapter the actual day-to-day stock market trading will be presented.

Chapter 4: Simulated Stock Market Trading

In this chapter an account of the daily simulated trading will be given. For this simulation an initial investment amount of \$50,000 was chosen. The actual dates of trading were from June 9 through June 20 which makes up a total of 10 days that the stock market would be active during this simulation.

4.1 Method

To monitor the stock market an online brokerage web site was used via the Internet. Setting up an account on the Quicken web site (www.Quicken.com) allowed me to create a portfolio. The five companies that were chosen in the previous chapter were listed by their symbol in the portfolio. Within the portfolio you can monitor many aspects of the chosen stocks including; current price, daily highs and lows, percent change, average volume of trading and current volume. The web site also provides charts, analyst ratings, news, research reports and company data, among many other things. The portfolio also allows you to enter the number of stocks and at what price you purchased them, so that you may monitor your profit and loss for each stock and your total investment has a whole. If you were to do actual trading through the Quicken web site they would charge you \$24.95 per trade. To keep my simulation as accurate as possible I deducted this amount from my account for each trade made during the simulation.

4.2 Diary of trading

4.2.1 June 5 Transactions

Although the simulated trading wasn't starting until June 9, as I researched the different companies I noticed that SIRI stock was at \$1.98 and had good potential to go up so I bought 10,000 shares equaling \$19,800. Subtracting the transaction fee left me with the balance of \$30,175.05.

4.2.2 June 9 Transactions

At 12:27 PM I purchased 100 shares of CCU stock at \$41.08 for a total of \$4,108.00, and after subtracting the transaction fee resulted in a balance of \$26,042.10. On the Quicken web site there are numerous news releases regarding UTX's purchase of Chubb PLC, although I'm skeptical about purchasing the stock today because the price is high in comparison to its recent past.

4.2.3 June 10 Transactions

At 9:47 AM I purchased 500 shares of IMA stock at \$20 per share totaling \$10,000. Although the UTX stock is still fairly highly priced, I want to buy stock before they finalize their deal with Chubb PLC. Following that at 10:00 AM I purchased 200 shares of UTX stock at \$70.76 per share, for a total of \$14,152. After subtracting these two purchases and the transaction fees my account balance was \$1840.20. My SIRI stock has already been as high as \$2.20 per share, which is a 10 percent increase. Because the stock seems to be leveling off I'm considering selling it.

4.2.4 June 11 Transactions

This morning Stock Pick Report.Com rates SIRI at sell and the average price of the stock has been in a slight downturn since I purchased it. Although with the daily fluctuation in price I should be able to sell the stock at enough of a profit to net a five percent profit after transaction fees. So at 10:15 AM I sold my SIRI stock for \$2.09 per share for a total of \$20,900. Adding this to my account minus the transaction fee left my balance at \$22,715.25. Amidst all the favorable news surrounding UTX, there stock hits a 52-week high at \$73 per share. J.P. Morgan reiterates its coverage of PFE at overweight, suggesting that it would be wise to have a larger percentage of PFE stock in your portfolio. Also their analyst rating, at this time on the Quicken web site, is 1.39 which is closer to strong buy than buy, but because there stock has been moving up in the recent past and is relatively high I decide not to purchase at this time because a correction in their stock price is possible.

4.2.5 June 16 Transactions

Today PFE has an analyst rating of 1.41, which is closer to strong buy than to buy. Its current stock price is \$34.38 and it's been rising all morning, so at 12:20 PM I put in a buy order for 300 shares of PFE stock at \$33.50, in hopes that the price will come down a little bit. The value of my IMA stock has dropped approximately \$1.50, making it my worst performing stock at this time.

4.2.6 June 17 Transactions

Although I was skeptical about buying Pfizer stock at such a high price, at 11 AM I purchased 600 shares of PFE at \$35.78 for a total of \$21,468. After subtracting the transaction fee, my account balance is \$1222.30. On the Quicken web site there have been numerous news articles about positive results from PFE products, and this has been driving the price of their stock up. The reason I was skeptical is because the prices have been moving up so quickly and I feel the stock prices may be due for a correction in the near future. Because my trading simulation is ending in only a few days I thought PFE was my best opportunity to profit in a short period of time.

4.2.7 June 18 Transactions

My UTX stock has at another 52-week high at the price of \$74.07. My CCU stock continues to do well and is still showing a profit including the transaction fees. Also my PFE stock is up from the purchase price of yesterday. Contrary to my hopes the IMA stock has been a downturn since their settlement with Pfizer on June 9th, although the analyst rating remains at 1.5 between buy and strong buy. At 12:40 PM I put in a sell order for my IMA stock at \$20 per share. I doubt this will happen before this simulation ends in two days but if the price does reach \$20 I will only be out the transaction fees instead of being down approximately \$750, which I am right now.

4.2.8 June 19 Transactions

Because my IMA stock is down to \$18.26 and did not sell yesterday I'm revising the sell order to \$19 per share. If the stock sells at this price I will have a \$500 loss approximately.

4.2.9 June 20 Transactions

This was the final day of the simulated trading so by the end of trading today I had to sell off all my stocks. For the four remaining stocks that I was carrying I put in individual sell orders on Friday morning to try to maximize my profit. If the stocks didn't hit those prices during trading Friday I would sell them at their respective closing prices. For my CCU stock I put in a sell order for \$43.08. Because my IMA stock price still had not recovered a revised the sell order to \$18.50. The sell order for my UTX stock was at \$74.25 and finally for my PFE stock the sell order was \$36.03.

During trading on Friday two of my stocks came up to the price that I put sell orders in for. The first was my CCU stock selling at \$43.08, for a total of \$4308. The other was my IMA stock which sold at \$18.50 totaling \$9250. Of the final two stocks my UTX stock sold at \$72.45 for a total of \$14,490. Although my PFE stock had been above what I bought it for all week, during Friday it went down and ended up selling for \$35.57 for a total of \$21,342. At the end of trading on Friday after selling all of my stocks and deducting the transaction fees for each one my balance was \$50,512.50.

DATE	STOCK	PRICE/ SHARE	QUANTITY	BUY/ SELL	AMOUNT	FEE	RUNNING TOTAL
							\$50,000.00
5-Jun	SIRI	\$1.98	10,000	BUY	\$19,800.00	\$24.95	\$30,175.05
9-Jun	CCU	\$41.08	100	BUY	\$4,108.00	\$24.95	\$26,042.10
10-Jun	IMA	\$20.00	500	BUY	\$10,000.00	\$24.95	\$16,017.15
	UTX	\$70.76	200	BUY	\$14,152.00	\$24.95	\$1,840.20
11-Jun	SIRI	\$2.09	10,000	SELL	\$20,900.00	\$24.95	\$22,715.25
17-Jun	PFE	\$35.78	600	BUY	\$21,468.00	\$24.95	\$1,222.30
20-Jun	CCU	\$43.08	100	SELL	\$4,308.00	\$24.95	\$5,505.35
	IMA	\$18.50	500	SELL	\$9,250.00	\$24.95	\$14,730.40
	UTX	\$72.45	200	SELL	\$14,490.00	\$24.95	\$29,195.45
	PFE	\$35.57	600	SELL	\$21,342.00	\$24.95	\$50,512.50

Table 1: Summary of Transactions During Simulation

Chapter 5: Results

This chapter will summarize the information gained in the previous chapter during the two-week simulated stock market trading. It will begin with an overall discussion of the results as a whole, followed by individual sections for each different stock.

5.1 Overall Results

After investing \$50,000 in the stock market over a two-week period this simulation resulted in a gross profit of \$762, which gives us a 1.5% over our initial investment. This figure must be reduced by the cost of the transaction fees which were \$249.50 resulting in a net profit of \$512.50 which equals a 1% increase. The following table shows individual profit or loss amounts for each stock and their percent change in value.

	Purchase	Sale	Profit/Loss	% Change
CCU	4,108.00	4,308.00	200.00	4.9
IMA	10,000.00	9,250.00	750.00	7.5
PFE	21,468.00	21,342.00	126.00	0.5
SIRI	19,800.00	20,900.00	1,100.00	5.5
UTX	14,152.00	14,490.00	338.00	2.3
	Total after transaction fees		512.50	1.0

Table 2: Summary of profit or loss including % of change

5.2 Individual Results

5.2.1 CCU

As you can see in the following figure, this stock had a gradual but steady increase in value over the duration of this simulation. June 11th had the highest volume of trading during the simulation which also greatly increased the value of the stock on the following day. I purchased 100 shares of this stock and \$41.08 and sold it and \$43.08 for a profit of \$200. After subtracting the two transaction fees my gross profit waters \$150.10. This stock had the second highest percentage change in value at 4.9% as compared to the other stocks in this simulation.

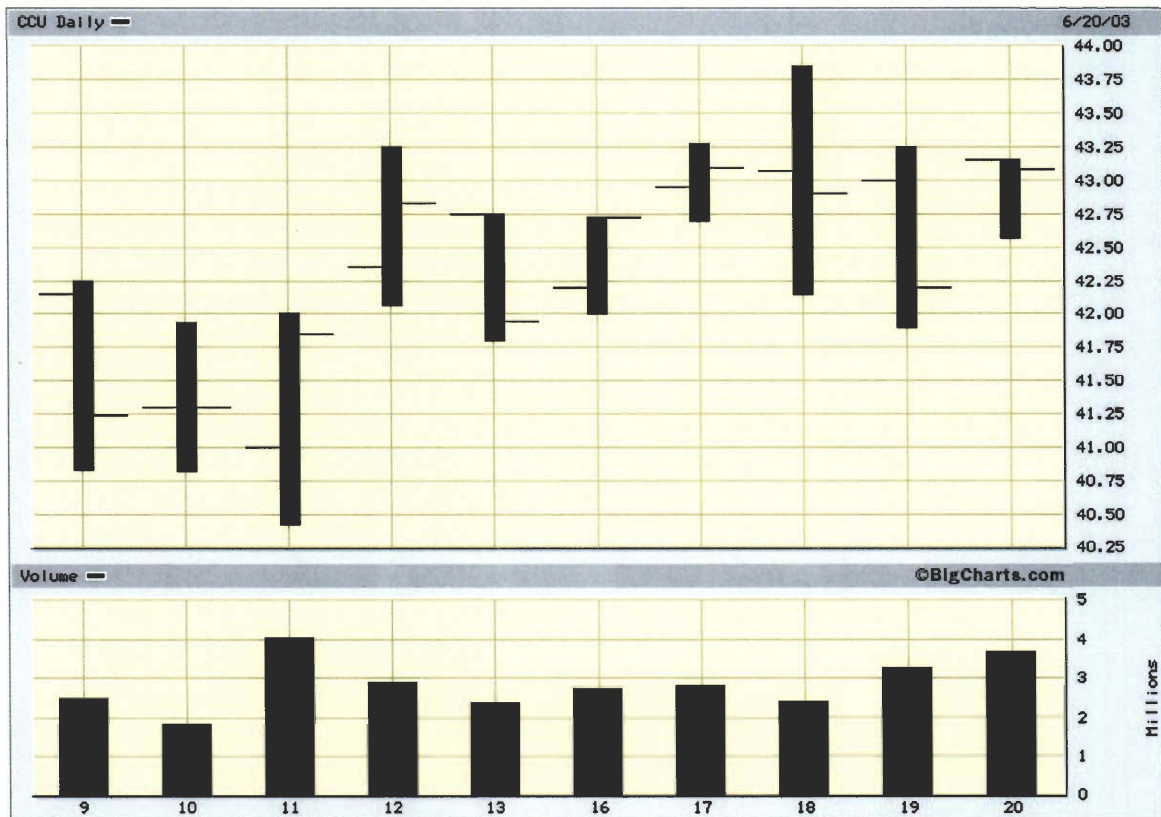


Figure 6: CCU Stock Prices and Volume June 9 Thru 20

5.2.2 IMA

As shown the following chart this stock only when slightly over the price I purchased it at on June 10, after that it was in a steady downturn. This was my worst performing stock. I purchased 500 shares at \$20 per share. At the end of the simulation this stock sold for \$18.50 resulting in a \$750 loss. After including transaction fees my net loss was \$799.90. This resulted in approximately an eight percent net loss.

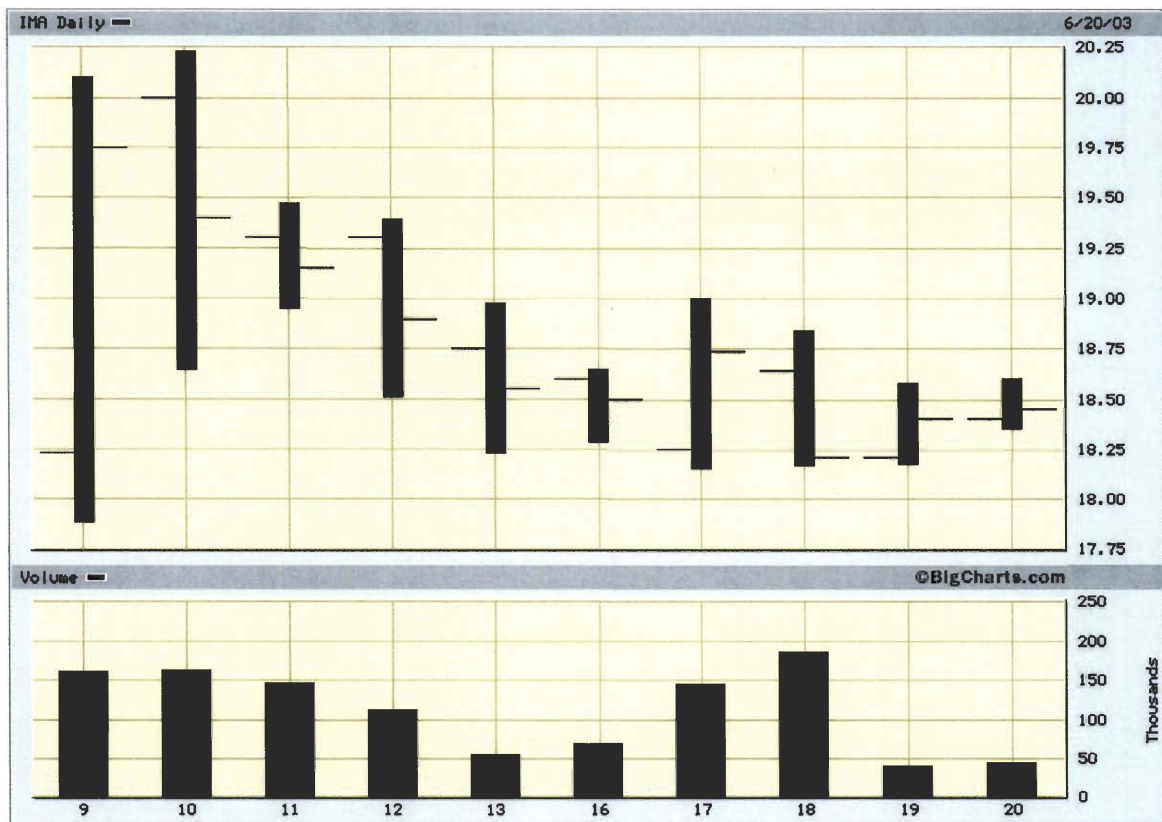


Figure 7: IMA Stock Prices and Volume June 9 Thru 20

5.2.3 PFE

I purchased 600 shares of PFE stock at \$35.78 and sold it for \$35.57 resulting in a gross loss of \$126. After including the transaction fees my net loss was \$175.90 resulting in less than a 1% loss overall. In the weeks prior to this simulation PFE stock had been increasing in value quite rapidly, which makes buying in when I did risky. PFE is an excellent company to invest in for long-term.

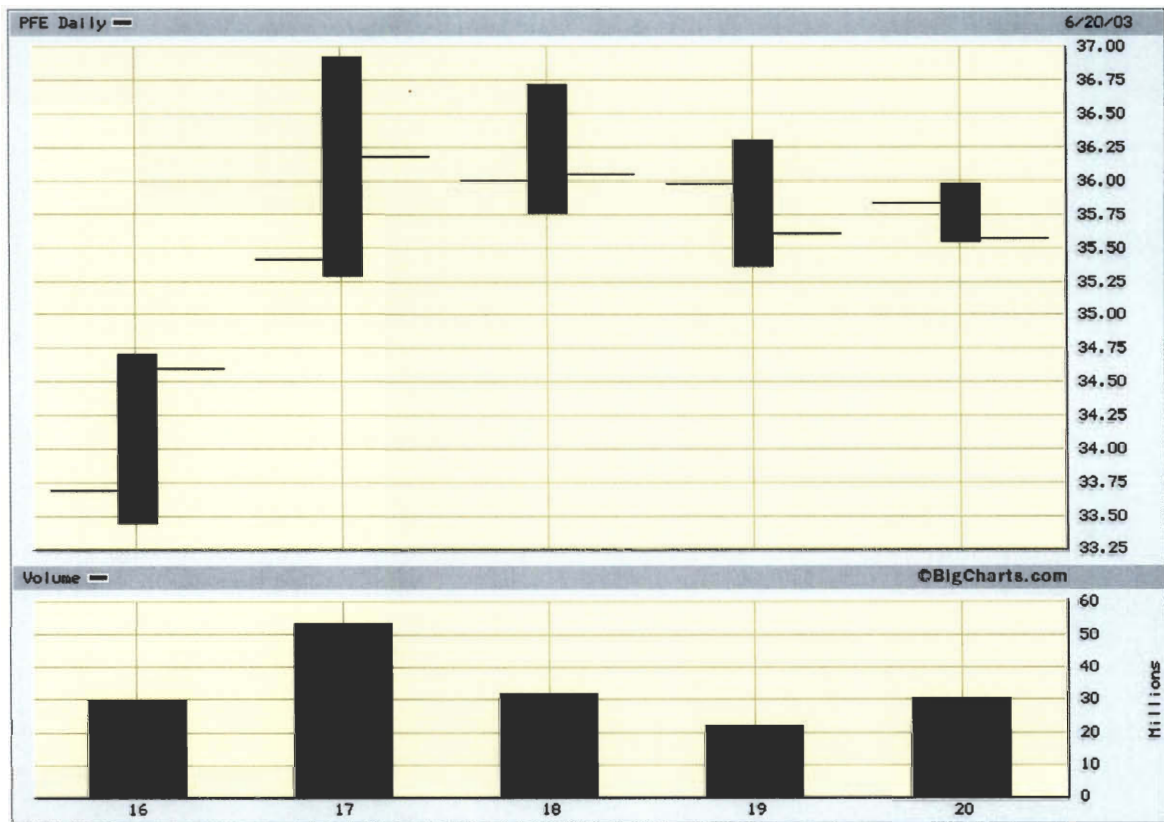


Figure 8: PFE Stock Prices and Volume June 9 Thru 20

5.2.4 SIRI

This was the most risky investment made during the simulation, but with big risk comes the possibility for bigger returns, which was the result in this case. I purchased 10,000 shares of this stock at \$1.98 and sold the stock for \$2.09 a gross profit of \$1100. After transaction fees is equaled a gross profit of \$1050.10, which was a 5.3% increase over my original investment. As you can see from the following chart if I held onto the stock for much longer the stock could have resulted easily in my biggest loss.

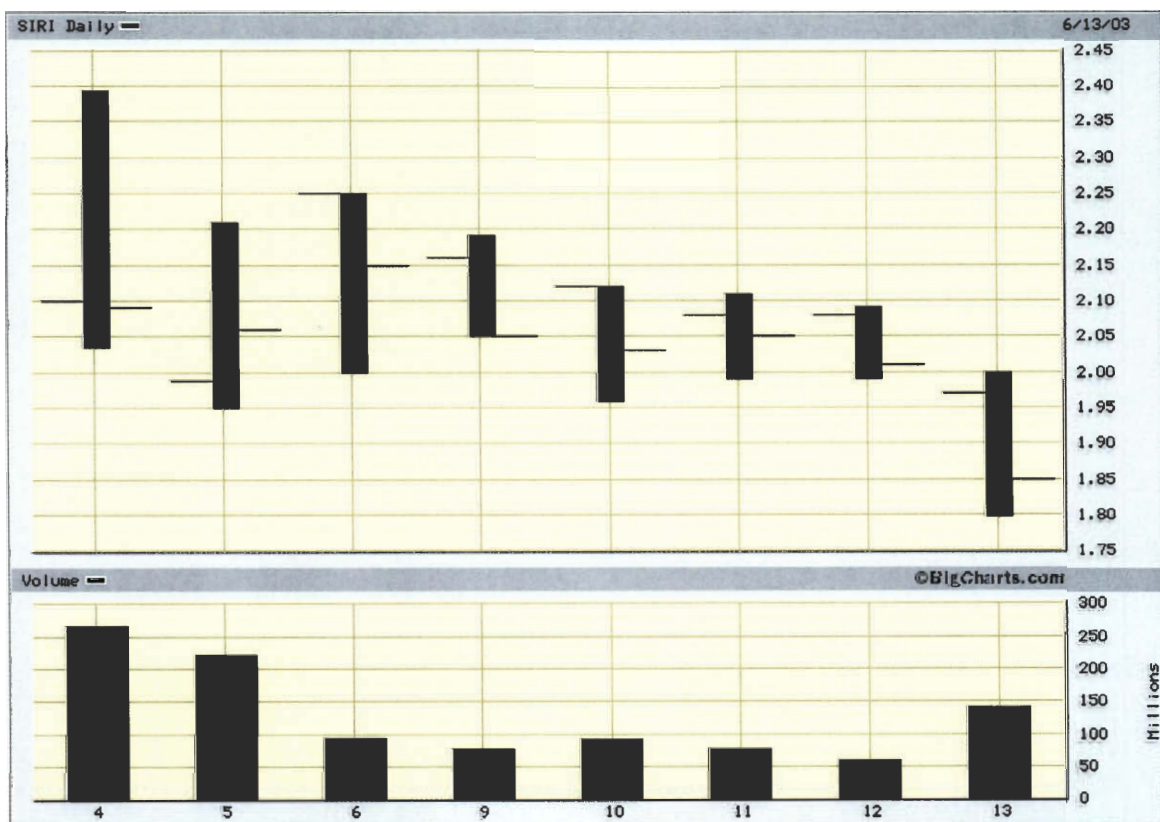


Figure 9: SIRI Stock Prices and Volume June 9 Thru 20

5.2.5 UTX

I purchased 200 shares of this stock for \$70.76 and sold it for \$72.45 this resulted in a gross profit of \$338. After subtracting transaction fees my net profit waters \$288.10 in this resulted in a 2% increase over my initial investment. UTX is a very stable company which would be great for long-term investment.

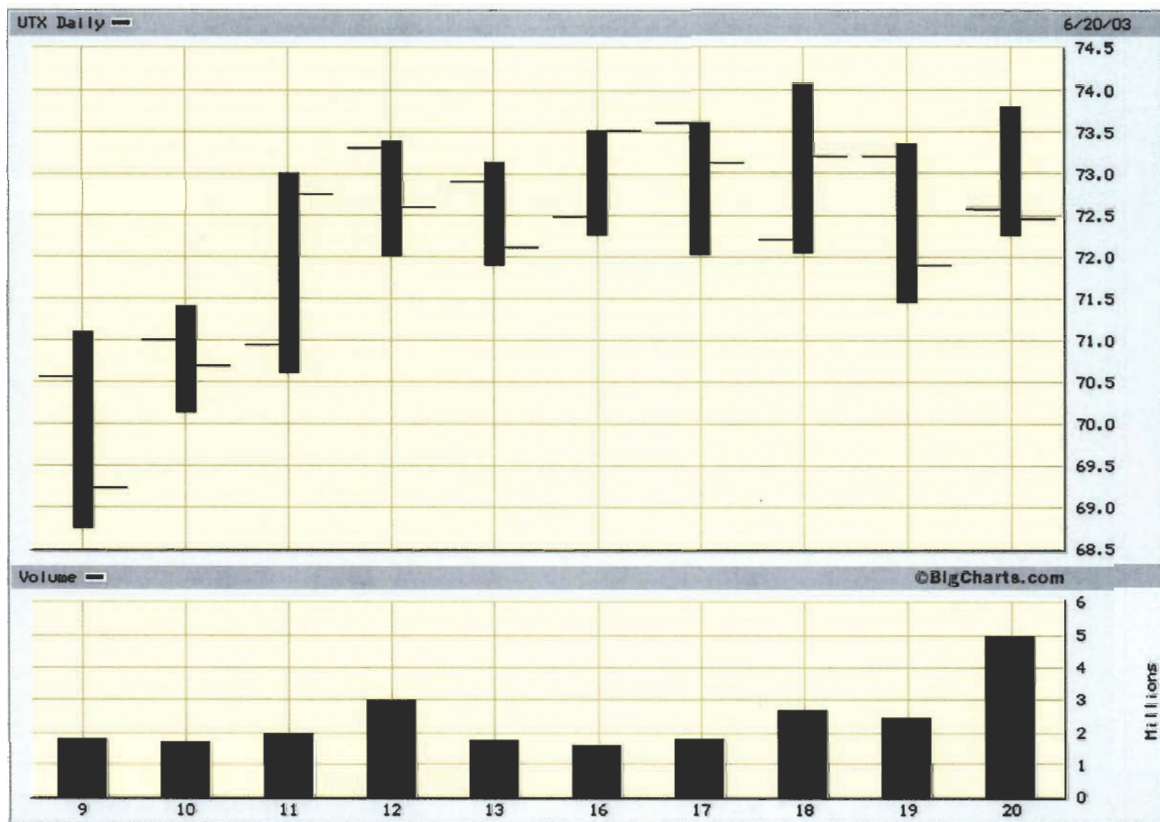


Figure 10: UTX Stock Prices and Volume June 9 Thru 20

Chapter 6: Conclusion

The purpose of this simulation was to gain experience and insight into stock market trading, which it has done quite well. One large factor overlooked by many people is the emotional roller coaster that one experiences when dealing with the unpredictability of investing in the stock market. The allure and excitement of "gambling" can be felt even in simulated stock market trading. Although there are many ways to calculate or anticipate activity in the stock market, none of these methods are guaranteed.

References

Krow, Harvey A. Stock Market Behavior: The Technical Approach to Understanding Wall Street. New York: Random House, 1969.

Lorie, James H. The Stock Market: Theories and Evidence. Homewood, IL: Dow Jones – Irwin, 1985.

Tyson, Eric Investing for Dummies. Foster City, CA: IDG Books Worldwide, Inc., 1996.

Uy, Stacey THE STOCK MARKET: Using Strategies in a Simulation. Worcester, Ma: WPI, 2003.

www.quicken.com

www.clearchannel.com

www.invernessmedical.com

www.pfizer.com

www.cdradio.com

www.utc.com

<http://bigcharts.marketwatch.com>

<http://my.zacks.com/index>

<http://finance.yahoo.com>