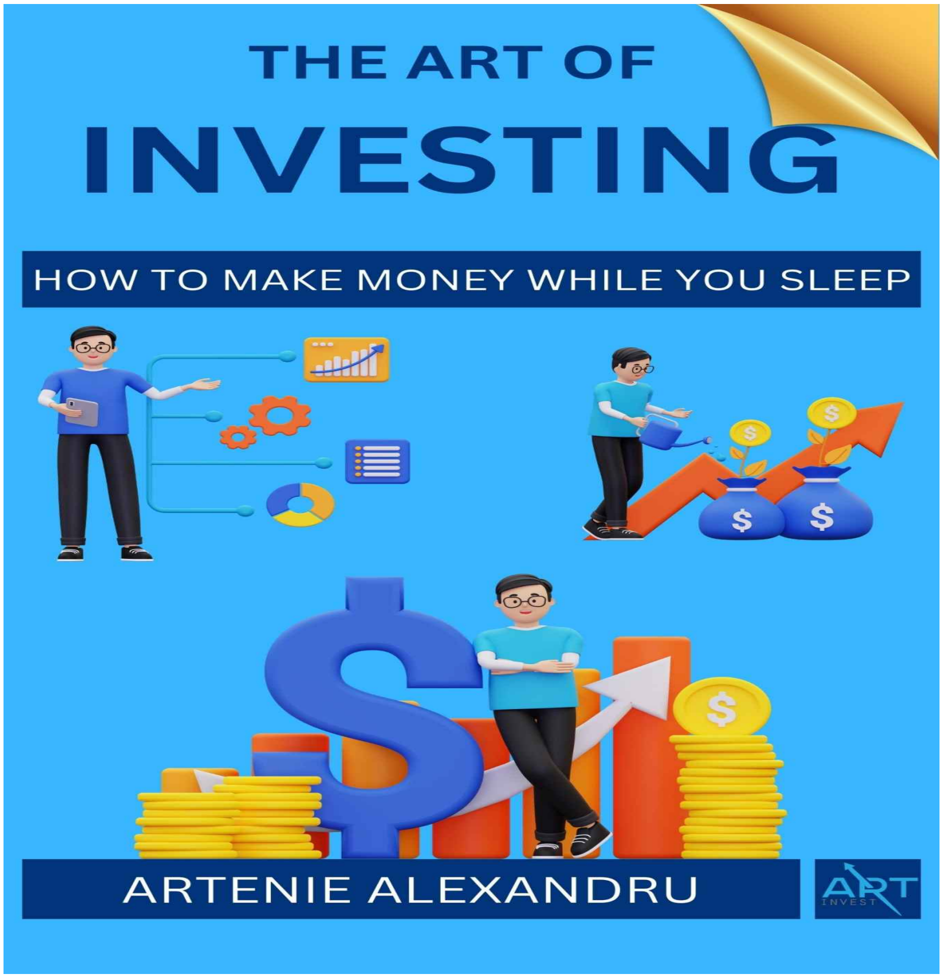
# THE ART OF INVESTING

## HOW TO MAKE MONEY WHILE YOU SLEEP

ARTENIE ALEXANDRU


THE ART OF
INVESTING
HOW TO MAKE MONEY WHILE YOU SLEEP
ARTENIE ALEXANDRU
ART
INVEST

# The Art of Investing

## How to make money while you sleep

Artenie Alexandru

ISBN: 9798397061131

# Introduction

Dare to dream about Financial Freedom!

Most people believe financial security means saving as much as possible. In reality, that's not entirely true. Financial security is a combination of saving and investing.

If you just save, there's a good chance you will have to work till your last day. But when you invest, your money grows by itself! And when you add regular investments to your savings, you can take control of your life and plan it.

You did an excellent service to yourself by purchasing this book as a first step.

This is because I will walk you pragmatically through the essential aspects. Then, after reading it, you will be familiar with the most used concepts, be able to do your research, and have your first strategy.

Financial Independence is accessible to you and anybody else!

# What will you find in this book?

Ever wanted to start investing but wondered where to start? Or are you already an investor but need to educate yourself more on the subject?

You will get enough information to understand investing principles, which will help you make your first steps in the journey. It is not going to be overwhelming with complicated theories and academic content. The aim is to help beginner investors understand what they are doing.

You will learn about technical and fundamental analysis, understand how the stock market works, and how to pick your stocks. In addition, every chapter is accompanied by illustrative charts and valuable resources to help you better assimilate the material.

More advanced content will follow in the upcoming books.

**You will learn about the following:**

- What are the benefits of investing
- What are the markets you can invest in
- How to identify investing opportunities
- How to access the markets through brokers
- What are the asset classes
- What are the ways of making money in the stock market
- How to pick your winning stock
- When to enter a trade (Technical Analysis)
- Get unique investing checklists
- How to properly diversify
- Build your first strategy

At the end of the book, you will find an Annex with tools and websites, both free and paid, as well as extra explanations of important terms you need to know. Ensure you read them also, as they will help you become a better investor.

In addition, at the end of the book, you will find how to claim your FREE bonus: **7 Checkpoints to Pick a Great Dividend Stock!**

Enjoy reading!

# What you will **not** find in this book

This book is not about getting rich schemes.

Thus, please consider that here are:

- No Forex Signals
- No Crypto Pumps
- No NFT Speculations
- No Penny Stocks
- No Hot Tips about any security
- No Day trading techniques
- No scams about any super-investor

If you want to get rich overnight, I recommend not buying this book.

# Disclaimer

The information provided in this book is for general educational and informational purposes only and should not be construed as financial advice.

Any investment or financial decisions you make based on information provided in this book are made solely at your own risk.

We do not provide personalized investment advice or recommend or endorse specific investments, products, services, or strategies.

You should consult a financial advisor or professional before making investment decisions.

All investments come with risks and may lose value.

Past performance is not indicative of future results.

Any views expressed in this book are those of the individual author.

The provided content is not intended to be a solicitation or offer to buy or sell securities or financial instruments.

# Dedication

*This book is dedicated to my wife, Mariana, and my son, Alex, who were supporting and patiently waiting for me for the long hours I've been writing this book.*

Gratify them and help me become better in my following books by giving an honest review after reading the book.

# Table of Contents

# What's with ARTInvest

I also dream about a passively financed lifestyle!

www.art-invest.net is my website, where I share my passion for investing, my financial goals, and where I am against my targets.

I want to inspire you on your own journey, and this is why I provide you with plenty of educational articles, stock analyses, and insights. Although I no longer mention the website throughout the book, you will see some pictures with the watermark showing my logo.

You are invited to join our community and explore our excellent products and awesome content at:

[www.art-invest.net](http://www.art-invest.net)

SCAN ME

# 1

# The 3-W of Investment

## Why, Where, When

*"If you don't find a way to make money while you sleep, you will work until you die."*

— **Warren Buffett**

Business magnate, investor, and philanthropist

# Why Invest

By definition, investing is allocating resources, usually money, to generate an income or profit.

Although it might be obvious why you should invest, let's examine this as a form of financial wisdom.

First, investing allows you to minimize the impact or overcome inflation; God knows, we had enough of it in 2022 and throughout history.

If you keep your money in your pocket or the bank account, it loses its practical value with time. That means, as time passes, you can buy less and less with the same amount of dollars.

Here is a nice picture from investopedia.com illustrating the effect of inflation on a coffee price example:


*Figure 1– Impact of Inflation. Source: Investopedia*[1]

By investing your money and increasing their amount, you can at least keep your buying power constant.

Below is a picture that shows the annual inflation rate in the US for the last century. As higher the indicator is, the more purchase power your cash loses.


*Figure 2 – US Annual Inflation Rate. Source: TradingEconomics[2].*

**Fast Fact:**

The movie Cleopatra cost $44 million to make in 1963. With inflation considered, the same film would cost $350 million today.

Investing is also a good source of passive income. That means you make money while you are sleeping. Sounds tempting, isn't it?

It is always nice to have some extra cash to cover your expenses. But imagine how awesome it would be to pay your monthly bills just by the earnings of your investments and with almost no active involvement from your side! That's kind of a "living for free."

Extending this idea to an upper level brings us to the third point:

Financial Freedom. In other words, cover your life spending entirely with your investment returns. Epic!

Of course, you would need to invest a lot of money to earn a living out of that, but investing is probably the best way to stop trading your time for money.

# Where to invest

Probably you've heard a thousand times how investments can be financial vehicles to help you turn your dreams into reality, but you need guidance about where to start. Beyond having the money to invest, where to invest is also an important consideration.

There are different investment options, each offering unique advantages and risks. Hence, it will be advisable to look into some of these investment means to decide which is most suitable for you.

Here, I've explained some investment tools to help you make a choice.

## The Stock Market

The stock market is one of the most popular investment choices. The stock market is a market that facilitates buying and selling stocks, also known as shares. Stocks here represent publicly traded companies - they allow the public to buy their shares.

By buying the shares of a company, you become entitled to the assets and profits of that company. Stocks are, therefore, a financial instrument that grants you individual ownership of a proportion of a company's assets and earnings. However, the number of shares you buy will determine the slice of the company you own.

Investing in the stock market can be an excellent source of income, especially when you invest in a well-performing stock over the long term. Yet, you must have a high-risk tolerance to invest in stocks as the stock market is highly volatile.

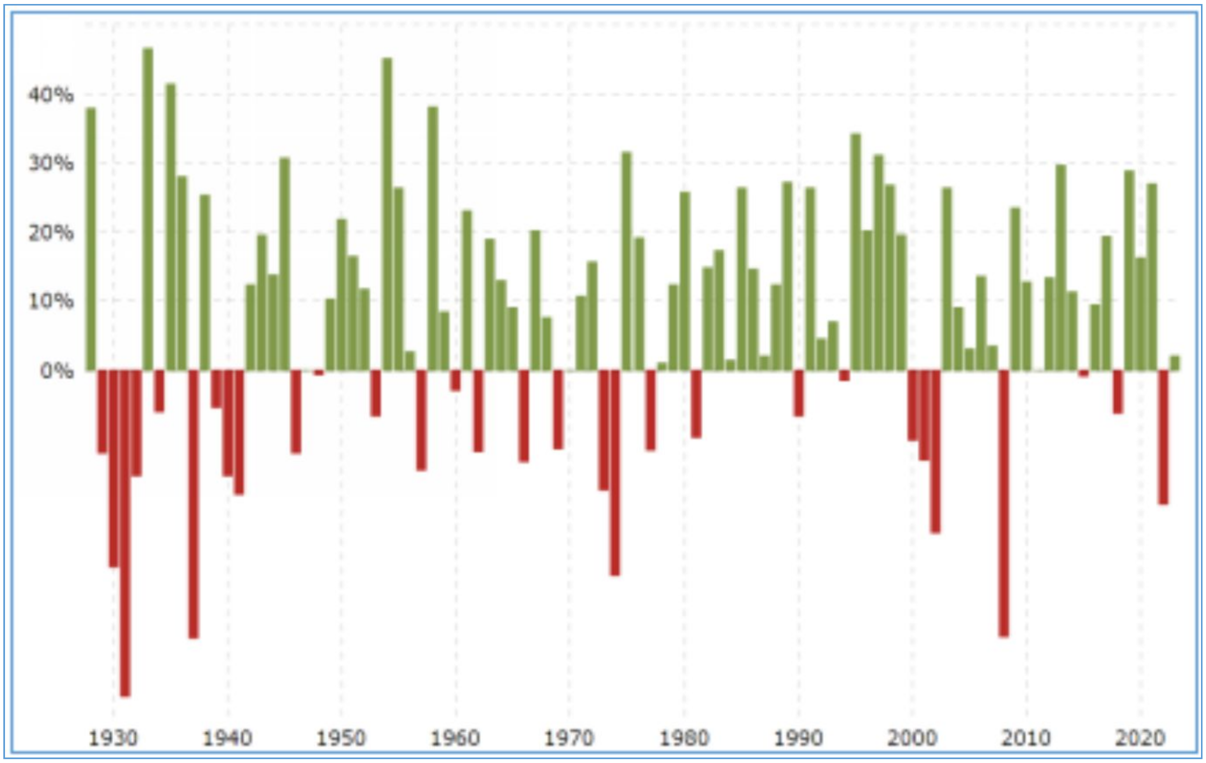



*Figure 3 – Annual return of the S&P500 index since 1928. Source: Macrotrends[3].*

The above picture clearly expresses the stock market volatility. However, the average annual return is positive and lies between 7 – 10%. Note that the performance observed is strongly dependent on the analyzed period.

| Period (start-of-year to end-of-2022) | Average annual S&P 500 return |
|---|---|
| 5 years (2018-2022) | 7.51% |
| 10 years (2013-2022) | 10.41% |
| 20 years (2003-2022) | 7.64% |
| 30 years (1993-2022) | 7.52% |

*Figure 4 – S&P500 index average return for different periods. Source: Nerdwallet[4].*

## Certificates of Deposit

Certificates of deposit, or CDs, are federal-insured investments issued by a bank. CDs are time-bound savings accounts that let you invest a certain amount of money for a fixed term of six months, one year, etc., for interest. With a CD, the bank pays you interest regularly for your investment.

At the time of maturity (end of the fixed term), the issuing bank pays you your original deposit plus the interest accrued on the investment. CDs offer more advantages than savings accounts because they pay higher interest rates.

CDs are more suitable for investors with a low risk tolerance; unlike the stock market, you won't have to worry about market fluctuations. Also, if you intend to lock your money for future use, like retirement, this may be apt since it's a fixed-term investment for higher interest rates.

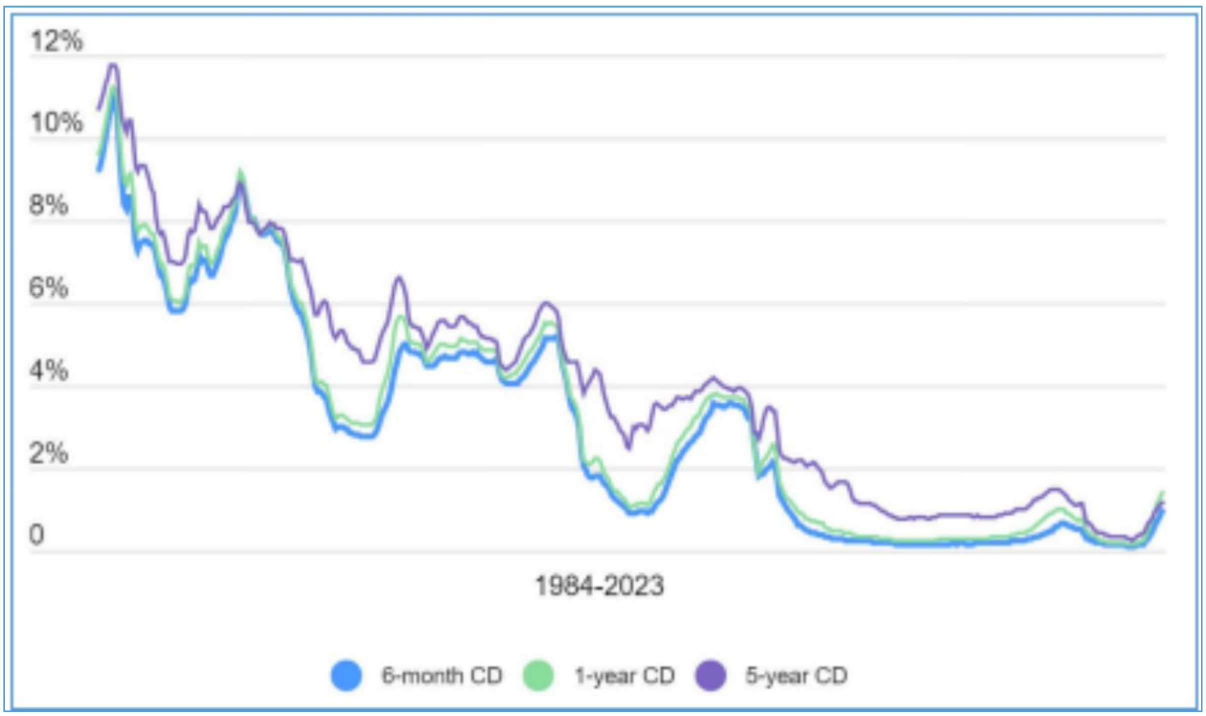



*Figure 5 - Average CD rates: 1984-2023. Source: Bankrate*[5].

## Bonds

Bonds refer to a financial instrument that allows the government and corporations to borrow money from you. A company or the government issues bonds so that you can lend them the money they need in exchange for a regular interest payment.

Bonds are time-bound; the bond has a set/ maturity period, after which the issuer pays back the money to the investors.

Here are the benefits of investing in bonds:

- You get stable means of income
- Safer investment, as the level of volatility is often lower than in the case of stocks
- Tax advantages: municipal bonds pay tax-free interests
- Diversification: some bonds are issued through mutual funds or ETFs, offering you diversification which is a reasonable risk hedge. More about that later in the book.

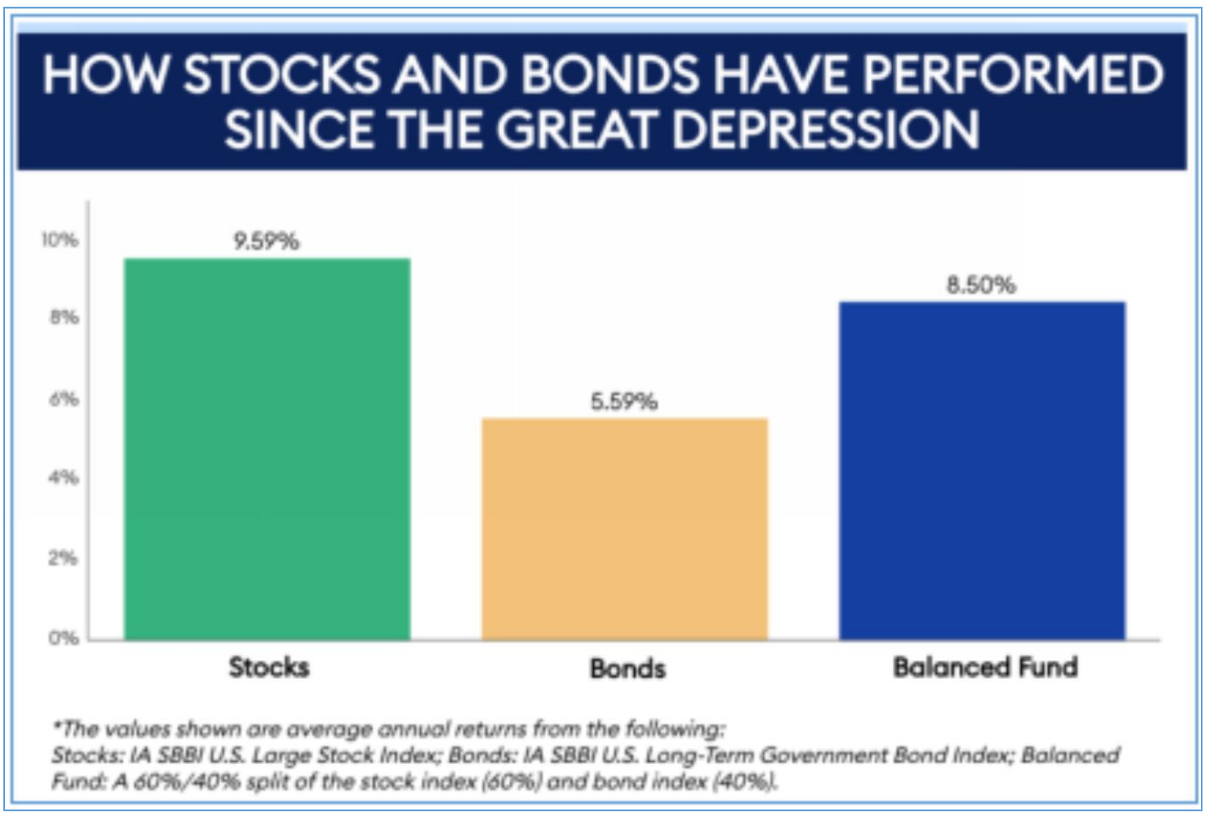



*Figure 6 – Stocks, Bonds, and Balanced Portfolio Performance since the Great Depression. Source: Forbes*[6].

# Real Estate

Real Estate investment refers to an investment in properties to yield returns. Real Estate can be one of the best investments because they have low risks as you are not investing your money in abstract things. In addition, with shelter as a basic living need, you may be confident of good returns on investment.

The most significant disadvantage here is the immense amount you must pay for a single house. However, nowadays, you don't need to buy a house to have a real estate portfolio. There are different other ways to invest in real estate.


*Figure 7 - Average Sales Price of Houses Sold in the United States. Source: FRED[7]*

## Real Estate Investment Trusts (REITs)

REITs, or Real Estate Investment Trusts, are like investment funds that invest in real estate properties such as apartments, shopping malls, and office buildings. By investing in a REIT, you can earn a portion of the rental income the properties generate.

REITs are publicly traded on stock exchanges, which makes them easy to buy and sell, but they also come with risks, such as changes in real estate markets and interest rates.

**Fast Fact:**

According to REIT.com[8], more than 225 REITs in the U.S. are registered with the SEC that trades on one of the major stock exchanges—the majority on the New York Stock Exchange (NYSE). These REITs have a combined equity market capitalization of more than **$1 trillion**.

Here are some examples of well-known REITs:

- **Prologis (PLD)** - focuses on industrial and logistics properties such as warehouses and distribution centers.
- **American Tower Corporation (AMT)** - specializes in investing in and managing cell towers and other telecommunications infrastructure.
- **Realty Income Corporation (O)** - primarily invests in retail and commercial properties in the United States. The company is known for its monthly dividend payments.

## Real Estate Crowdfunding

Real estate crowdfunding is a way to invest in real estate projects by pooling your money with other people online. So instead of needing a lot of money to invest in one property, you can invest smaller amounts in many properties.

There are two main types of real estate crowdfunding: **equity** and **debt**.

With equity crowdfunding, you own part of the property and get a share of the profits, while with debt crowdfunding, you lend money and get interest payments.

Real estate crowdfunding can offer benefits like more access to investment opportunities and diversification, but it also has risks, so it's essential to research before investing.

Here are some of the most popular platforms you can consider that are not for accredited investors only:

Fundrise

"*Our assets drive your returns. We pair our extensive network and expertise with the collective buying power of our investor community to acquire high-quality assets ranging from debt to equity, commercial to residential, and more.*

*We follow a "value investing" strategy of acquiring assets for less than what we believe is their intrinsic value and typically less than their replacement cost. Our team then works to increase the value of each asset over time through hands-on management and in partnership with local operators."*

– [How it works, Fundrise](#)[9]


*Figure 8 – Fundrise Minimum Investment, Fees, and Returns. Source: Fundrise[10]*

RealtyMogul

*"RealtyMogul is a technology platform that empowers members to independently evaluate and invest in institutional-quality real estate opportunities online. Members may use the platform to efficiently and easily browse investment offerings by multiple real estate companies, review detailed financials and sign legal documents securely online."*

– How it works, RealityMogul[11]


*Figure 9 - RealtyMogul Minimum Investment, Fees, and Returns. Source: RealtyMogul[12]*

Yieldstreet

*“Yieldstreet empowers investors to grow their wealth outside the stock market by curating private market alternatives from top investment managers. We’ve designed an effortless platform that provides all the information needed to make informed decisions and monitor your results.”*

– Yieldstreet website[13]


*Figure 10 – Yieldstreet Minimum Investment, Fees, and Returns. Source: Yieldstreet[14]*

Please note that I have no personal experience with the above platforms, and the information relies solely on the achievements claimed by the platforms themselves. Therefore, please consider performing more profound research before making any investment decision.

## Cryptocurrencies

Over the recent years, cryptocurrencies, or simply crypto, have gained massive ground in popularity and usage. The catch about crypto is that it is a very volatile market, so you can take advantage of the volatility if you understand the market well.

You can decide to buy and "hodl" crypto assets. That means you buy coins, store them in your online wallet and wait for the prices to spike to resell and make a profit. Due to the fast growth of crypto, it might also be a good option for long-term investments.


*Figure 11 – Total Crypto Market Capitalization. Source: [Coingecko][15].*

**Fast Fact:**

The total amount of bitcoins is limited.

The protocol for the Bitcoin network was designed with a limit of 21 million coins in mind. As a result, cryptocurrency miners will eventually be unable to generate new Bitcoins.

Currently, there are 19.15 million Bitcoins in circulation. This leaves a few million Bitcoin to be mined, which is one of the reasons mining is still popular.

We will discuss Asset Classes, including Cryptocurrencies, in Chapter 3.

# When to invest

While an investment can be excellent for financial security, it's vital to know the best time to invest, be it in the stock market or any other asset.

Riding the tides, braving through the losses, and putting your money in the right place - can be some of the most daunting aspects of diving into the complex world of stocks.

Let's try to address the question from different aspects.

## The Age - When should you start investing?

The thing with investing is that you can start anytime you have some extra cash in your hand. You can consider the best time to invest in terms of stocks' yields and the market situation, but regarding age, any age is perfect.

Whenever you start the journey, you have to make sure not to stop or withdraw your investment immediately after the first loss. Investing in stocks for beginners might be scary, but steer through the losses, and you'll soon find yourselves on the side of profits.

**Fast Fact:**

Warren Buffett started investing at a young age, buying his first stock at 11 and his first real estate investment at 14.

## Comprehending Market Situations

Timing plays a crucial role in investing in the Stock Market. Here are a few tips you can consider while analyzing market situations and buying stocks:

## Sales on Stocks

We, as consumers, always tend to go crazy when there is a flash sale, but it can be the opposite for investors. Before you enter a trade, establish a price range at which you'd like to buy a particular stock and stick to it. Herd mentality tends to be problematic in the Stock Market, so watch out!

This is also known as the "buy the dip" strategy. That means you set a target price drop and buy when that is reached. See the below chart of Apple (AAPL) as an example:


*Figure 12 - Apple stock price chart. Built with [Tradingview](Tradingview)*[16]

Please note that I do not advocate technical analysis with this particular example. Instead, I want to say there are good entry opportunities even for companies with solid fundamentals.

When correctly applied to a rising-trend stock, this technique helps to maximize profits by increasing the probability of a good entry.

We will dedicate a complete chapter to technical stock analysis later in the book.

# Analysis and Reports

Keep tabs on the stocks you wish to buy - study reports, analyze articles, and don't lose track of the prices. You can also check the company's prospects, annual reports, financial statements, etc.

This task is not easy, and financial reports are difficult to understand. As this chapter is intended to provide basic information for beginner investors, we will not dive deeper into the financial analysis here but rather dedicate a complete chapter to this point.

I want to show you how regular Earning Reports can drive stock fluctuations that can become valuable opportunities.


*Figure 13 – AMD price chart. Two volatility points. Built with [TradingView]*

In the picture above, we can observe at least two extreme volatility points coming after AMD's Earning Reports, i.e., the price jumps up the next day after the report is published.

Of course, this might not necessarily be a long-term trend indicator, but considering that you might face volatility after the report is worth considering.

**<u>Fast Fact:</u>**

On September 21, 2000, Intel Corp. (INTC) announced that it expected its revenues to grow by up to 5% in the next quarter. Although that sounds like an outstanding achievement, the stock dropped by 22% the next day. That is simply because Wall Street analysts expected revenue growth of up to 10%.

Looking at the results compared to the previous years has minimal impact on the direction of the stock. What's more important are the two factors that help investors gauge the current and future performance: How a company performed vs. analyst expectations and how management expects the company to perform in the future.

I use the [SeekingAlpha[17]]() platform for evaluating Earning Reports of companies. Here is how it looks:


*Figure 14 – AMD Earnings as shown on [SeekingAlpha[18]]().*

## Undervalued Stocks

Everybody loves bargains. Wouldn’t you buy a car worth $30,000 for $10,000?

That is Value Investing, i.e., it is an investment strategy that involves identifying undervalued stocks and purchasing them with the expectation that their price will increase over time when the market recognizes their true value.

This approach is based on the principle that the market sometimes misprices a company's shares, creating opportunities for savvy investors to buy low and sell high.

You can get inspiration from well-known value investors, including Warren Buffett, Benjamin Graham, and Seth Klarman. These investors have used value investing principles to achieve long-term success in the stock market.

You can determine whether the stock is undervalued by using fundamental valuation techniques like Discounted Cash Flow (DCF). If the value of the stock is below this number, then it’s considered a good buy, i.e., the stock trades below its intrinsic value.

Besides that, the other indicators used to determine the right value of a stock are P/E Ratio and PEG Ratio.

We will dive deeper into the subject of fundamental analysis later in the book. However, you should know that you do not have to perform the investigation alone, as some platforms do that for you.

A good example is SimplyWall.st[19], which gives you much information at a glance and is not limited to valuation.


*Figure 15 – Valuation of Realty Income (O) as shown on SimplyWall.st[20]*

In general, this strategy is considered conservative. However, it proved itself quite efficient when used correctly.

The real gems are the stocks with both proper valuation and excellent growth prospects. Unfortunately, the stock market does not have many of these.

It is believed that value stocks tend to over-perform the market long term, i.e., produce higher returns than the market benchmark, which is most commonly the S&P500 index.

To check this, we will analyze the performance of the iShares Core S&P U.S. Value ETF (IUSV) compared to S&P500. (More about ETFs in Chapter 3).


*Figure 16 – IUSV vs. S&P500. Built with [TradingView](TradingView)*

Long-term over-performance is obvious, but it might be different when you analyze different, smaller periods.

## Timing the Market

You can roughly estimate the best time to buy and sell stocks by trading on a particular hour, day, or month.

Market volumes are highly volatile in the opening hours, so staying away during these hours is wise.

Afternoon hours are the calm hours - it might be the best time for investing in stocks for beginners.

The Stock Market tends to drop on Mondays. Oh, and also during the end of the year.

It is a very controversial subject whether one can really time the market, so this is why we have the following investing approach on the list.

# Dollar-Cost Averaging (DCA)

This is an investment strategy in which an investor divides up the total amount to be invested across periodic purchases to reduce the impact of volatility on the overall purchase. The purchases occur regardless of the asset's price and at regular intervals.

In other words, this is a technique that excludes the attempt to time the market. It works particularly well with broad market indexes such as S&P500 or NASDAQ100 because they also average the overall market performance.

If you are a beginner investor and are unsure about your risk tolerance and would prefer to be more conservative with your money, this might be the right choice for you.

But as the name suggests, you shall expect "average" returns using this technique.

Let’s do an exercise and evaluate the performance of an “All in” approach versus a DCA approach for 2021. For this purpose, we will use the PortfolioVisualizer[21] tool.

In the DCA case, we start with a minimal amount of just $1, then make 12 contributions of $1,000 throughout the year. In the “All in” case, we put our $12,000 beginning of January directly.

Here are the results:

| Portfolio | Initial Balance | Monthly Contribution | Total Invested | Final Balance | Money Earned |
|---|---|---|---|---|---|
| DCA in 2021 | $1.00 | $1,000 | $12,001 | $13,531 | $1,530 |
| All in 2021 | $12,000 | $0 | $12,000 | $15,449 | $3,449 |

*Figure 17 – DCA vs. “All in” approach for 2021. Built using PortfolioVisualizer*

As you might have expected, the total return is significantly lower for the DCA approach. This is because 2021 was a perfect year; thus, it was more profitable if you invested as much as possible at the beginning of the year and harvested more return.

However, interesting results might be obtained if we examine a negative year. The same exercise for 2022 is below:

| Portfolio | Initial Balance | Monthly Contribution | Total Invested | Final Balance | Money Lost |
|---|---|---|---|---|---|
| DCA in 2022 | $1,00 | $1,000 | $12,001 | $11,440 | -$561 |
| All in Jan 2022 | $12,000 | $0 | $12,000 | $9,819 | -$2181 |

*Figure 18 - DCA vs. "All in" approach for 2022. Built using [PortfolioVisualizer]()*

Now, you can see the bright side of the coin. The DCA technique enabled us to limit our losses strongly.

# Closing thoughts on investing questions

It is tough to pinpoint the best time to invest in a portfolio, but following these techniques can push your luck and make it work out. Also, keep a close eye on the market and watch out for recurring trends - these will help you.

The simplest thing you can do is to regularly contribute an amount of your savings to investing.

There are two main types of goods: assets – they put money in your pocket; liabilities – they drain money out of your pocket.

You can use a simple financial philosophy: use your income to acquire assets, then use the money generated by the assets to finance your liabilities and lifestyle.

# Key Take Aways

Investment is the best way to preserve and grow your wealth over time because inflation eats up cash.

There are multiple options for investing, such as The Stock Market, Certificates of Deposits, Bonds, Real Estate, and Cryptocurrencies.

The earlier you start investing, the better. Warren Buffet started at the age of 11!

Comprehending market situations can help to identify when a particular stock is good to invest in. There can be opportunities such as sales of stocks (known as dips), earnings reports release, and times when a stock is undervalued.

Dollar-Cost Averaging can be a great technique in minimizing risk, as you invest smaller amounts on regular periods rather than all in at once.

It is very controversial whether one can adequately time and beat the market consistently.

# 2

# Accessing the market

## Let’s go Shopping

*"Given a 10% chance of a 100 times payoff, you should take that bet every time."*

**— Jeff Bezos**

Founder and former president and CEO of Amazon

If you reached this page, you probably decided to step forward and start your investment journey. That's very good. The next step you shall do is to reach the market.

# What is an investment Broker?

You cannot simply call the public contact number of the company you want to invest in and ask it to sell you some shares. Instead, you need an intermediate who does the transaction for you on your order. These intermediates are called **brokers**.

Their primary role is to facilitate the buying and selling securities such as stocks, bonds, and other financial instruments on behalf of their clients.

Investment brokers provide investment advice, research financial products, and execute trades for their clients. They also help clients make informed investment decisions by providing analysis, recommendations, and market insights. Investment brokers typically earn a commission on the trades they execute on behalf of their clients.

There are different types of investment brokers, including full-service brokers offering a wide range of services, including financial planning and portfolio management, and discount brokers offering lower commission rates but not providing the same level of personalized service.

Some investment brokers also specialize in specific types of investments or cater to particular clients, such as institutional investors or high-net-worth individuals.

# Examples of Brokers

Luckily, there are many of them available, and nowadays, the commissions are pretty affordable. Furthermore, the trading process became very simple and straightforward due to the internet technology. You can trade stocks from your smartphone using the broker's app.

The competition in the industry is stiff, and many options are available to you. However, based on features such as usability, trading technology, and fees, you can pare down the options and choose the best. So, here we highlight some of the most well-known.

## eToro

eToro is a top-tier broker registered with the top-level regulatory authorities, UK's Financial Conduct Authority (FCA), and the Australian Securities and Investment Commission (ASIC).

Its comparative advantage is the social trading service it provides.

The eToro's innovative CopyTrader tool enables you to automatically copy other investors' trades. As a result, it can help you find investors whose knowledge and professionalism you believe in and replicate their actions in real-time.

eToro makes many financial instruments available to clients, including the most traded stocks, cryptocurrencies, and ETFs.

Moreover, the broker offers zero-commission stock trading. Also, its CFD and forex trading fees are low. However, the broker's non-trading fees can be high: it charges as much as $10/month after a one-year inactivity and a $5 withdrawal fee.

## Fidelity Investments

Fidelity Investments is your best shot if you are looking for a broker that offers financial planning and advice, straightforward pricing, and robust investing tools.

Based on the Fidelity Retirement Score, which is based on your answers to the broker's six questions, you can see the Individual Retirement Account (IRA) option that might be right for you.

With Fidelity, you can either manage your investment yourself at no account fee or minimum deposit restriction or contract them to do so for you for an advisory fee.

Fidelity Investments provides its clients with tax-smart investing, which is designed to help you keep more of what you earn, fixed-income solutions that may save you up to $15 per bond, zero expenses on index mutual funds, and zero commission on online trading for US stocks and ETFs.

## TD Ameritrade

If you are a beginner, then TD Ameritrade should be your choice. TD Ameritrade is renowned for its industry-leading education and research.

There are tools such as the Market Edge, which offers timely information and technical analysis of the markets; ETF Market Center and Stocks Overview, which are respectively tailored to help you monitor your ETF portfolio and stock positions; and Screeners with which you can find stocks, options, mutual funds, or ETFs that meet your predetermined selection criteria, and Market Java for daily market news.

The broker provides multiple platforms, so you will always get fit, no matter your expertise level. In addition, the interface of its proprietary desktop trading platform, Thinkorswim, is intuitive enough for beginners to use.

Finally, its fees are reasonable. There are no commissions, platform fees, data fees, or trade minimums.

## Interactive Brokers

InteractiveBrokers

Via its award-winning platform and services, Interactive Broker provides the opportunity to invest globally in stocks, options, futures, currencies, bonds, and funds.

Its IBKR's powerful technology suite helps you optimize your trading speed and perform advanced portfolio analysis. In addition, it offers different account types from which you can choose: individual account, joint or trust account, retirement account, family advisor, non-professional advisor, and institutional account.

Perhaps, Interactive Broker's best offer is its transparent, low commissions starting at $0 and low financing rates, which help to minimize costs and maximize returns.

However, some clients can have their access to its platform or some of its functions restricted. For example, IBKR Lite clients can't use IBKR's SmartRouter. Moreover, inexperienced investors may struggle with its intimidating interface.

## Charles Schwab

Charles Schwab is a full-service broker with millions of clients investing trillion dollars worth of assets.

The broker charges $0 on listed stocks, ETFs, options, and mutual funds. Plus, there are no trade or account minimums, and there is a satisfaction guarantee.

With Charles Schwab, you can choose how to invest: do you want to manage and trade your investments? Do you want to use automated investing and professional guidance? Or do you want to plan and invest with an advisor? You are free to choose. And, with the customizable, tax-efficient Schwab Personalized Indexing, you can employ a personalized direct indexing strategy to separately manage your account.

However, Charles Schwab's forex and cryptocurrency catalog is poor, if not non-existent. And its effective base rates can be too high for those trading on margin.

**Fast Fact:**

Vanguard is the largest brokerage firm by Assets Under Management (AUM), managing $8.1 trillion in assets as of March 31, 2022, up one trillion from 2021.

It is followed by Charles Schwab, with an AUM of $6.6 trillion, which managed roughly a trillion dollars more in 2021.

# Broker aspects to consider

## Available Instruments

The more comprehensive the range of provided financial instruments is, the better. Check what companies they offer geographically. Are they offering ETFs and Bonds? Mutual funds can also be for future interest, as well as Options, Futures, and Derivatives.

Investment brokers can also advise on the various financial instruments available and help you make informed investment decisions based on your risk tolerance, investment goals, and financial situation.

## Fractional Shares

Fractional shares are partial shares of a company with less than one full share. Fractional shares are essential when you have to invest a certain amount of money in a stock, but the stock's price is higher than the amount invested.

For example, if you have $100 to invest in a stock, but the price of one stock is $150, you can only purchase 0.67 shares, which is a fractional share.

This allows you to invest in high-priced stocks that might otherwise be out of reach and also helps you to diversify your portfolio by allowing you to purchase smaller amounts of multiple stocks.

## Account Management Fee

A stockbroker account management fee is a fee a broker or investment advisor charges for managing an investor's account. It is usually a percentage of the total assets under management and covers the cost of investment advice, portfolio management, and the investor’s account monitoring. The fee can vary depending on the broker or advisor, the type of account, and the account size.

You need to understand the fee and compare it between brokers and advisors to ensure you are getting a fair rate for the services provided.

## Transaction Costs

A stockbroker transaction cost is a fee a broker charges to buy or sell a financial instrument on your behalf. The cost can vary depending on the broker, the type and size of the trade, and the traded instrument.

There usually are two types of transaction costs:

**Commissions** – a fee the broker charges to execute a trade. For example, it can cost you $1 to execute a purchase order for a stock. It can be a fixed amount or a percentage of the trade size.

**Spread** – it works similarly as in the case of foreign exchange. You are buying the stock at a higher price than it is traded on the stock exchange while selling it at a lower price. For example, you buy a $100 stock at $101 (while someone sells it at $99). Although it is not evident at first sight, the transaction cost was 1% in this example. This technique is usually used by brokers claiming "Zero Commission."

## Withdrawal Fee

A stockbroker withdrawal fee is a fee a broker or financial institution charges when you withdraw funds from your investment account. This fee can be charged for various reasons, such as processing the money withdrawal, transferring the funds to another account, or closing the account.

## Inactivity Fee

A stockbroker inactivity fee is a fee a broker charges when your account is inactive for a certain period.

The fee is charged to cover the costs of maintaining the account. The amount and period for the fee can vary depending on the broker.

You should be aware of the fee and take action to avoid it, such as making a trade or depositing funds into the account. Some brokers may waive the fee under certain circumstances, such as maintaining a minimum account balance or making a certain number of trades per year.

## Dividend Crediting Fee

A stockbroker dividend crediting fee is a fee a broker or financial institution charges to process and credit dividends to your investment account.

Avoid this fee, as the dividend payments belong to you, not your broker.

Check also all other fees and conditions, as the fee structure is often very complex.

## Investor Protection Fund

This type of insurance fund protects you in case a broker or financial institution fails. Regulatory authorities in many countries establish and maintain these funds to provide a safety net for investors in case their investments are lost or at risk due to the failure of their broker or financial institution.

Note that it refers to losses due to broker failure, not in case of bad investments made by you.

# Closing Thoughts on Brokers

**What is the best broker for you?**

This question is tricky for many out there because it isn't easy to change after a month or two if you don't like it. It isn't like changing your e-mail address, so you better take your time and choose wisely!

I know you do not yet have an investing strategy and you just started to learn about investing, but try at first to figure out what your goal is:

- Speculative trading, short trades?
- Cryptocurrency?
- Long-term investing?
- Dividend focused?

Regardless of the broker you choose, understanding what you are doing is still very important. So make sure you are carefully going through the book to understand the principles and learn how to make good investment decisions.

# Key Take Aways

You need a broker to access the stock market. The broker will execute the transactions on your orders.

Not every broker provides access to the same range of financial instruments.

Consider all commissions and fees. There are many of them, and they are often quite complex

Be aware of spread. You have zero commission, but you pay more for the stock.

There is a vast number of online brokers. Make sure to select the one that meets your criteria best by evaluating your goals first.

# 3

# Asset Classes

## Variety is Our Specialty

*"Don't look for the needle in the haystack. Just buy the haystack!"*

**— John Bogle**

Founder and chief executive of The Vanguard Group

In the world of so many asset classes, you might wonder, “What is the best asset class for me”?

Asset classes refer to a group of investment vehicles that exhibit the same financial structure and behave similarly in a marketplace. For instance, Apple (APPL), Tesla (TSLA), and Microsoft (MSFT) are all grouped as equities, as they share the same structure, trade on the same stock exchange, and exhibit movements that are positively correlated.

Different asset classes often have low or negative correlations due to exhibiting different behavior based on macroeconomic factors. Investible assets include both tangible and intangible instruments, which investors buy and sell to generate money through long or short-term capital appreciation.

Major asset classes include Equities, Commodities, ETFs, Index Funds, and Cryptocurrencies.

In this chapter, we will define them, and you will be able to understand which one fits you better.

Before we dive in, I want to emphasize that investing in the stock market always involves risks regardless of the asset class. Therefore, it’s essential to do your own research and consult with a financial advisor before making any investment decisions.

# Stocks (or Equities)

Stocks are referred to as “equity,” and they are part ownership in a private or public company, which guarantees proceeds in the form of dividends, and payouts at the time of liquidation after all the debts are paid.

The term ‘Equity’ gained popularity in the late Middle Ages due to a system of equity law developed in England to meet the growing demand for commercial activity. While traditional bonds have fixed coupon payments as routine cash flow, comparable dividend payments from equities are usually much less certain.

In principle, as a shareholder, you are rewarded for owning part of the business in the form of the profits derived by the company after paying for all operational costs. This is either paid out through the form of dividends or reinvested back into the business, which leads to capital appreciation over the long term. We will talk more about the ways to make money with stocks in Chapter 4.

Shareholders who buy into the company typically receive voting rights, which they can use to influence the company's direction by voting for candidates they prefer in a board election or by voting on key management policies that can impact the company’s revenues.

## Who are Equities for?

For those who want Passive Income – you can expect an annual return of under 5% in the form of dividend payments.

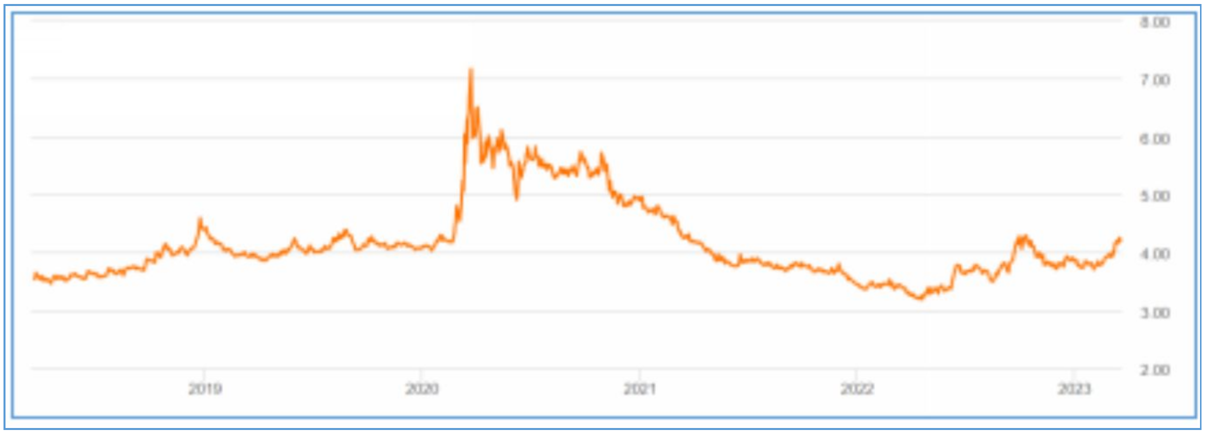



*Figure 19 - Invesco S&P 500 High Dividend Low Volatility Portfolio ETF (SPHD) Dividend Yield. Source: SeekingAlpha[22].*

For those looking at Capital Appreciation - Equities have been the best-performing asset class over the last century, with average long-term returns of over 8% per year, making them a lucrative investment opportunity.

For those looking to own Business Decisions - Equities give investors part ownership in the underlying business. Thus, if you can build a sizeable stake in the business, you can influence the direction taken by the company over the short and long term.

## Who should stay away from Equities?

Those who don't understand the underlying business - novice investors usually make the mistake of buying stocks for capital appreciation rather than understanding the company's fundamentals. In such cases, investors are better off parking money in an index fund and seeing long-term growth.

Those looking to protect their investment - while equities have had a solid track record of generating substantial value creation over the years, investing in the wrong stock can be detrimental. Instead, investors can choose to invest in an ETF that comprises a broad range of assets, including Equity, Debt, Commodities, and Cryptocurrencies, which delivers market returns while lowering risk.

## Type of stocks

There are numerous criteria that stocks can be grouped based on; however, I will describe below some of the most relevant categories.

**Large-Cap Stocks**: Large-cap stocks represent companies with a market capitalization greater than $10 billion. These stocks are often well-established and tend to be more stable than smaller companies.

Some good examples are: Apple Inc. (AAPL), Microsoft Corporation (MSFT), Johnson & Johnson (JNJ)

**Mid-Cap Stocks**: Mid-cap stocks represent companies with a market capitalization between $2 billion and $10 billion. These stocks can provide a balance between growth potential and stability.

Among this category, we can enumerate: United States Steel Corp. (X), Silicon Laboratories Inc. (SLAB), and Bread Financial Holdings Inc. (BFH).

**Small-Cap Stocks**: Small-cap stocks represent companies with a market capitalization between $300 million and $2 billion. These stocks are often considered riskier than larger companies but can provide significant growth potential.

Probably you never heard about Sinclair Broadcast Group Inc. (SBGI), Jackson Financial Inc. (JXN), or iStar Inc. (STAR).

**Fast Fact:**

On January 6, 2021, Shares of Signal Advance, Inc (SIGL, market cap. $10 million) skyrocketed over 6000%, from about $0.6 to over $38, in only three trading days.

This happened after Tesla CEO Elon Musk prompted Twitter followers to “use Signal.” He was actually referencing the Signal messaging app, not the small component manufacturer.

SIGL shares dropped dramatically when that was clarified and reached the old trading price in a few months.

**Growth Stocks**: Growth stocks are stocks of companies that are expected to grow at a faster rate than the overall market. These stocks often have high price-to-earnings ratios and tend to reinvest earnings back into the business for growth.

Some well know growth stock examples are Amazon.com Inc. (AMZN), Tesla Inc. (TSLA), and Shopify Inc. (SHOP).

**Value Stocks**: Value stocks are stocks of companies that are currently undervalued by the market. These stocks often have low price-to-earnings ratios and may offer high dividend yields.

Some well-known value stock examples are Coca-Cola Co. (KO), ExxonMobil Corp. (XOM), and Berkshire Hathaway Inc. (BRK.A).

**Dividend Stocks**: Dividend stocks are stocks of companies that pay regular dividends to their shareholders. These stocks are often considered more stable and provide income to investors.

Here are some examples: Realty Income Co. (O), AbbVie Inc. (ABBV), and Altria Group, Inc. (MO).

## 3 Steps to Select a Stock

**Research the company**:

Before investing in any stock, it's crucial that you research the company to understand its business model, financial performance, competitive position, and growth prospects. You can start by reviewing the company's annual reports, financial statements, news articles, and analyst reports.

**Analyze the stock's valuation**:

Once you have identified a company you are interested in, you should analyze its stock valuation to determine if it trades at a reasonable price. This can involve looking at metrics such as price-to-earnings ratio, price-to-sales ratio, and dividend yield, among others.

**Consider the macroeconomic environment**:

The macroeconomic environment can significantly impact a company's performance and the stock market's performance as a whole. Therefore, when selecting a stock, you need to consider factors such as interest rates, inflation, and geopolitical risks.

# Commodities

Commodity markets include raw materials used to create final products and production-grade commodities like Oil, Gas, and Gold and consumable commodities like Wheat, Sugar, and Coffee. Commodity markets have come a long way since farmers had to bring in bushels of wheat and corn into a market.

Things changed in the 1800s when a centralized commodities future exchange was developed to create standardized contracts for agricultural products. Since then, exchanges have been set up worldwide to trade futures and options across various commodities, including agricultural products, metals, and energy products.

As opposed to Equities and Bonds which are Financial Assets, Commodities are real assets that behave differently to external macroeconomic factors. In contrast to stocks and bonds, whose returns erode due to inflation, Commodities are a rare exception, which tend to outperform during high periods of inflation. As demand rapidly rises during periods of high inflation, a commodity's underlying price also increases.

## Who are commodities for?

For those looking to protect their portfolio against inflation - As commodities are inflation-resistant and, in many cases, are the primary beneficiary of high-inflation periods in history, they act as an excellent hedge against inflation in any investor's portfolio.

For those looking for diversified returns - Commodities have historically seen a low correlation compared to stocks and bonds, thereby de-concentrating risk and generating positive returns during downturns.

For those looking to take risky, high-growth bets - Since commodities typically have an 18-24 month cycle from boom to bust, they can often deliver returns over 300-400% if bought at the right time, making it a very lucrative opportunity.

*Figure 20 – Gold price since 1970. Built with [TradingView]*

## Who should stay away from commodities?

For risk-averse people - Commodities are highly speculative instruments and can erode wealth quickly if the market has already seen a top.

Those who prefer predictable returns - Due to its highly cyclical nature, it is far more difficult for investors to predict commodity returns than other asset classes.

Just look again at Figure 20. You wouldn't be too happy if you bought it in 1980 or 2012.

Thus, "Gold is safe-haven" must be adequately understood. It refers to financial and political uncertainty since Gold is not at risk of becoming worthless, unlike usual currencies (FIAT money).

**Fast Fact:**

Zimbabwean central bank began to print money at a staggering pace in response to severe economic problems in the early 2000s, resulting in hyperinflation.

The currency lost 99.9% of its value during this time, and consumers were forced to carry bags of money just to purchase basic staples. The Zimbabwe government was forced to issue a 100-trillion Zimbabwean dollar note at the height of the crisis.

## 3 Steps to Select a Commodity

**Research**: Conduct thorough research on the commodity you are interested in investing in. Look at the current market trends, supply and demand factors, and historical performance of the commodity. In addition, it is important to understand the key drivers of price movements and any geopolitical or economic factors that could impact the commodity.

**Assess Risk**: Consider the risks associated with investing in the commodity. Commodities can be highly volatile, and their prices can be affected by various factors, such as natural disasters, geopolitical events, and global supply and demand changes. So make sure to evaluate the risks before making an investment decision.

**Evaluate Investment Options**: Consider the investment options available for the commodity. You can invest in commodities through futures contracts, exchange-traded funds (ETFs) like SPDR Gold Shares (GLD) or iShares Silver Trust (SLV), or by buying physical commodities such as gold or silver. Each option has advantages and disadvantages, so it is essential to evaluate which option suits your investment goals and risk tolerance.

# Cryptocurrencies

Cryptocurrencies are digital currencies that act as a medium of exchange trade based on decentralized blockchain technology. Cryptocurrencies are unlike the US Dollar and the Euro as they are not backed by a central authority like a reserve bank but are broadly distributed through a decentralized network.

While Bitcoin and Ethereum are the most popular cryptocurrencies, there are over 5,000 tokens that serve as a store of value, utility, and payment transfers.

A few years ago, cryptocurrencies seemed like a niche limited to just some tech-savvy speculators looking to make some money. Still, cryptocurrencies have exploded in popularity in recent years and are the world's fastest-growing asset class. They crossed a market capitalization of $2 trillion in 2021.

Such growth and scale suggest that traditional investors can no longer consider Cryptocurrencies as just speculation, as it has risen to prominence as an asset class like no other.

## Who are Cryptocurrencies for?

For those who prefer an anti-authoritarian system - Since cryptocurrencies run on a decentralized network, they are immune to government interference and manipulation, such as devaluation, and act as a hedge in case of hyperinflation or the potential collapse of a government.

For those looking for a hedge against future risk in their Portfolio – it is believed that Bitcoin could replace gold in the future as a store of value and act as a hedge against inflation.

For those who think that Crypto is the future - Cryptocurrencies and related technologies are poised to disrupt industries across finance and law, leading to capital appreciation in the future.

# Who Should Stay Away from Cryptocurrencies?

Those who don't like Volatility - Cryptocurrencies have seen massive volatility and fluctuations, with prices for tokens varying by 5-10% in a single day and larger drops accounting for 1/5th of the price on some days.

For the skeptics - early investors in Cryptocurrencies have largely succeeded because they believed in the vision of decentralized technology.

Investors looking to cash in on the "recent boom" in Cryptocurrencies while not believing and understanding the project should stay away, as a slight downturn can make them sell their entire portfolio.

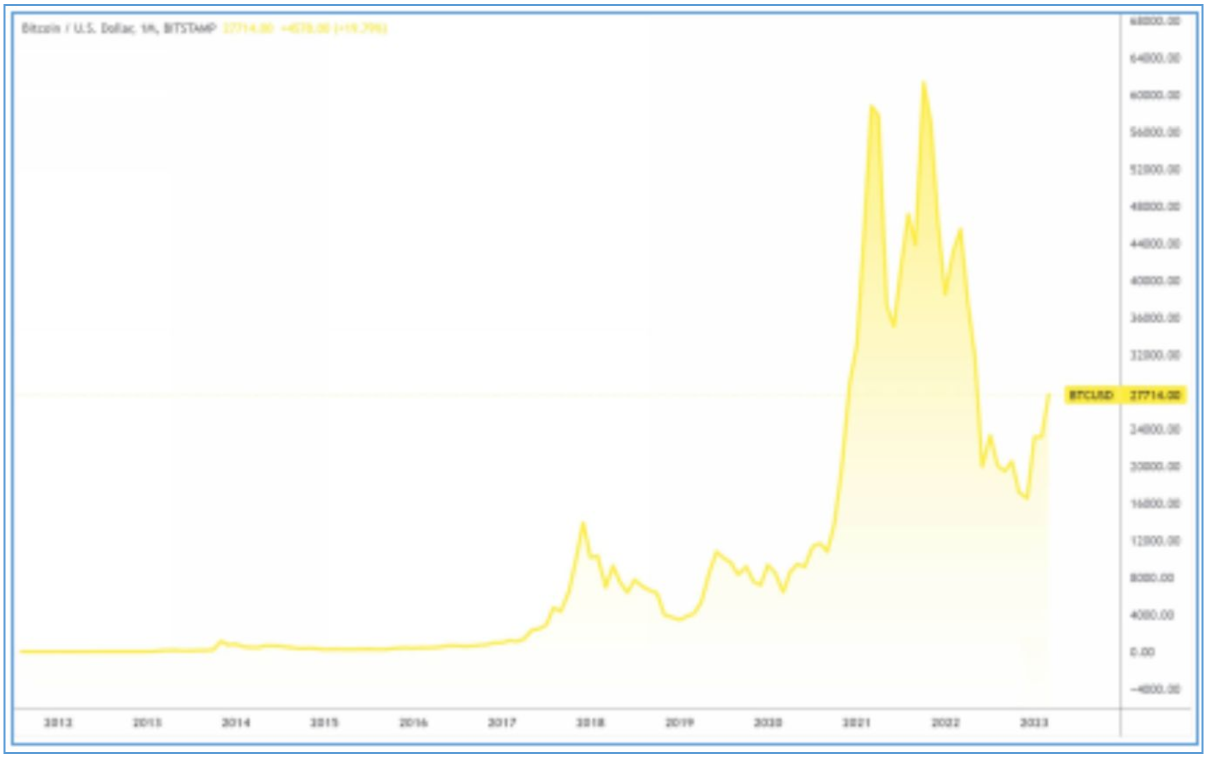


*Figure 21 – Bitcoin price. Built with [TradingView]*

**Fast Fact:**

Nigeria is Africa's largest crypto market.

Crypto adoption in Nigeria is increasing exponentially due to the constant depreciation of the Naira. The country now has more than 50% monthly active adult crypto traders, as many citizens prefer to store their money in digital currencies rather than fiat cash.

Despite the Nigerian government's ban on cryptocurrencies in 2021, many Nigerians continue to trade them. According to Merchant Machines data, Nigeria will be at the forefront of global crypto adoption by 2030.

## 3 Steps to Select a Cryptocurrency

**Understand the Technology**: Cryptocurrencies are based on blockchain technology, a decentralized ledger that records all transactions. It is important to understand how the technology works and the potential use cases for the cryptocurrency you are interested in investing in. This can help you assess its long-term viability.

**Diversify Your Portfolio**: It is important to diversify your cryptocurrency portfolio to reduce the risk of loss. Consider investing in multiple cryptocurrencies with different market capitalizations and use cases. This can help you balance your risk and returns.

**Set your Goals**: Cryptocurrency markets can be highly volatile, so it is essential to consider whether your goal is speculating or long-term investment. Evaluate the potential growth prospects of the cryptocurrency you are interested in. Consider holding the investment for a time horizon appropriate to your targets to ride **out** or **on** market fluctuations.

It is important to note that past performance does not indicate future results, which also applies to Crypto.

| | Name | Price | Market Cap | Last 90 Days | Dominance |
|---|---|---|---|---|---|
| 1 | Bitcoin BTC | $28,056.79 | $542,163,179,157 | | 46.4806% |
| 2 | Ethereum ETH | $1,763.56 | $215,813,915,840 | | 18.5087% |
| 3 | Tether USDT | $1.00 | $76,953,503,652 | | 6.6026% |
| 4 | BNB BNB | $335.12 | $52,912,087,199 | | 4.5414% |
| 5 | USD Coin USDC | $0.9984 | $35,303,755,737 | | 3.0293% |
| 6 | XRP XRP | $0.3918 | $19,962,100,168 | | 1.7153% |
| 7 | Cardano ADA | $0.3397 | $11,792,471,938 | | 1.0126% |
| 8 | Polygon MATIC | $1.13 | $9,827,419,268 | | 0.8445% |
| 9 | Dogecoin DOGE | $0.0723 | $9,591,722,755 | | 0.8237% |
| 10 | Solana SOL | $22.44 | $8,608,463,229 | | 0.7392% |

*Figure 22 – Top 10 Crypto coins and their market dominance. Source: Coinmarketcap[23]*

# Mutual Funds

Mutual funds are investment vehicles that pool money from multiple investors to invest in a diversified portfolio of stocks, bonds, and other securities. When you buy shares in a mutual fund, you essentially buy a small portion of the entire portfolio.

Mutual funds are managed by professional fund managers responsible for selecting the securities to be included in the portfolio and making investment decisions on behalf of the investors. They charge a fee, known as an expense ratio, for their services.

Mutual funds offer several benefits, including diversification, professional management, and liquidity. This makes them a popular choice for individual investors who want to invest in the stock market but do not have the time or expertise to manage a portfolio independently.

# Exchange-Traded Funds (ETF)

Unlike stocks, where you buy a part of a single business, Exchange Traded Funds or ETFs enable you to hold various underlying assets under one single transaction. An ETF can be structured to track a particular index like the Nasdaq or S&P500, sectors like Automobiles or Technology, Commodities like Steel and Iron Ore, or even specific investment strategies.

As ETFs are traded actively on the exchange, they are comparatively cost-effective and more liquid than mutual funds, which trade only once daily after the market's close.

You can buy ETFs to suit your various needs, whether it may be passive income generation, speculation on macroeconomic scenarios, or hedging against unexpected risk.

For instance, Bond-based ETFs aim to deliver income in regular intervals (income is subject to the performance of underlying bonds), while Commodity ETFs are a great hedge against an economic downturn.

## Who are ETFs for?

For those looking to diversify their investments - Investing in ETFs enables you to spread your finances across a range of assets, resulting in significantly less risk than individual stocks, bonds, or commodities.

For those looking at lower-risk investments, passively managed ETFs tend to be less risky compared to Mutual Funds and Individual Equities due to improved risk mitigation strategies employed.

For those looking at low fees - ETFs provide affordable access to investors who want to enter the market.

## Who should stay away from ETFs?

Active-Investors - Investors who prefer to trade actively on instruments like equities, commodities, and crypto or underlying instruments such as futures and options are better off not investing in ETFs if they can generate higher returns than the market.

Those who need access to Liquidity - If an ETF is thinly traded, there can be problems getting out of the investment, especially if the investment size is large relative to the average trading volume.

## 3 Steps to Select an ETF

**Determine Your Investment Goals**: Consider your investment goals and objectives. For example, do you want to invest in a specific market segment or asset class, such as technology or emerging markets? Do you want to invest in a low-cost, diversified portfolio? Understanding your investment goals and objectives can help you determine which ETFs to consider. There is an ETF out there for almost anything you can think of.

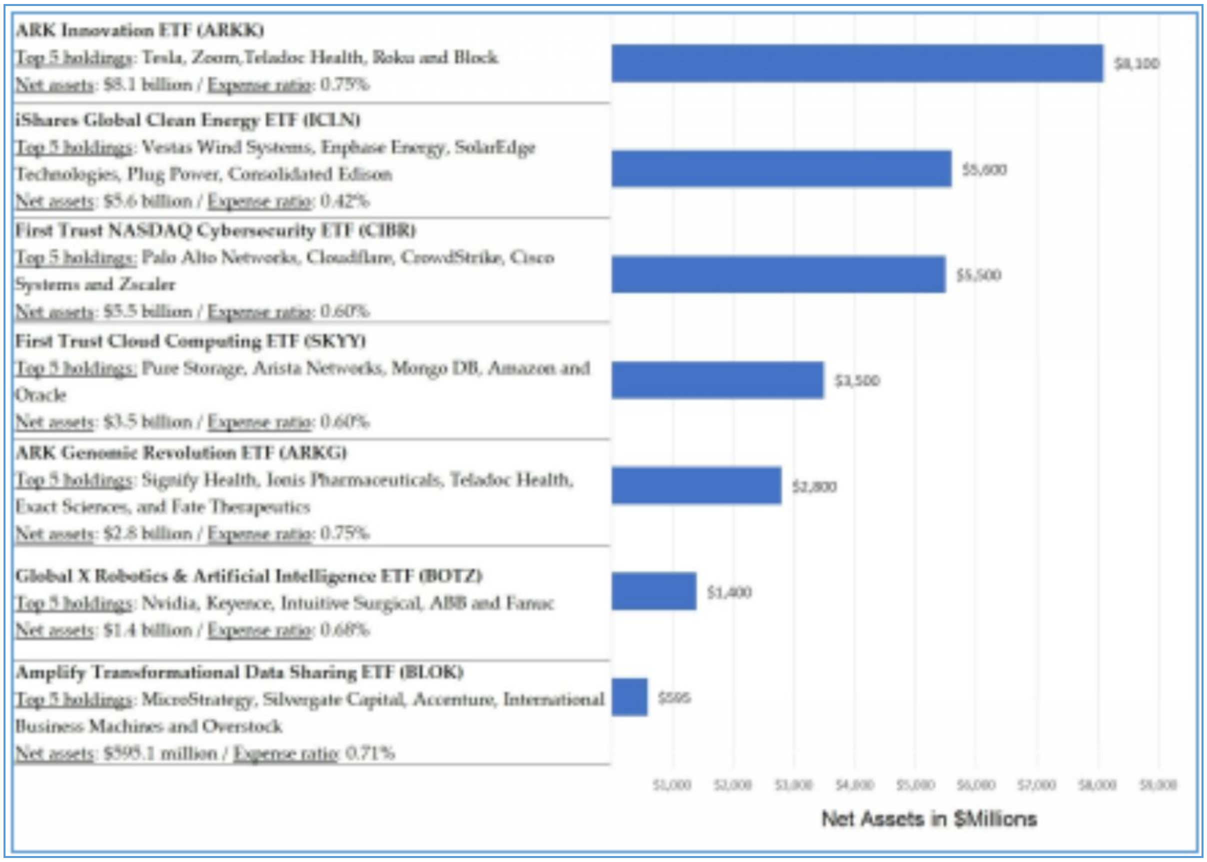



*Figure 23 – Some of the biggest thematic ETFs. Build based on data from [Bankrate.](#)[24]*

**Analyze Costs**: ETFs charge management fees, which can impact your investment returns. Compare the expense ratios of the ETFs you are considering to identify the ones with the lowest costs. Additionally, consider the trading costs associated with buying and selling the ETF, including brokerage commissions and bid-ask spreads.

**Evaluate the ETF Provider**: Consider the provider's track record, reputation, and financial stability. Additionally, consider the provider's experience in managing ETFs and their commitment to transparency and investor education. A reputable and experienced provider can give you confidence in the ETF's investment strategy and management.

# Index Funds

An Index Fund is a type of mutual fund that tracks the performance of a particular market index, such as the S&P500 or FTSE100.

The reason why I mention S&P500 so often in the book is that it used to be a market benchmark. Since it is composed of the 500 largest companies in the US, it actually can reflect the economic status itself.

Here are the top ten holdings of S&P500 as of March 2023:

| | |
|---|---|
| APPLE INC. | 6.31% |
| MICROSOFT CORPORATION | 5.4% |
| AMAZON.COM, INC. | 2.68% |
| ALPHABET INC. | 1.73% |
| BERKSHIRE HATHAWAY INC. | 1.64% |
| ALPHABET INC. | 1.55% |
| NVIDIA CORPORATION | 1.42% |
| EXXON MOBIL CORPORATION | 1.4% |
| UNITEDHEALTH GROUP INC. | 1.36% |
| TESLA, INC. | 1.36% |

*Figure 24 – Top 10 S&P500 holdings as of March 2023*

Index funds allow you to track the market index, as you cannot directly invest in the index itself.

The index allocates a certain percentage into each equity, through a weighted average method, based on the company's market capitalization.

Since Index Funds rely on a passive strategy, they tend to have lower management fees than active funds.

The index fund and the ETFs are both passive investment vehicles that aim to replicate the performance of a particular market index. However, there are some key differences between the two:

- **Trading**: ETFs are traded on stock exchanges like individual stocks, while index funds are bought and sold through the fund company at the end of each trading day. ETFs trade pretty much similar to stocks.

- **Cost**: ETFs often have lower expense ratios than index funds but may also incur trading costs if bought and sold frequently.

- **Minimum investment**: Index funds may have a higher minimum investment than ETFs, making them less accessible for some investors.

For your information, I include below the chart of two major indexes since 1990: S&P500 and Nasdaq.

*Figure 25 - S&P500 and Nasdaq since 1990. Built using [Tradingview](Tradingview).*

# Closing Thoughts on Asset Classes

There is no perfect asset class. Perhaps, the best thing an investor could do is to hold all of them in some proportion.

You must also understand their behavior in different market situations and economic cycles. Therefore, I encourage you to study charts and fundamental information before jumping on a particular asset type. This way, you will be better prepared and will better know what to expect.

# Key Take Aways

Stocks (equities) are for those who want to hold a share in a particular company or business.

Stocks are not for those who do not understand the underlying fundamentals, i.e., buy a company for its fancy name.

Commodities are suitable for diversification as they provide a hedge against market downturns.

The volatility of commodities shall not be underestimated.

Cryptocurrency's high volatility makes them great for speculative traders.

Watch out for Cryptocurrencies if you are risk averse investor and cannot afford long drawdown periods.

ETFs are good for passive investors who want implicit diversification.

ETFs are not appropriate for active traders who cannot stay hands-off.

# 4

# Making Money

# The Sky is the Limit

*"The individual investor should act consistently as an investor and not as a speculator."*

**— Ben Graham**

The father of value investing

Stock Markets have been creating wealth for investors for more than a century. $10,000 invested in the stock market 50 years ago could have resulted in a portfolio worth hundreds of thousands if not millions, today.

This chapter will cover the two main ways of making money in the stock market and other possibilities to increase profits.

**Fast Fact:**

Dutch East India Co. was the first company to issue shares to the public as early as 1602.

Amsterdam Stock Exchange was founded in the same year and is considered the world's oldest, still-functioning stock exchange.

The company and its tulip bulbs-carrying ships contributed to a supposed stock market crash in 1634, later called "Tulipmania."

# Capital Appreciation

Capital Appreciation is the difference between the market price of a particular stock (or other financial instrument) and the purchase cost. Capital Appreciation is taxed once the trade is realized (closed), at which point it is referred to as Capital Gains.

For instance, if you buy Tesla stock today at $191 per share, and the price rises to $250 in a year, the capital appreciation would be $59 per share. This $59 will be considered capital gains if you sell the position and book the profit.

For reference, you can see the Tesla stock price evolution since it went public:

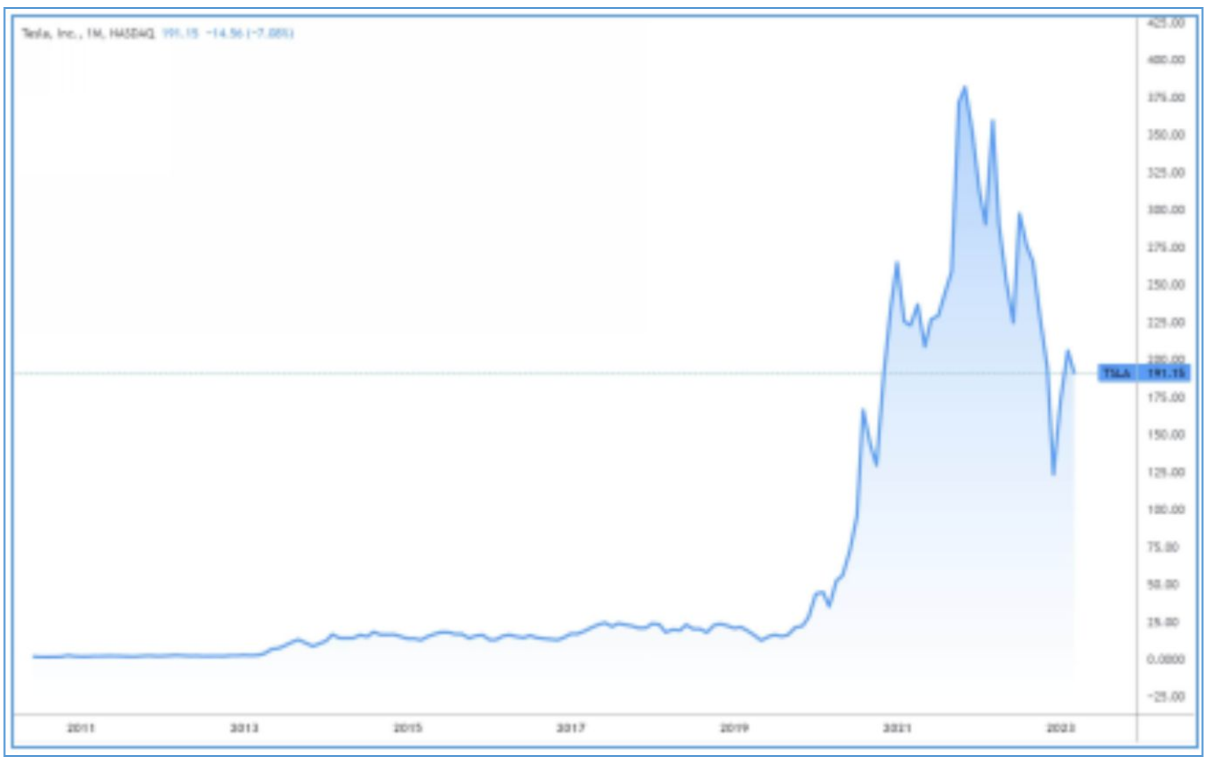



*Figure 26 – Tesla stock price chart since IPO. Built with Tradingview*

Investors are taxed on capital gains in two slabs based on the duration, including short-term capital gains (stock bought and sold in less than a year) and long-term capital gains (stock purchased and sold in longer than one year).

## What drives the stock prices

Several factors can lead to capital appreciation of stocks. Of course, you already know some of these factors if you read this book's other chapters. So, let's enumerate some of the major drivers and look at some examples.

## Improvement in fundamentals

These are factors such as growing earnings, announcing a new cutting-edge technology or competitive advantage, and so on.

For example, on October 27, 2020, semiconductor designer Advanced Micro Devices (AMD) said it had agreed to buy Xilinx in a $35 billion all-stock deal[25]. The deal would broaden AMD's business into chips for markets like 5G communications and automotive electronics.

Although not exactly on the same day, the AMD share increased rapidly.

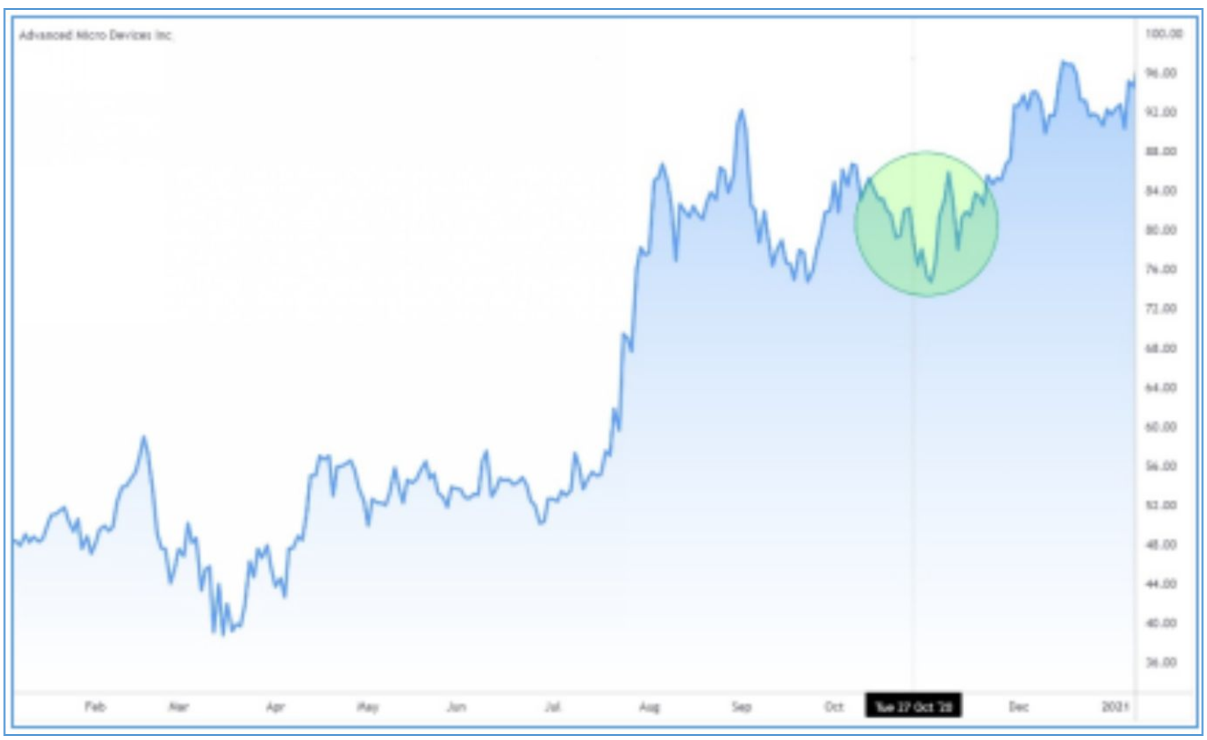


*Figure 27 – AMD Stock Chart for 2020. Built with TradingView*

Of course, you might say AMD had anyway a great year overall, which is true. But for sure, the Xilinx acquisition helped to stem the growth, and it looks like it marked a transition from the sideways drifting to a new rising trend.

## Price pressure

This phenomenon is well reflected in product sales. The idea here is that the discounted prices of some products will eventually create an increased demand.

So, it works with stocks. Investors “buying the dip” might drive the price up due to high purchase volumes, i.e., high demand. Although this would barely reverse the trend, it could cause some upswings.

This kind of effect is closer to the so-called “Technical Analysis,” which we will cover in detail in Chapter 6.

## Exceeding Analysts’ Expectations

The case of Intel on page 36 was an example of not meeting expectations. However, the opposite can occur when exceeding them.

A recent positive example occurred on February 1, 2023, when Meta Platforms (Meta) shares popped by over 20% in a single day after the company reported fourth-quarter revenue that topped estimates and announced a $40 billion stock buyback[26].

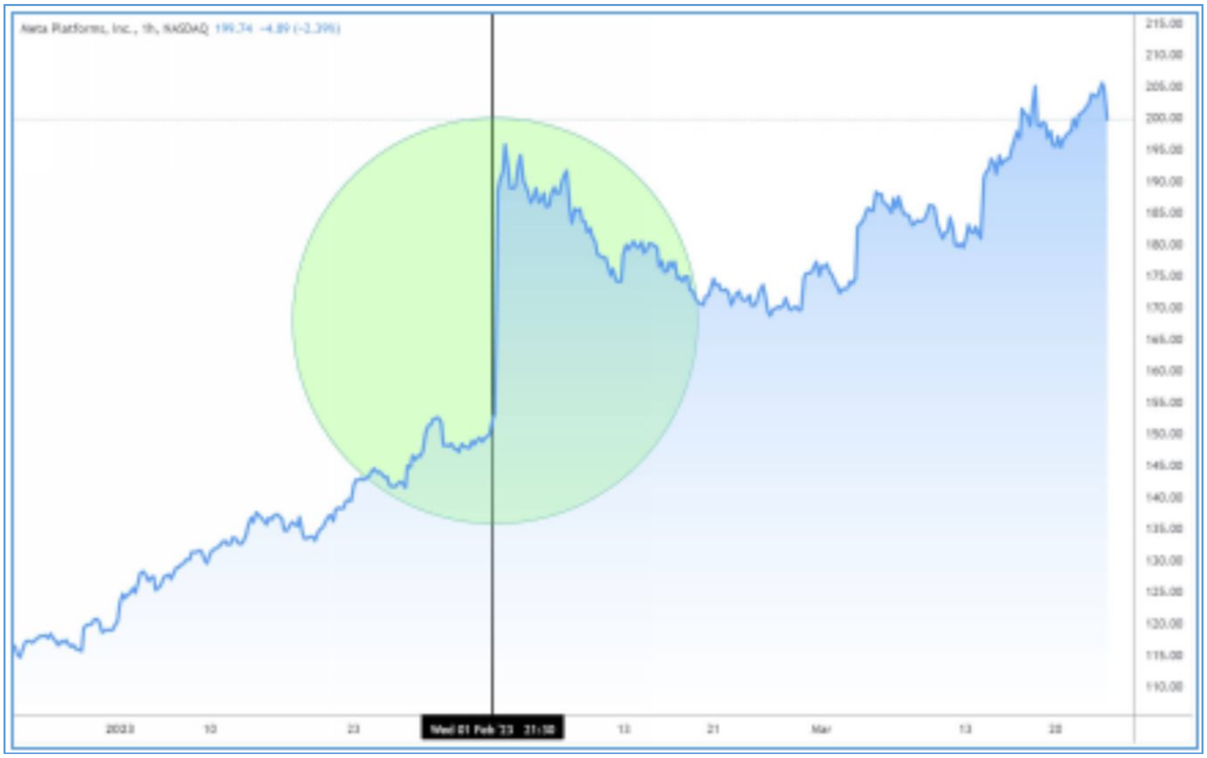



*Figure 28 – META soars after exceeding expectations. Built with TradingView*

There are plenty of similar examples. You probably already noticed that this roller coaster is more associated with growth, usually tech stocks.

**Here is a further note about analysts**.

Imagine there is a crystal ball, which at some moment says: “The price of stock ABC will double next year.” What do you think happens next? People will rush to buy stock ABC to make a good profit. The increased demand will drive the stock price up.

This is called the “Pygmalion effect” and is kind of a self-fulfilling prophecy.[27]

To some extent, this is sometimes applicable to stock markets as well. For example, when high-reputation analysts estimate that a stock price will go up for some reason, they also drive increased demand for that stock as investors suddenly become more positive about that company.

An analyst price target is usually available for major stocks you can access on various platforms.

When analysts provide a price target for a stock, it represents a level at which they consider the stock to be reasonably valued based on its projected and historical earnings. If an analyst increases their price target for a stock, it typically implies that they anticipate the stock price to increase.


*Figure 29 – Analysts' historical price target as shown on SimplyWall.st*

There are also a variety of complex mathematical algorithms that claim to predict the price of a stock. I do not want to mention them here.

Please note that the price target is not a "Crystal Ball" and that a company's stock is more than just math. Many other factors influence stock prices. So, use the estimations and algorithms with caution and for indication only.

> **Fast Fact:**
>
> Joseph Foresi from Cantor Fitzgerald is Ranked the #1 top analyst according to the research done by TipTranks in 2020. His success rate was 89%, with 333 out of 376 successful ratings. If you copied Joseph's ratings since 2010 and opened each position for the duration of 1 year, then 89% of your transactions would have been profitable with an average return of +24.3%[28].

## Increase in dividend payments

This one is straightforward. When a company announces it will pay a higher dividend, the stock price will eventually rise, as more investors would like to hold it and receive good dividends, i.e., there is a demand increase.

In addition, when a company raises its dividend, it is a good sign that things are going well and there is some extra cash to distribute to investors. This positive sentiment encourages the demand for the stock.

## Macroeconomic factors and overall market sentiment

To obtain a good example of the impact of the overall market sentiment, we should go no further than 2022, when the interest rates were significantly raised in an attempt to combat the rising inflation. This is because a rise in interest rates slows down credit circulation in the economy, which in turn should ease inflation.

As a consequence, the stocks went down. Higher input costs and margin pressures can lead to stocks underperforming.

Additionally, other investing vehicles become more attractive due to the higher rates, such as Certificates of Deposit or Bonds.

The 10-year treasury yield peaked at 4.21% in October 2022, from a record low of 0.55% in July 2020. Of course, the record lows resulted from trying to stimulate the economy during the Pandemic, but the pre-pandemic yields were bottoming at 1.5% in 2019, which is still significantly lower.


*Figure 30 - 10 Year Treasury Rate Yield 2018 – 2023. Source: Macrotrends[29]*

We can see a similar picture for Certificates of Deposit.

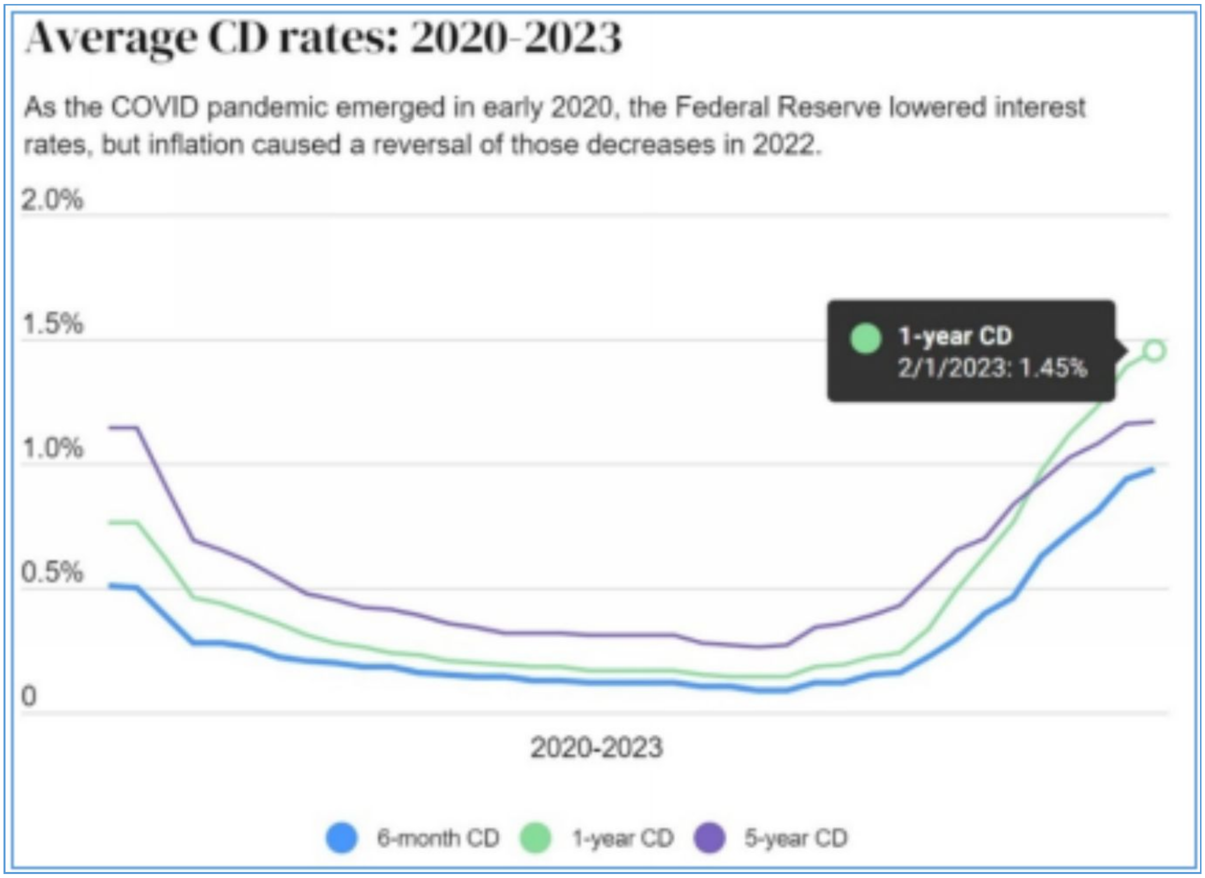



*Figure 31 – Average CD rates 2020 – 2023. Source: Bankrate[30]*

It is obvious that an increasing attractiveness will raise the demand as well. But where do investors get the money from?

That's right; out of stocks! What happens is that there is a capital movement from stocks to safer vehicles. As an investor, it is reasonable that you will reduce your allocation in stocks (yielding 8% -10% on average, but with a good portion of risk) to get more bonds at 4.5% and significantly lower risk.

**What do you think is likely to happen next?**

Since stocks are down, they trade at excellent valuations, which makes them more attractive again, which, in turn, increases the demand and stems the prices.

This leads to economic cycles. It is such a complex and exciting subject that I will write a book about it.

Besides the difference between the buy and sell price, there is one more way you can make money by holding your stock – DIVIDENDS.

# Dividends Income

Dividends are periodic cash payments that companies distribute to their shareholders. When a company generates profit, it pays out a percentage of these profits as dividends, while the remaining is kept with the company as retained earnings.

For a company to pay out the dividend, it needs to be approved by the shareholders of the company. In addition to recurring dividends, companies also make special dividends in some cases, such as the sale of a subsidiary.

I understand if you have the impression that dividends are old-fashioned; however, they can play a crucial role in your passive income stream during periods of a market downturn.

An attractive thing about dividends is that they can serve you as a regular side income.

Furthermore, they can be re-invested so that they generate additional income. That may sum up to significant numbers.

**Still skeptical? Look at the example below.**

One of the high dividend payers is Enviva Inc. (EVA), which is paying at the moment (March 2023) an incredible 12.8%.

I want to show you below two charts, first is a portfolio holding EVA and relies solely on the price evolution, i.e., no dividend reinvestment. The second chart is also a portfolio holding EVA but re-invests all the dividends paid.

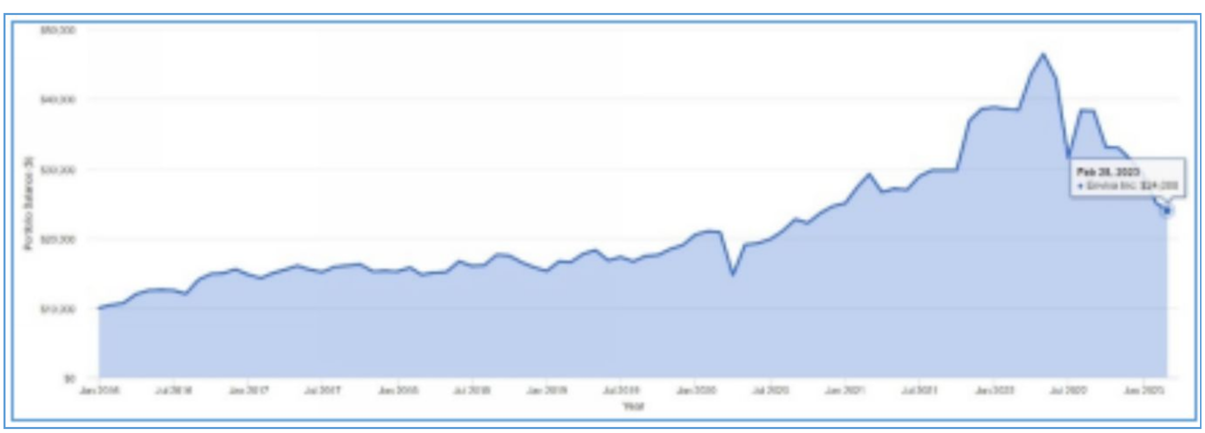


*Figure 32 – EVA Portfolio; No Dividend Re-investment. End balance $24,000*

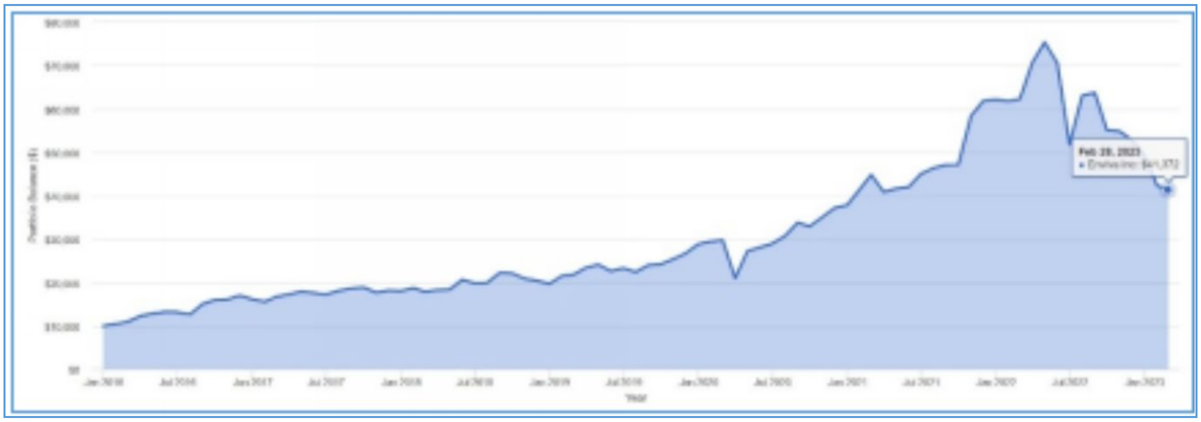


*Figure 33 - EVA Portfolio; With all Dividends Re-invested. End balance $41,372*

Yes, you have seen it right! There is a $17,372 difference, or over 72% more!

You may be wondering why some companies pay dividends while others don't. As a rule of thumb, large, established companies with predictable earnings, such as Banks, Oil, Gas, and Utilities, tend to pay the highest dividends, as they want to maximize shareholder wealth in addition to the normal growth seen from the business.

The average return from dividends has been between 1-2%, although established companies can pay dividends as high as 7-8%.

**Fast Fact:**

Altria Group (MO) has been the best stock on the market over the past 50 years (if we include reinvested dividends). A dollar invested in Altria in 1968 would have turned into $6,638 by 2015; this amounts to a mere 663,700% of total return or 20.6% annually[31].

Capital Appreciation and Dividend Re-investment topics inevitably bring us to talk about wealth accumulation over time, which we will address in the next section.

# Compounding interest

Compounding interest is one of the most powerful tools in the world of finance. It is a simple concept that can significantly impact your wealth over time. In this section, we will explore compounding interest, how it works, and how you can use it to your advantage.

## What is Compounding Interest?

> "*Compound interest is the eighth wonder of the world. He who understands it earns it; he who doesn't pays it.*" – Albert Einstein.

Compounding interest is the interest earned on the initial principal amount and the accumulated interest from previous periods. In other words, it is interest on interest.

The compounding effect can be significant, as the interest earned in one period is added to the principal for the next period, resulting in a higher amount of interest earned, i.e., 10 + 10 = 21.

## How Does Compounding Interest Work?

Let's say you invest $1,000 at an annual interest rate of 5%. At the end of the first year, you will have earned $50 in interest. If you leave the $1,050 in the account at the end of the second year, you will make $52.50 in interest, bringing the total balance to $1,102.50.

If you leave the money in the account and earn 5% interest each year, the balance will continue to grow, and the amount of accumulated interest each year will increase. This is the power of compounding interest.

The compounding effect is even more significant over more extended periods. For example, if you invest $10,000 at an annual interest rate of 8% and leave it untouched for 30 years, the balance will grow to $100,627. This is more than ten times the initial investment, and most of the growth is due to the compounding effect.

This 8% we always refer to is also called Compounded Annual Growth Rate, or CAGR.

The longer the period over which the interest is compounded, the more significant the impact of compounding interest. This is why it is essential to start investing early and let your money compound over time. Even small amounts invested early in life can grow significantly over long periods.

## Maximizing the Benefits of Compounding Interest

To maximize the benefits of compounding interest, there are several strategies you can use. Besides starting investing early in life, you can also reinvest your earnings. When you receive interest or dividends from your investments, reinvest them into the account. You saw the example with EVA from page 87.

Additionally, you can contribute a portion of your savings monthly to your account. These small investments will definitely pay off with time.

You might question yourself, **when does compound interest take off**?

A good answer would be when the total annual earnings exceed the total annual contributions.

Let's say you start with an initial amount of $1,000 at a reasonable annual yield of 8%, and contribute just $100 each month, i.e., you contribute in total by $1,200 each year.

With the above input data, you will start earning more than $1,200 after nine years, i.e., more than you actually contribute each year.

## Compounding Interest Formula

The formula is of moderate complexity and involves some exponential calculus. Here is what the simplified version, without periodic contributions, looks like:


*Figure 34 – Simple Compounding Interest Formula*

The so-called "Rule of 72" was invented to simplify calculus further. It is widely used to calculate the years required to double the invested money at a given yield. It goes like this:

"The annual yield times the number of years to double equals 72."

So, you have to divide 72 by the annual yield to get the number of years to double.

For example, your initial investment of $1,000 at an annual rate of 8% will take nine years. (72 / 8 = 9)

Note that the same is valid for your annual contributions from the above example, which means it is not dependent on the amount. Money is money; it just doubles.

You can use this simple calculation method to get some fast figures. However, for more advanced information, you do not have to make the calculations yourself, as compounding interest calculators are available where you just plug in your inputs.

## Compounding Interest Calculators

This is such a helpful tool that I have even embedded one on my site, which you can use for free.[32]

Here is how a 10% yield example is illustrated:

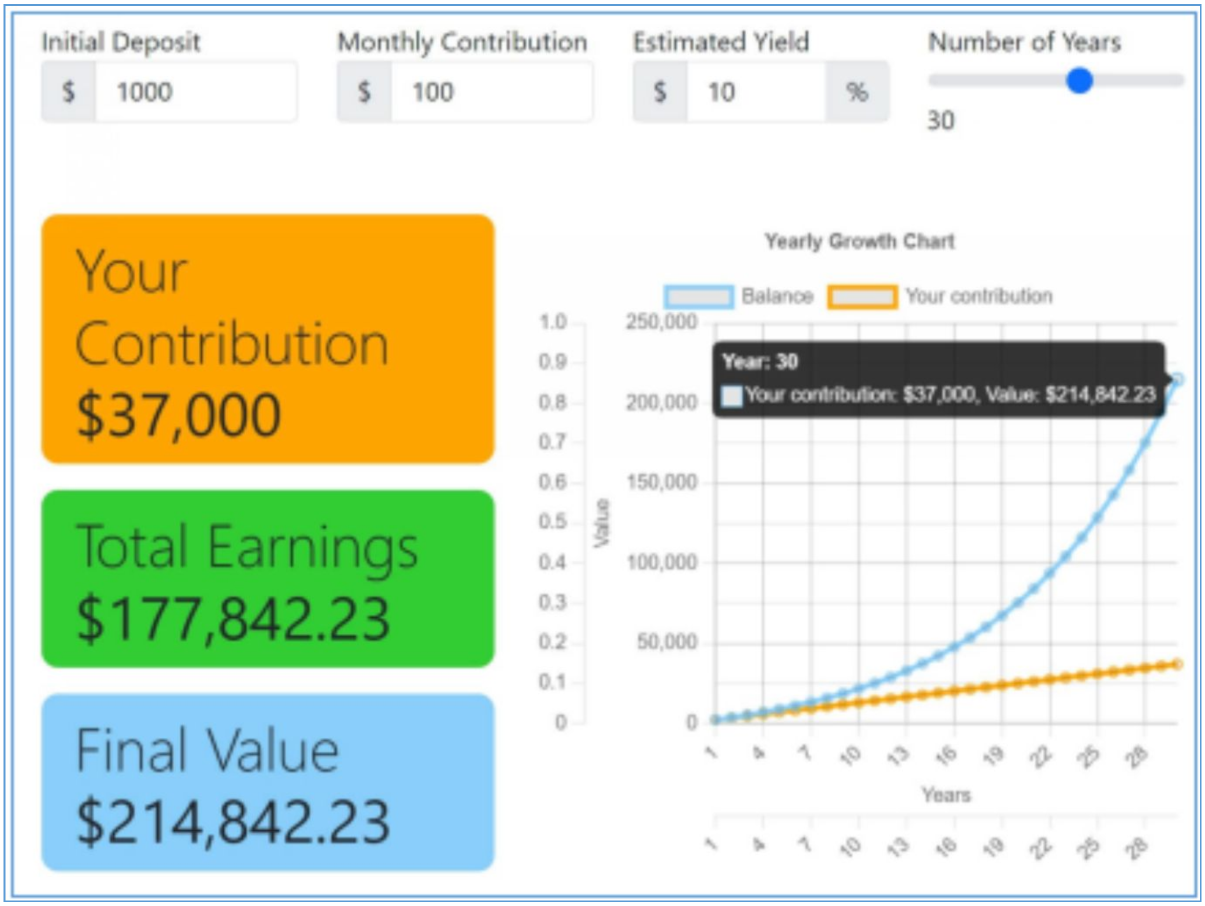



*Figure 35 – Compounding Interest Calculator. Source: [ARTInvest]()*

So, in our modest example, we have contributed only $37,000, and our total earnings topped $177,000. This is a remarkable example of why simply saving is not the key to wealth.

Note that the numbers are not inflation adjusted.

The chart is interactive; you can hover over different years to see the data points.

## Conclusion on Compounding Interest

By understanding how Compounding Interest works and maximizing its benefits, you can take control of your financial future and build long-term wealth. So, start investing early, reinvest your earnings, and contribute periodically to make the most out of the compounding interest.

**Fast Fact:**

The Lenape people sold an island, now called Manhattan, in the early 1600s, for some goods worth about $16.

Manhattan real estate is now some of the most expensive in the world; what a terrible deal the American Indians made.

However, had the American Indians invested their $16 and received 8% compounded annual interest, not only would they have enough money to buy back all of Manhattan, they would still have several hundreds of millions of dollars left over.

But there is a drawback to this method as well. The problem is that it shows the average returns based on an average rate of return. It does not tell us anything about fluctuations in the stock market.

Please keep this in mind when investing and prepare yourself with a lot of patience and persistence to navigate times of market downturns. Remember that Compounding Interest is a long-term strategy.

# Gain Amplifiers

In addition to the above techniques, you can make even more money by trading equities using leverage and other instruments such as futures and options.

Financial leverage is a powerful tool that has the potential to magnify returns and enhance profitability, but it can also amplify risks and lead to catastrophic losses.

> *"When you combine ignorance and leverage, you get some pretty interesting results."* — Warren Buffett.

Whether you are trading stocks, taking out a leveraged loan, or investing in Forex, understanding the concept of leverage is essential to making informed financial decisions.

This section will explore what leverage means, how it works, and the risks and benefits associated with using it in various financial contexts. We will delve into the formula for leverage, the advantages and disadvantages of leveraged loans, and the potential rewards and pitfalls of investing with leverage.

## What Does Leverage Mean?

In the world of finance, leverage is a popular investment strategy that involves using borrowed money to increase the potential returns on investment.

Essentially, the borrowed capital, i.e., debt, is used to undertake a project or investment. The upside is that it can multiply potential returns, providing an opportunity for significant gains. These gains result from the difference between the investment returns from the borrowed money and the cost of borrowing the money (in this case, interest).

However, it's important to note that leverage multiplies the potential downside risk if the investment doesn't pan out. That's why it's crucial to approach leverage cautiously and carefully weigh the risks and rewards before using it.

## Understanding What is Leverage in Trade

Let us look at an example to understand what leverage is in trade. In the case below, we mainly look at leverage on stocks, which will elaborate on how leverage is calculated.

Let's say the trader wants to invest in Intel stock, currently trading at $28.50 per share. They believe that the stock is undervalued due to a potential announcement of an investment by the US government to fund semiconductor companies to manufacture in the US, thereby leading to a jump in the stock.


*Figure 36 – Intel Stock Price Chart. Built with TradingView*

The trader decides to use leverage to maximize returns. In this scenario, they use 8x leverage to borrow $14,000 from their broker, giving them a total investment of $16,000. With the new capital, the trader can purchase 561 shares of Intel stock at the current price of $28.50 per share.

When news shows that Intel has received a significant $30 billion investment from the US government, the stock shoots up to $33/share. This results in the trader's investment worth $18,513, representing a profit of $2,513, a 2.25x return on the original investment, as opposed to a measly return of 15.7% had the trader not used any leverage.

So far, so good.

# Advantages and Disadvantages of Leverage

Before you rush out to invest with leverage, let’s weigh both the advantages and disadvantages more carefully.

## Advantages of Leverage

**Amplified profits**: Leverage can help investors increase profits by boosting their winning investments. With additional upfront capital, returns on winning trades can be exponential.

**Access to more expensive investments**: Leverage also allows investors to access more expensive investment options that would otherwise be out of reach with smaller upfront capital.

## Disadvantages of Leverage

**Higher downside risk**: While leverage can increase profits, it also comes with higher risk. Losing investments can be amplified, sometimes resulting in losses greater than the initial capital investment.

**Additional fees**: Brokers and contract traders charge fees, premiums, and margin rates, even on losing trades. This means you will still be on the hook for extra charges, even if you lose on your trades.

**Complexity**: Leverage can be complex and requires investors to know their financial position and the risks they inherit. This may require additional attention to their portfolio and capital contribution if the trading account does not have sufficient equity per the broker's requirement.

# Types of Financial Leverage

## Margin Loan

A margin account is a brokerage account that enables you to borrow money from a broker to purchase securities. The margin varies depending on the type of asset purchased and based on the broker.

Here, we can talk about leverage ratios, which are financial metrics that measure the amount of debt an investor has relative to his assets or equity to assess its total exposure.

For example, a leverage of X2 means that the total exposure of an investor is double its contribution in equity.

A very illustrative example that will bring some revelating light can be obtained if we try to set up a leveraged trade on Etoro.

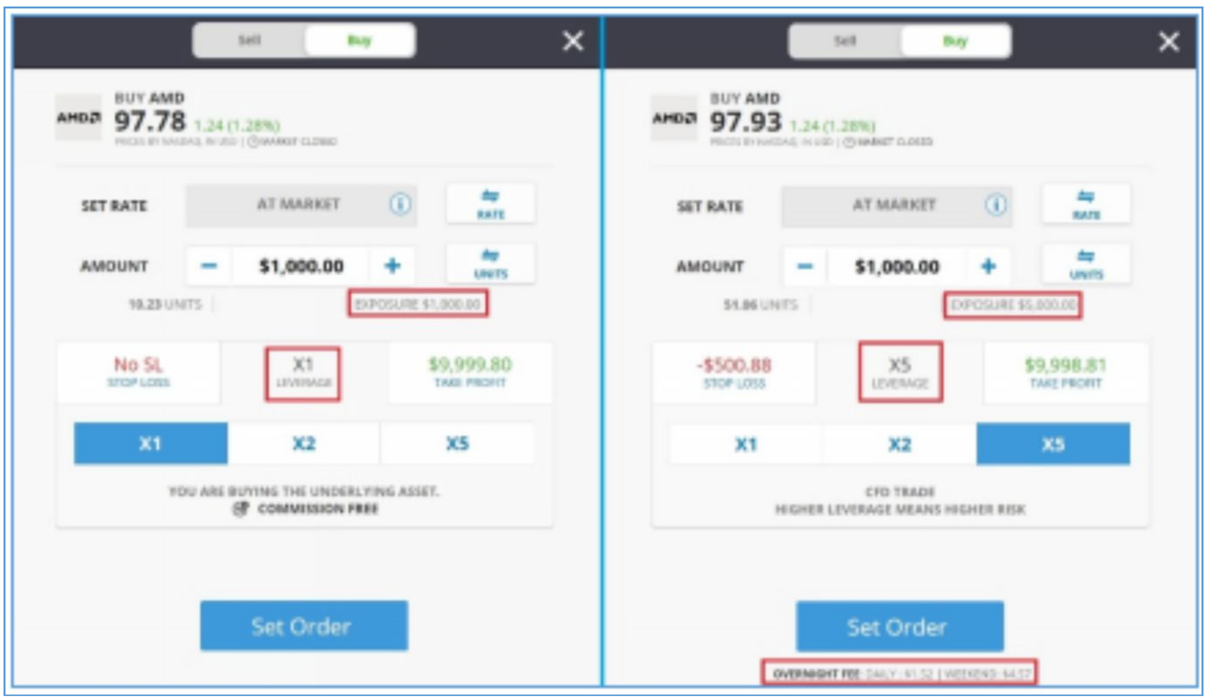



*Figure 37 - Non-Leveraged vs. Leveraged position on Etoro*

The left picture shows the process of setting up a non-leveraged position, i.e., Leverage is "X1". As expected, the $1,000 invested equals the total exposure of $1,000.  That means you can use your money to purchase 10.23 shares of AMD stock.

Note that this is also a commission-free trade (not counting the spread).

The right picture shows the process of setting up an X5 leveraged trade. As you can see, the total exposure of $5,000 is five times higher than our investing amount of $1,000. This results in the fact that you can now purchase 51.06 shares of the same AMD stock, i.e., five times more.

Note that you do have a fee in this case. You must pay that fee regardless of whether you gain or lose money with this trade.

An additional note is that in this case, the order is a CFD (Contract For Difference), i.e., you are not buying the underlying asset.

The purchase price is also higher, as the platform applies a higher spread for leveraged trades.

So, let's now evaluate potential gain vs. potential loss.

**Potential gain**

Suppose we would like to close the trade and harvest the profits when our capital increases tenfold. So, we will set the "Take Profit" at $10,000.

In the X1 leverage case, we have to wait for the AMD stock to hit $1,075 per share ($10,000 / 10.23 shares + $97.78 initial price).

In the X5 leverage case, we only have to wait for the AMD stock to hit $293 ($10,000 / 51.06 shares + $97.78 initial price).

Below is the generic formula for any leverage ratio.

$$\text{Target Price} = \frac{\text{Target Profit} \times \text{Purchase Price Per Share}}{\text{Investment Amount} \times \text{Leverage}} + \text{Purchase Price Per Share}$$

*Figure 38 - General Formula for Leverage*

$$\text{Target Price} = \frac{\$10{,}000 \times \$97.78}{\$1{,}000 \times 1} + \$97.78 = 1{,}075.58$$

*Figure 39 - Target Price Calculation in Case of X1 Leverage*

$$\text{Target Price} = \frac{\$10{,}000 \times \$97.78}{\$1{,}000 \times 5} + \$97.78 = 293.34$$

*Figure 40 - Target Price Calculation in Case of X5 Leverage*

The difference is noticeable; you could make tenfold your money while the stock only tripled in price.

**Potential Loss**

As you might have already guessed, the potential loss is also amplified.

Assume we would like to close the position and support the loss at -50%; in other words, we admit to losing $500.

In case of no leverage, it's simple. If the share price halves, we lose 50% of our investment amount, i.e., at a share price of $48.89.

However, in the case of X5 leverage, the -50% loss would be hit at a much higher stock price. In other words, a significantly smaller drawdown would cause us to lose -50%. To be more exact, in the case of X5 leverage, we would lose half of the invested money if the stock price drops to $88!

$$\text{Target Price} = \frac{\$-500 \times \$97.78}{\$1{,}000 \times 1} + \$97.78 = \$48.89$$

*Figure 41 - Calculating Loss with X1 leverage*

$$\text{Target Price} = \frac{\$-500 \times \$97.78}{\$1{,}000 \times 5} + \$97.78 = \$88$$

*Figure 42 - Calculating Loss with X5 Leverage*

Is the reward worth the risk? I leave that conclusion to you.

An additional interesting topic here is the Leveraged ETFs.

Leveraged ETFs are exchange-traded funds that use financial derivatives and debt to amplify the returns of an underlying index or asset.

Derivatives are financial contracts that derive value from an underlying asset, such as stocks, bonds, or commodities, using complex formulas. You can use several derivatives to boost returns, including options, futures, and swaps.

Good examples are the dual and triple-leveraged ETFs that use two or three times the exposure of the underlying asset, respectively.

Dual-leveraged ETFs attempt to double the daily return of an underlying index or asset. For example, if the underlying index goes up by 1%, a dual-leveraged ETF would aim to go up by 2% on the same day. Similarly, if the index goes down by 1%, the ETF would attempt to lose 2% on the same day.

Triple-leveraged ETFs, as the name suggests, aim to triple the daily returns of the underlying index or asset. For example, if the underlying asset gains 1%, the triple-leveraged ETF would seek to go up by 3% on the same day. Similarly, if the underlying asset loses 1%, the ETF would aim to lose 3% on the same day.

While leveraged ETFs can offer potentially higher returns than traditional ETFs, they also carry higher risks. Using leverage can amplify losses and gains, so you need to be aware of the risks before investing in these types of funds.

An example of a dual-leveraged ETF is ProShares Ultra S&P500 (SSO). The fund uses the complete replication technique to track 2x the daily performance of the S&P 500 Index.

*Figure 43 - SPY and SSO chart comparison. Source: TradingView*

An example of a triple-leveraged ETF is ProShares UltraPro QQQ (TQQQ). The fund seeks to track 3x the daily performance of the Nasdaq-100 Index by using the complete replication technique.

*Figure 44 - QQQ and TQQQ chart comparison. Source: TradingView*

As you can see in both cases, the leveraged ETFs are much more volatile but can bring you a significantly higher return.

**What is the Most Appropriate Leverage for Traders?**

Every investor has a personal preference for what makes an excellent financial leverage ratio. While some may be risk averse, others may see leverage as an opportunity to access capital and increase profits.

As a general rule of thumb, leverage of 2x is widely accepted and is considered risk averse. However, if interest rates increase, leverage can hurt those investors who borrow.

## Futures & Options

Futures are contracts to buy or sell a specified quantity of underlying stocks at a later date for a price agreed upon. You can look to buy or sell futures if you believe that the price of a stock in the future will be higher or lower to earn a riskless profit.

Like a margin loan, futures allow you to borrow money against your portfolio to improve gains.

However, the potential downside risk with a futures contract is substantial and is many times that of the initial investment. This is where Options come in as a great alternative to Futures to potentially limit the downside and risk.

Options give the contract holder the right and **not the obligation** to buy or sell the underlying share, which is in contrast to futures, where both parties of the contract are obliged to buy or sell the stock.

Although options are often seen as speculation instruments, they play a significant role in the economy, as they help companies to easier "freeze" the acquisition prices of the raw material they need for the following year. For instance, it is much easier to arrange your cloth manufacturing business if you know in advance which will be the price of the wool you will have to pay next year.

## Leverage Loans: A Cautionary Tale

As pointed out earlier, leverage can potentially transform trades, vastly multiplying the investment returns for a trader. But it also comes with significant risks. Leverage can lead to complete financial ruin and significant financial collapses. To prove this is not a fairy tale, let's look at an instance when leverage loans led to a complete financial system disruption.

**Archegos Capital**

Bill Hwang and Archegos Capital Management began pursuing an aggressive investment strategy in March 2020, whereby he amassed positions in a handful of securities using a derive called total return swaps. Banks offered Archegos returns based on stock performance, allowing Hwang to accumulate leveraged positions without disclosure.

Archegos had over $10 billion in Baidu and Tencent Music and over $20 billion in Viacom CBS, with derivatives comprising over 50% of the latter.

Archegos used nine banks to create the illusion of multiple parties, enabling leverage of up to 1,000%. The fund misled banks about its exposure with other dealers, allowing it to borrow and trade more.

However, things started to fall apart in March 2021, when Viacom CBS announced a secondary stock offering of $3 billion, which saw a crash in Archegos' portfolio. Hwang launched a considerable effort to prop up Viacom, using $2 billion in trading that depleted Archegos' cash reserves, but despite this, Viacom's stock continued to decline.

For two days, Hwang and his team tried to delay the banks from calling in their loans, but on March 26, they ran out of time. The banks began to unwind the trades, causing the shares to plummet. Hwang personally lost $8 billion, while Archegos, which once managed $36 billion in assets, went out of business[33].


*Figure 45 – Damage to Hwang's Investments. Source: Bloomberg*

Now let's move to a fascinating and controversial technique – SHORTING.

# Shorting a Stock

Referred as Short Selling, this is a popular investment technique that Hedge Funds and Traders use to sell shares the seller **does not own**.

Nonsense, isn't it?

Investors who short a stock believe that the stock price will be lower in the future. As a result, they would **borrow** the stock from brokers, sell it, then repurchase it at a lower price and return the stock to the broker.

If the stock price falls in the future, an investor will make gains by pocketing the difference between the price at which a stock is sold and when it is repurchased.

For instance, if you think Apple stock is overvalued at $158 today, you can borrow and sell ten shares at $1,580. If the stock drops to $108, you will buy back the ten shares at $1,080 and give them back to the broker, resulting in a profit of $500. Even more interesting is that you can short-sell by leveraging also.

Here is how such a trade would look on Etoro:

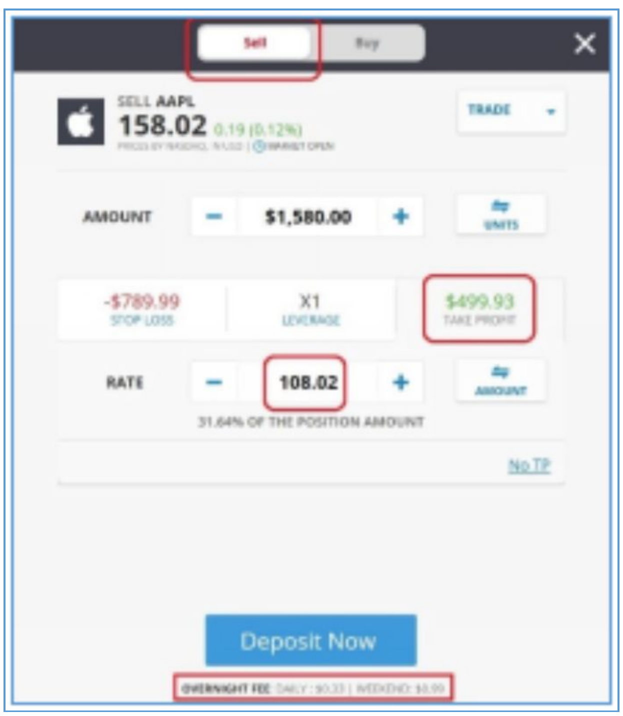



*Figure 46 – Short Selling Trade on Etoro*

Note that the “SELL” button is active this time, and the trade is called "SELL AAPL,” as indicated above.

While shorting a stock can result in large gains, it also results in significant risk if the stock price moves up. Shorting also has high costs associated, as the broker charges interest on borrowed shares. As indicated at the bottom of the picture above, some small fees are associated with the trade.

What makes short selling extremely risky is that the potential loss is unlimited. Unlike traditional buy transactions where the maximum you invested is the maximum you can lose if the company goes bankrupt, short selling loss potential has no limit since the upside price increase of a stock is also unlimited.

An important tip for beginners is not to mix a position’s close with a selling short position. So, to exit an existing BUY trade, you have to close that particular trade and not open a new SELL position.

**Fast Fact:**

John Paulson made a very successful bet against the 2008 housing bubble. His hedge fund firm, Paulson & Co., made $20 billion on the trade between 2007 and 2009,[34] driven by its bets against subprime mortgages through credit default swaps, according to The Wall Street Journal. Paulson’s personal earnings were about $4 billion in that period.

## Conclusion on Financial Leverage

Financial leverage is a double-edged sword that can significantly enhance your returns and profitability but can amplify risks and lead to significant losses. Therefore, understanding the concept of leverage and its implications is crucial for making informed financial decisions, whether you are trading stocks, investing in Forex, or taking out a leveraged loan.

By considering the risks and benefits of using leverage and carefully evaluating your risk tolerance and financial goals, you can use leverage as a powerful tool to help achieve your financial objectives.

# Key Take Aways

Capital Appreciation, or simply the price increase of a stock, is the most used method of making money in the stock market.

A variety of factors influence stock prices, ranging from the change in underlying business to meeting predictions and herd behavior.

Dividend income is the other way investors increase their wealth, which is often underestimated. A very powerful tool is dividends re-investment.

Compounding interest is called “The Eighth Wonder of the World.” This is because interest on interest can result in exponential gains.

Leverage can be a great tool to amplify potential gain.

Special caution shall be applied when using leverage as it can also amplify the potential loss.

Money can be made even when a stock drops. The technique is called short selling of borrowed stocks and implies a very high risk due to unlimited potential loss.

# 5

# Picking the Stock

## Fundamental Analysis

*"The stock market is filled with individuals who know the price of everything but the value of nothing."*

**— Phillip Fisher**

Author of “Common Stocks” and “Uncommon Profits”

Fundamental Analysis is an investment approach that involves analyzing a range of **qualitative** and **quantitative** factors to determine the fair value of a stock. Then, by comparing this value to the stock’s current market price, you can make informed decisions about whether to buy, hold, or sell.

You can better understand a company's financial health and future potential by exploring factors such as central bank interest rates, GDP growth, inflation, revenues, growth, and profits. With this knowledge, you can identify undervalued stocks and potential growth opportunities that align with our investment goals.

But fundamental analysis is not only about the numbers, as you might think. It is also about understanding the story behind the data and exploring the narratives and trends that shape the business landscape. This approach allows you to tap into your creativity and intuition, uncovering hidden gems and finding innovative solutions to investment challenges.

Let's dive in and discover what's possible!

# Quantitative Analysis

By closely examining financial statements, such as the **Income Statement**, **Balance Sheet**, and **Cash Flow Statement**, you can better understand a company's operational performance. By analyzing revenue, expenses, assets, liabilities, and cash flows, you can identify trends and patterns that help you make informed investment decisions.

The **Income Statement** paints a picture of the performance of a business over a year and includes details about the company's revenues, margins, and profitability.

The **Balance Sheet** helps you understand the resources that a business owns at any point, including materials, buildings, cash, and inventory (Assets), the debt that it owes to outside creditors (Liabilities), and the profits it has retained over the years (Equity).

NETFLIX, INC.

CONSOLIDATED STATEMENTS OF OPERATIONS
(in thousands, except per share data)

| | Year ended December 31, | | |
|---|---|---|---|
| | 2022 | 2021 | 2020 |
| Revenues | $ 31,615,550 | $ 29,697,844 | $ 24,996,056 |
| Cost of revenues | 19,168,285 | 17,332,683 | 15,276,319 |
| Marketing | 2,530,502 | 2,545,146 | 2,228,362 |
| Technology and development | 2,711,041 | 2,273,885 | 1,829,600 |
| General and administrative | 1,572,891 | 1,351,621 | 1,076,486 |
| Operating income | 5,632,831 | 6,194,509 | 4,585,289 |
| Other income (expense): | | | |
| Interest expense | (706,212) | (765,620) | (767,499) |
| Interest and other income (expense) | 337,310 | 411,214 | (618,441) |
| Income before income taxes | 5,263,929 | 5,840,103 | 3,199,349 |
| Provision for income taxes | (772,005) | (723,875) | (437,954) |
| Net income | $ 4,491,924 | $ 5,116,228 | $ 2,761,395 |
| Earnings per share: | | | |
| Basic | $ 10.10 | $ 11.55 | $ 6.26 |
| Diluted | $ 9.95 | $ 11.24 | $ 6.08 |
| Weighted-average common shares outstanding: | | | |
| Basic | 444,698 | 443,155 | 440,922 |
| Diluted | 451,290 | 455,372 | 454,208 |

*Figure 47 – Netflix Income Statement as shown in their report (10-K Form[35])*

It might look boring at a glance; however, we can find interesting information too. For example, we can observe a growth in revenues. However, the 2022 income dropped compared to 2021 due to increasing expenses.

**NETFLIX, INC.**

**CONSOLIDATED BALANCE SHEETS**
**(in thousands, except share and per share data)**

| | As of December 31, | |
|---|---|---|
| | 2022 | 2021 |
| **Assets** | | |
| Current assets: | | |
| Cash and cash equivalents | $ 5,147,176 | $ 6,027,804 |
| Short-term investments | 911,276 | — |
| Other current assets | 3,208,021 | 2,042,021 |
| Total current assets | 9,266,473 | 8,069,825 |
| Content assets, net | 32,736,713 | 30,919,539 |
| Property and equipment, net | 1,398,257 | 1,323,453 |
| Other non-current assets | 5,193,325 | 4,271,846 |
| Total assets | $ 48,594,768 | $ 44,584,663 |
| **Liabilities and Stockholders' Equity** | | |
| Current liabilities: | | |
| Current content liabilities | $ 4,480,150 | $ 4,292,967 |
| Accounts payable | 671,513 | 837,483 |
| Accrued expenses and other liabilities | 1,514,650 | 1,449,351 |
| Deferred revenue | 1,264,661 | 1,209,342 |
| Short-term debt | — | 699,823 |
| Total current liabilities | 7,930,974 | 8,488,966 |
| Non-current content liabilities | 3,081,277 | 3,094,213 |
| Long-term debt | 14,353,076 | 14,693,072 |
| Other non-current liabilities | 2,452,040 | 2,459,164 |
| Total liabilities | 27,817,367 | 28,735,415 |
| Commitments and contingencies (Note 7) | | |
| Stockholders' equity: | | |
| Preferred stock, $0.001 par value; 10,000,000 shares authorized at December 31, 2022 | — | — |
| Common stock, $0.001 par value; 4,990,000,000 shares authorized at December 31, 2022 December 31, 2021, respectively | 4,637,601 | 4,024,561 |
| Treasury stock at cost (1,564,478 shares at December 31, 2022 and December 31, 2021) | (824,190) | (824,190) |
| Accumulated other comprehensive loss | (217,306) | (40,495) |
| Retained earnings | 17,181,296 | 12,689,372 |
| Total stockholders' equity | 20,777,401 | 15,849,248 |
| Total liabilities and stockholders' equity | $ 48,594,768 | $ 44,584,663 |

*Figure 48 – NFLX Balance Sheet as shown in their report*

The Statement of Cash Flow is the final piece of the puzzle as it records all the cash transactions conducted in a year from operating, investing, and financing activities.

NETFLIX, INC.

CONSOLIDATED STATEMENTS OF CASH FLOWS
(in thousands)

| | Year Ended December 31, 2022 | 2021 | 2020 |
|---|---|---|---|
| **Cash flows from operating activities:** | | | |
| Net income | $ 4,491,924 | $ 5,116,228 | $ 2,761,395 |
| Adjustments to reconcile net income to net cash provided by operating activities: | | | |
| Additions to content assets | (16,839,038) | (17,702,202) | (11,779,284) |
| Change in content liabilities | 179,310 | 232,898 | (757,433) |
| Amortization of content assets | 14,026,132 | 12,230,367 | 10,806,912 |
| Depreciation and amortization of property, equipment and intangibles | 336,682 | 208,412 | 115,710 |
| Stock-based compensation expense | 575,452 | 403,220 | 415,180 |
| Foreign currency remeasurement loss (gain) on debt | (353,111) | (430,661) | 533,278 |
| Other non-cash items | 533,543 | 376,777 | 293,126 |
| Deferred income taxes | (166,550) | 199,548 | 70,066 |
| Changes in operating assets and liabilities: | | | |
| Other current assets | (353,834) | (369,681) | (187,623) |
| Accounts payable | (158,543) | 145,115 | (41,605) |
| Accrued expenses and other liabilities | (55,513) | 180,338 | 198,183 |
| Deferred revenue | 27,356 | 91,350 | 193,247 |
| Other non-current assets and liabilities | (217,553) | (289,099) | (194,075) |
| Net cash provided by operating activities | 2,026,257 | 392,610 | 2,427,077 |
| **Cash flows from investing activities:** | | | |
| Purchases of property and equipment | (407,729) | (524,585) | (497,923) |
| Change in other assets | — | (26,919) | (7,431) |
| Acquisitions | (757,387) | (788,349) | — |
| Purchases of short-term investments | (911,276) | — | — |
| Net cash used in investing activities | (2,076,392) | (1,339,853) | (505,354) |
| **Cash flows from financing activities:** | | | |
| Proceeds from issuance of debt | — | — | 1,009,464 |
| Debt issuance costs | — | — | (7,559) |
| Repayments of debt | (700,000) | (500,000) | — |
| Proceeds from issuance of common stock | 35,746 | 174,414 | 235,406 |
| Repurchases of common stock | — | (600,022) | — |
| Taxes paid related to net share settlement of equity awards | — | (224,168) | — |
| Net cash provided by (used in) financing activities | (664,254) | (1,149,776) | 1,237,311 |
| Effect of exchange rate changes on cash, cash equivalents and restricted cash | (170,140) | (86,740) | 36,050 |
| Net increase (decrease) in cash, cash equivalents and restricted cash | (884,529) | (2,183,759) | 3,195,084 |
| Cash, cash equivalents and restricted cash, beginning of year | 6,055,111 | 8,238,870 | 5,043,786 |
| Cash, cash equivalents and restricted cash, end of year | $ 5,170,582 | $ 6,055,111 | $ 8,238,870 |
| **Supplemental disclosure:** | | | |
| Income taxes paid | $ 811,720 | $ 509,265 | $ 291,582 |
| Interest paid | 701,693 | 763,432 | 762,904 |

*Figure 49 - Income Statement of Netflix as shown in their report*

**<u>Fast Fact:</u>**

Did you know that Tesla Inc. (TSLA) had a negative Net Income until 2020?! Neither did I until I read their Income Statement.

Starting with 2020, the Net Income turned positive and is increasing at a very rapid pace.

Using the Income Statement, Balance Sheet, and Statement of Cash Flows information, you can derive a stock's intrinsic value through Relative and Absolute valuation techniques.

## Relative Valuation Methods

Relative Valuation is a technique whereby investors compare the financials of a stock against its competitors, other companies in the industry, or its historical performance to determine if it is overvalued or undervalued.

An interesting aspect of the relative valuation methods is that they provide a broad range of metrics, allowing you to better understand a company's financial position.

For example, you can use Price-to-Earnings (P/E) ratios, Price-to-Sales (P/S) ratios, Price-to-Book (P/B) ratios, and other metrics to compare a company's financials against those of its peers. Each metric provides a unique perspective on the company's valuation, enabling you to evaluate a stock from different angles.

**Price/Earnings (P/E) Ratio**

P/E Ratio is the most common valuation technique used by investors to gauge the value of a company. The P/E Ratio is estimated as follows:

$$\boxed{\text{P/E Ratio} = \frac{\text{Price per Share}}{\text{Earning per Share}}}$$

For example, Microsoft stock (MSFT) currently trades at $277 per share, with earnings per share of $9.7 in the last year. Based on this, the company trades at a P/E of about 28.

As a rule of thumb, a company with a lower P/E than its competitors is generally considered undervalued.

One interesting aspect of the P/E ratio is that it can be used to gain insights into the market's expectations for a company's future growth prospects. For example, a high P/E ratio may suggest investors are optimistic about a company's future earnings growth. In contrast, a low P/E ratio may suggest that the market has lower growth expectations for the company.

Returning to Tesla, it was trading for months at P/E ratios of over 500 starting June 2020, while the stock price was rising and rising! This is because of the very high expectations for the company. And the high expectations are also why growth stocks trade at high earnings multiples.

As a rule of thumb, a P/E ratio of up to 20 is usually reasonable, and you should have a closer and better look if that value is exceeded.

**Price / Sales (P/S) Ratio**

One exciting aspect of the Price-to-Sales (P/S) ratio is that it can be a helpful metric for evaluating companies that are not yet profitable. Unlike the P/E ratio, which requires a company to have positive earnings, the P/S ratio compares a company's market capitalization to its revenue.

For example, Palantir Technologies (PLTR), which is still unprofitable as per the December 2022 report, can be valued using its P/S ratio of 9.

There is no fixed or universally accepted "reasonable" P/S ratio for stocks, as it can vary significantly depending on the industry, company, and market conditions.

Generally, a low P/S ratio may suggest that a company's stock is undervalued, while a high P/S ratio may suggest that the stock is overvalued.

**Price / Book (P/B) Ratio**

The P/B ratio compares a company's stock price to its book value, which is the value of its assets minus its liabilities. One interesting aspect of the Price-to-Book (P/B) ratio is that it can provide insights into a company's asset value and the market's perception of its growth prospects.

A low P/B ratio may suggest a company's stock is undervalued relative to its asset value. In contrast, a high P/B ratio may indicate that the market has high growth expectations for the company.

Overall, relative valuation methods can offer a flexible and robust framework for evaluating a company's financials, allowing you to make more insightful investment decisions.

## Absolute Valuation Methods

Absolute Value, popularly known as **intrinsic value**, is a technique that helps investors determine the financial worth of a company based on its projected cash flows and dividend payments.

Unlike relative valuation methods that rely on the market to estimate the fair value, absolute valuation methods use the company’s financials to estimate value.

Following this method, you do not have to compare with the company’s peers; you figure out the intrinsic value and the fair price itself.

## Dividend Discount Model (DDM)

The Dividend Discount Model is a quantitative method for estimating the fair stock price of the company by calculating the sum of all future dividend payments that are discounted back to the present value.

Since DDM assumes that dividends will continue to be paid out in the future at a constant or sustainable growth rate, it is most effective for companies with predictable growth in their dividend payments, such as financial and utility companies.

To understand how the DDM works, let’s look at the Bank of America (BAC) example.

The stock is currently trading at $27, with an annual dividend payment of $0.88 per share, as of March 2023.

Suppose we assume that the cost of equity (return that a company must realize in exchange for a given investment) for BAC is 11.5% and that dividends will grow at 10% annually. In that case, the intrinsic value for BAC can be estimated as follows:

Price Per Share = 0.88 / (0.115 - 0.1) = $58.6

This implies that the stock has a fair value of $58.6 and is undervalued at any price below this.

The method is quite simple to use once you grab the necessary data.

## Discounted Free Cash Flow

The Discounted Free Cash Flow method estimates a company’s intrinsic value as the present value of all future cash flows. It is based on the principle that the present value of a company's future cash flows should be equal to its current Enterprise Value.

The DCF model is considered one of the most comprehensive valuation models because it takes into account not only the company's cash flows but also growth projections, profit margins, and capital expenditures, all factored in considering the time-value of money, by discounting them back to their present value using a discount rate.

These assumptions can be challenging to make and require a deep understanding of the company and its industry.

Originally, I have included a rather extensive example of a DCF application here. However, that meant a couple of pages full of math that were not in line with the scope of this book.

The purpose of this book and this chapter, in particular, is that you create an idea about the existing valuation methods. Then I can show you how to use various tools in your research that already did the math for you rather than teaching you calculus.

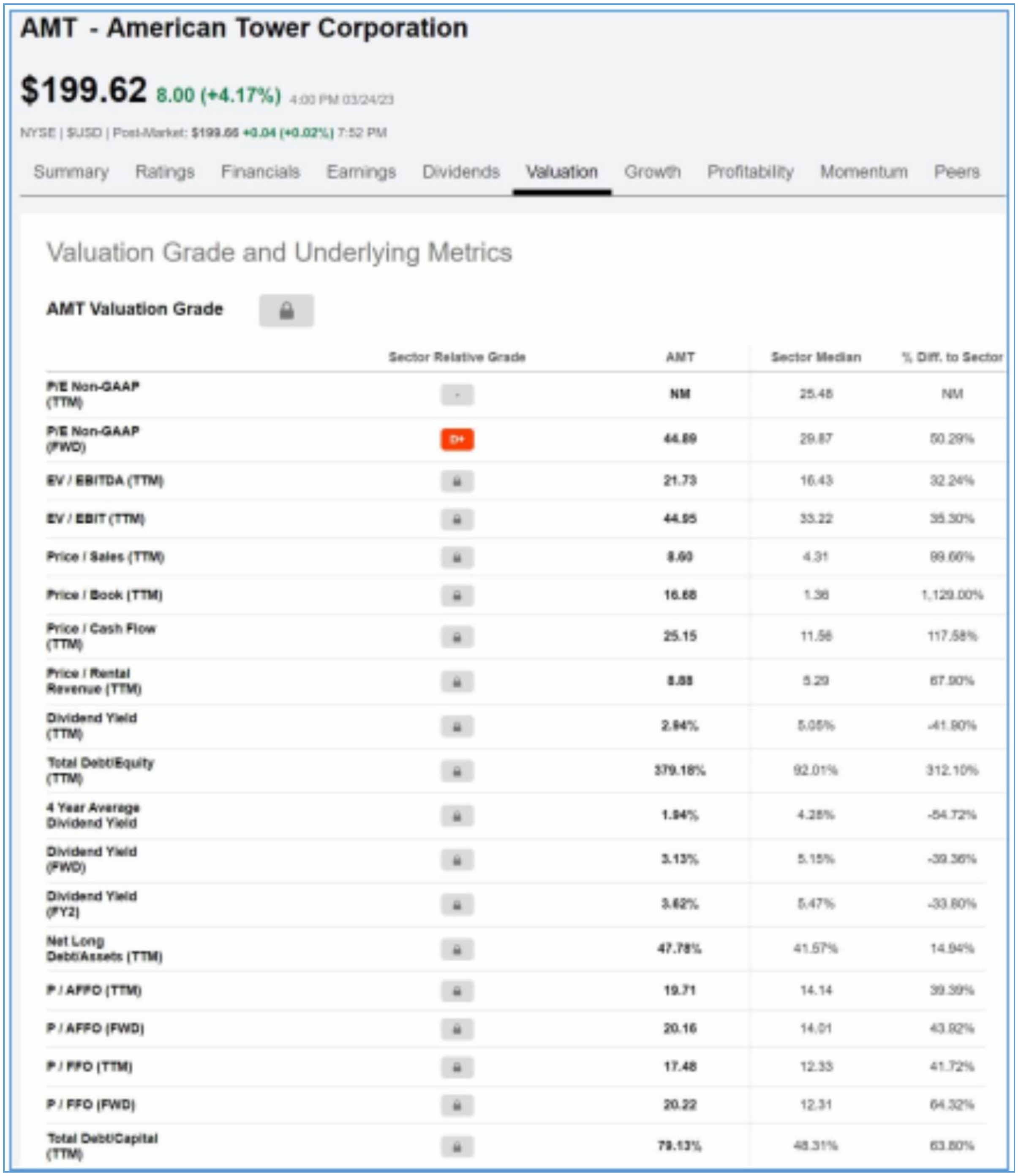
For this reason, all the equations behind the scenes will find their place in a different future book of mine, while here I have deleted those “boring pages” and added the following section instead.

# How to assess the valuation

## SeekingAlpha

There is a page on SeekingAlpha dedicated to valuation. They do not estimate the fair stock price for you there. However, they give you important metrics for free, such as P/E or Price/Sales Ratio, i.e., it is good for Relative Valuation.

In the paid version, they also give you Grades so that you get a better feeling about these metrics relative to the sector.


AMT - American Tower Corporation

$199.62 8.00 (+4.17%) 4:00 PM 03/24/23

NYSE | $USD | Post-Market: $199.66 +0.04 (+0.02%) 7:52 PM

Summary Ratings Financials Earnings Dividends Valuation Growth Profitability Momentum Peers

Valuation Grade and Underlying Metrics

AMT Valuation Grade

| | Sector Relative Grade | AMT | Sector Median | % Diff. to Sector |
|---|---|---|---|---|
| P/E Non-GAAP (TTM) | - | NM | 25.48 | NM |
| P/E Non-GAAP (FWD) | D+ | 44.89 | 29.87 | 50.29% |
| EV / EBITDA (TTM) | | 21.73 | 16.43 | 32.24% |
| EV / EBIT (TTM) | | 44.95 | 33.22 | 35.30% |
| Price / Sales (TTM) | | 8.60 | 4.31 | 99.66% |
| Price / Book (TTM) | | 16.68 | 1.36 | 1,129.00% |
| Price / Cash Flow (TTM) | | 25.15 | 11.56 | 117.58% |
| Price / Rental Revenue (TTM) | | 8.88 | 5.29 | 67.90% |
| Dividend Yield (TTM) | | 2.94% | 5.05% | -41.90% |
| Total Debt/Equity (TTM) | | 379.18% | 92.01% | 312.10% |
| 4 Year Average Dividend Yield | | 1.94% | 4.28% | -54.72% |
| Dividend Yield (FWD) | | 3.13% | 5.15% | -39.36% |
| Dividend Yield (FY2) | | 3.62% | 5.47% | -33.80% |
| Net Long Debt/Assets (TTM) | | 47.78% | 41.57% | 14.94% |
| P / AFFO (TTM) | | 19.71 | 14.14 | 39.39% |
| P / AFFO (FWD) | | 20.16 | 14.01 | 43.92% |
| P / FFO (TTM) | | 17.48 | 12.33 | 41.72% |
| P / FFO (FWD) | | 20.22 | 12.31 | 64.32% |
| Total Debt/Capital (TTM) | | 79.13% | 48.31% | 63.80% |

*Figure 50 – AMT valuation on SeekingAlpha[36]*

## SimplyWallSt

On SimplyWallSt, you can find fewer metrics, but the key advantage of the platform is that they estimate the fair price of a stock based on DCF or DDM methods, i.e., you get some excellent Absolute Valuation insights. They also compare the valuation with peers afterward.

With the free plan, you can access the complete information for up to 5 stocks per month, which is fantastic.

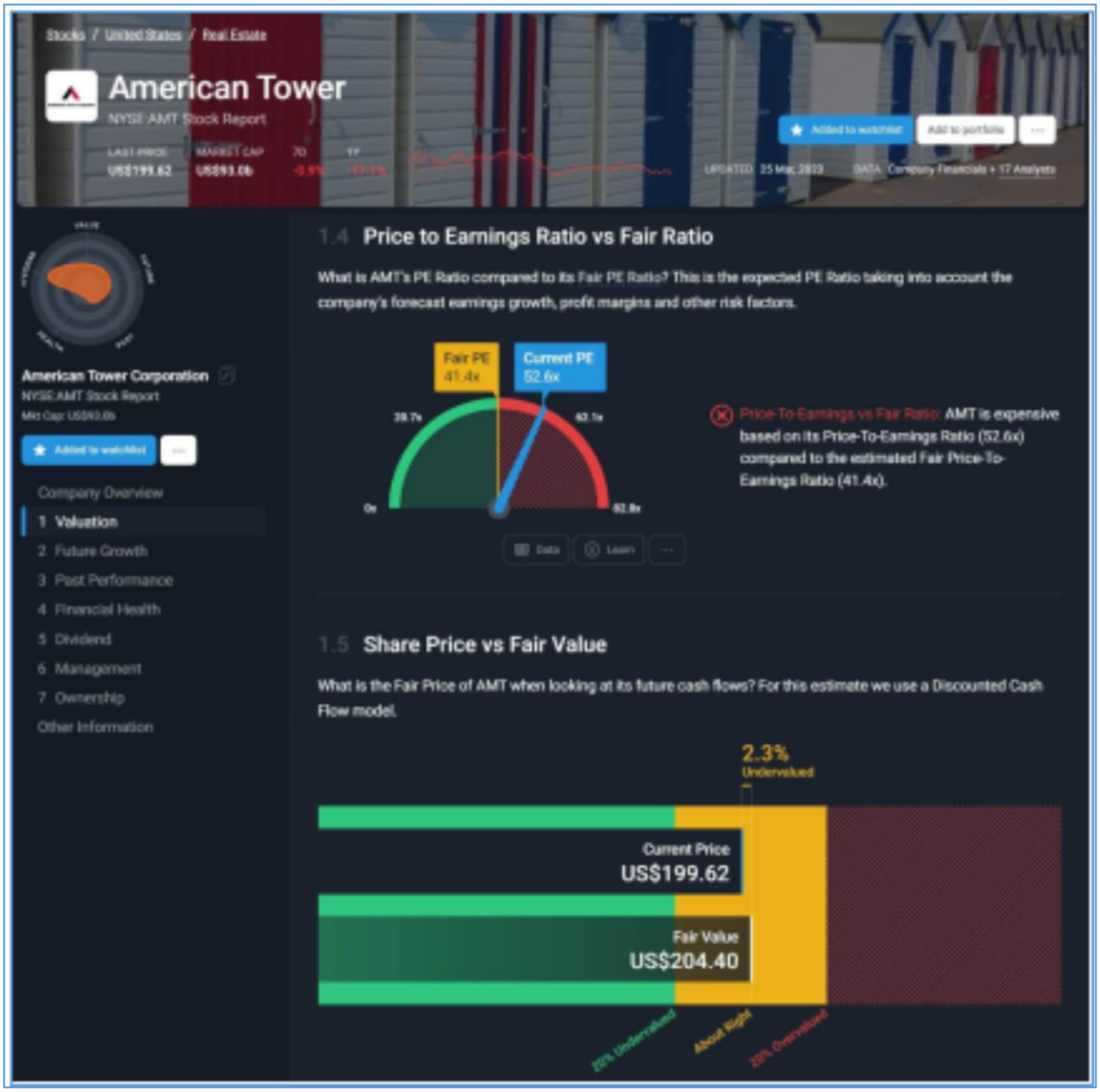



*Figure 51 – AMT valuation on SimplyWallSt[37]*

## TradingView

Tradingview is mainly known for its excellent capabilities for technical analysis, which we will discuss in the next chapter. However, it can also plot various fundamental data, such as the P/E ratio.

A key advantage of charting historical data of different ratios is that you can get an impression of their evolution which can help you to identify opportunities.

*Figure 52 – AMT Price and P/E Ratio charts on TradingView*

Now you can see two plots in the above picture. The top one is the traditional price chart, while we have the P/E ratio below.

Observe that the price dropped in the second half of 2022, leading to a record-low P/E ratio of about 30. However, at the end of the year, the P/E ratio jumped aggressively to as high as 60. Interestingly, at that exact date when P/E soared, the price was more or less constant.

How that comes?!

The only reasonable explanation is that the company’s reported earnings dropped dramatically on that exact date. So let’s also check that out by adding the Earnings-Per-Share (EPS) to the chart.

*Figure 53 – AMT Price, P/E, and EPS on TradingView*

Oh, I was right! The quarterly EPS plummeted catastrophically. Moreover, they are negative, meaning the company actually lost money. Let's double-check this on the Earnings page from SeekingAlpha.

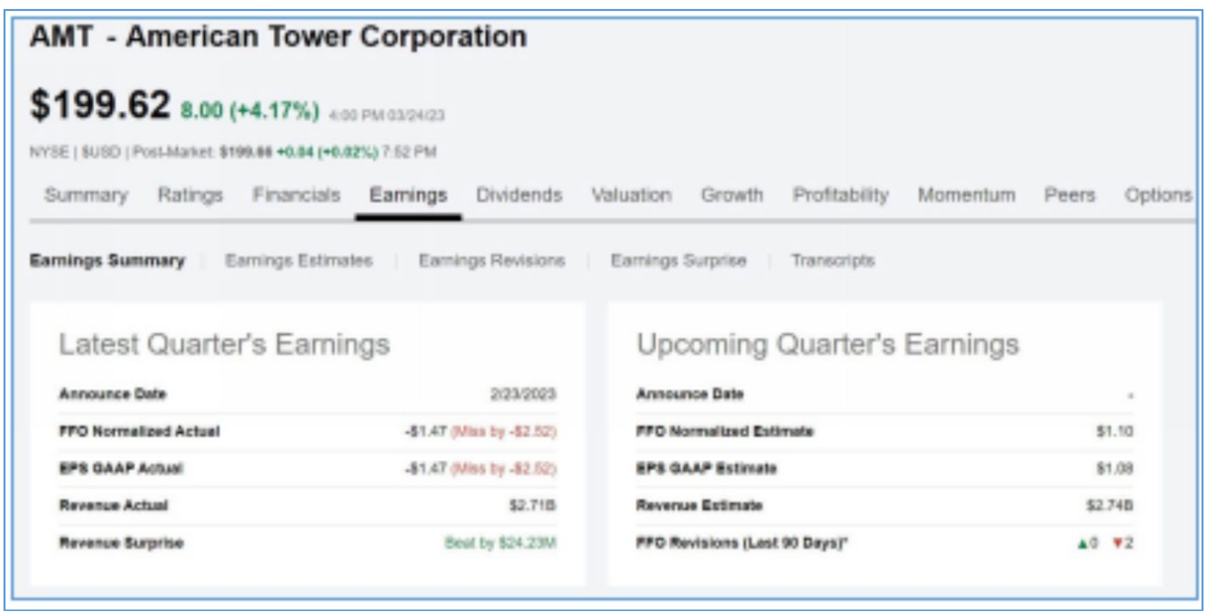



*Figure 54 – AMT earnings summary page on [SeekingAlpha]*

Data is confirmed; note that the report for Q2022 was released on February 23, 2023. The stock opened 3% lower the next day, February 24; however, it recovered rapidly based on the future growth projections.

After analyzing all of the above, my personal rating is HOLD, i.e., I will keep my holdings but not purchase more shares. Note again that this is my personal opinion and not financial advice. You are the sole responsible for your financial and investment decisions.

Notable is that I performed this exercise in real-time while writing this book, and it was interesting for me, as I hope it was for you.

And this is what I would be delighted to know that you are able to do as well after reading this book, Dear Reader.

# Qualitative Analysis

Qualitative Analysis in finance looks beyond the numbers!

This method unlocks the non-numerical information that lies beneath the surface, giving investors and analysts a deeper understanding of the quality of a company's management, products, and operations.

By examining non-numerical information, such as company reports, news articles, interviews with management, and macroeconomic factors, the qualitative analysis gives you a complete understanding of a company's strengths, weaknesses, opportunities, and threats.

You can obtain many valuable insights by considering factors such as the company's reputation, the experience and track record of its management team, the quality of its products or services, the competitive landscape, and the regulatory environment.

For instance, Google, which has a market cap of over $1 Trillion, has a virtual monopoly across search and advertising, enabling it to reap the rewards by gradually increasing prices. In contrast, a company like the New York Times has a low barrier to entry, as nearly anyone can compete against them through a website or blog.

Companies that drive shareholder value creation over the long term tend to capture market share quickly, create products and services that are hard to replicate, and acquire competitors that may pose a competitive risk.

Enough fluff! Let us go through a few examples that will demonstrate you the power of this approach.

## A Macroeconomic Example

I will pick the probably most significant global event of the 21st century – The Coronavirus Pandemic.

Social distancing measures and lockdowns meant many people could not see their friends and family in person, leading to isolation and loneliness.

It is not a surprise that equities that improved the experience for customers staying at home, such as Fitness Company Peloton (PTON), Video Communications Company Zoom (ZM), and Entertainment Company Netflix (NFLX), all were skyrocketing.

Fortunately, the End of the World did not come. The social distancing restrictions were removed with time, and fear and anxiety disappeared. Nearly two years later, with the pandemic ending, these stocks were reverting to their original prices, or even below that.


*Figure 55 – 2020-2023 performance of NFLX, ZM, and PTON. Built with TradingView*

You can clearly see that Netflix, which was the least bombastic of the three, brought, as of today, the best returns.

Besides the boredom, people were also worried about their health and the health of their loved ones.

One fantastic thing about the coronavirus pandemic is how quickly scientists were able to develop effective vaccines to combat the virus. The previous record for developing a vaccine was four years, but the Pfizer/BioNTech (PFE) and Moderna (MRNA) vaccines were developed and authorized for emergency use in less than a year, which is a remarkable achievement in medical history.

In consequence, Moderna stocks surged and were highly volatile.

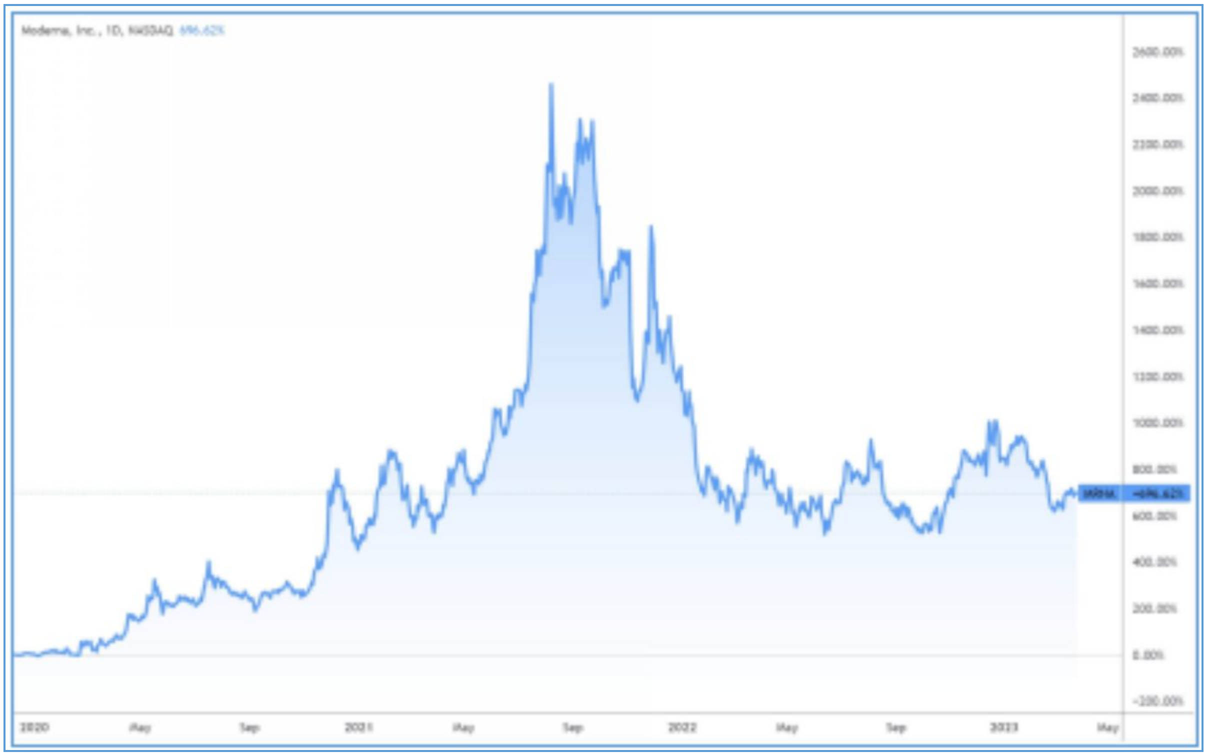


*Figure 56 – MRNA stock price 2020 to 2023. Built with TradingView*

The above pictures depict how important it is to combine both Qualitative and Quantitative Analyses, as any price spikes led by momentary contexts have to be backed up by real value.

## A Competitive Advantage Example

One example of a company that has a solid competitive advantage is Amazon (AMZN).

Amazon's competitive advantage is its focus on customer experience, which it achieves through its massive selection of products, fast and reliable shipping, and convenient user interface. This has allowed Amazon to dominate the e-commerce market and become one of the most valuable companies in the world, creating significant value for its shareholders through stock price appreciation.

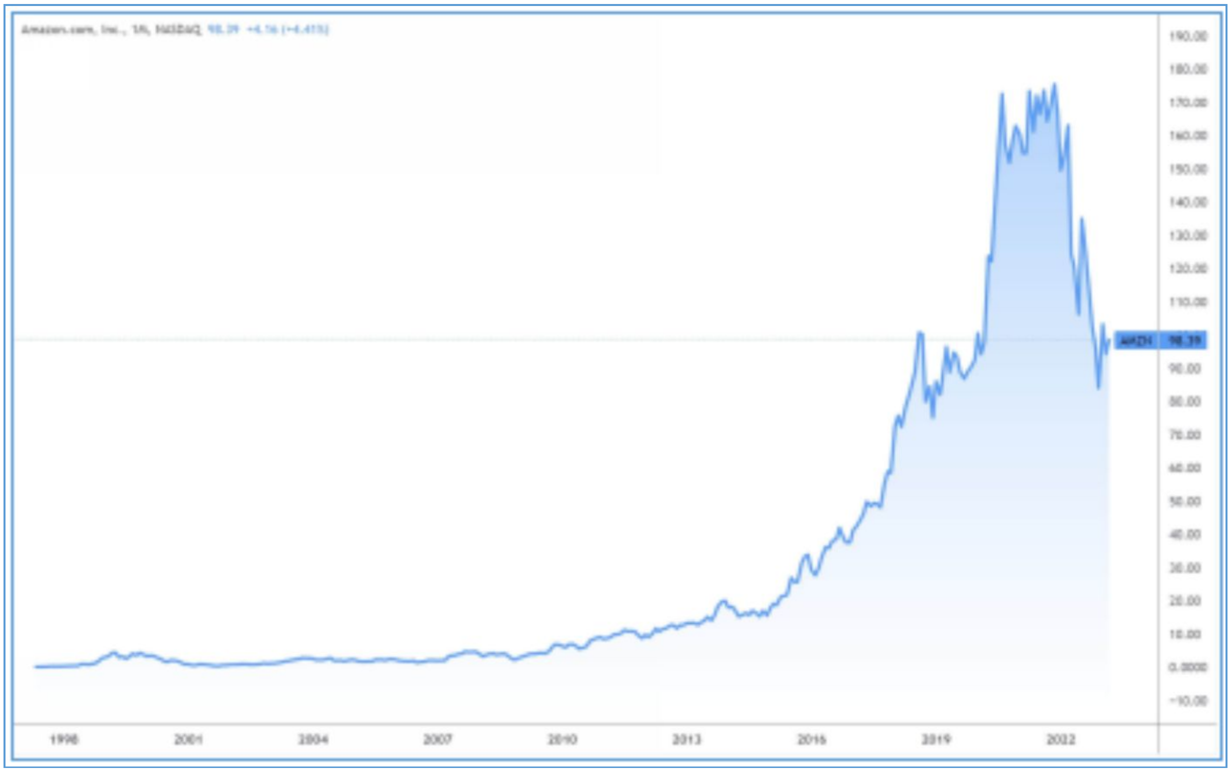



*Figure 57 – AMZN Stock Chart. Built with TradingView*

## A Management Change Example

An example of a management change that positively impacted a company’s stock was Microsoft in 2014. The company was struggling to keep up with its competitors' rapid pace of innovation and was losing market share in several key areas.

In February 2014, Satya Nadella was appointed as Microsoft's new CEO, replacing Steve Ballmer[38]. When Satya Nadella took over as Microsoft’s new CEO in 2014, he brought a new vision emphasizing the importance of cloud computing and mobile devices. Under his leadership, Microsoft transformed and invested heavily in cloud-based services like Azure and Office 365, which helped the company stay ahead of competitors and positioned it for long-term growth.

As investors became more optimistic about Microsoft's future, the stock price rose by more than 600% between February 2014 and December 2021, creating significant value for shareholders. This shows how a management change that leads to positive strategic shifts can majorly impact a company's stock price.


*Figure 58 – MSFT Price Chart. February 2014, Satya Nadella takes over the CEO role.*

# Conclusion on Fundamental Analysis

I hope I have given you some good examples and arguments showing fundamental analysis' importance and power. Try to use both quantitative and qualitative methods in conjunction to identify opportunities that work best for you.

What is important to add is that you shall develop skills to filter out the daily noise and consider only the major events or aspects. This is especially valid for qualitative analysis, and the best you can do in the beginning is to avoid overreacting to daily news. Do that by assessing the long-term prospects associated with that news. Is it just a momentary situation, and the long-term future is still bright, or will it benefit (or hurt) the company for years to come?

My last word about quantitative analysis is that it is also a long-term game. If you identified an undervalued stock, don't expect it to start its rising trend the day after. It might take months or even years until the stock returns to its true valuation.

On the other hand, be careful with growth stocks as well. If you are too late to the party, there might be no longer champagne.

# Key Take Aways

Relative Valuation is a Quantitative Analysis method that assesses the value of a stock in comparison to the market and its industry.

Absolute Valuation is a Quantitative Analysis technique that determines the intrinsic value of a stock based on its future cash flows and dividends.

The Absolute Valuation methods are pretty complicated for an untrained investor. Luckily, there are many tools that we can trust to do the math for us.

Qualitative Analysis is a valuation method that looks beyond the numbers. It is more based on intuition and sentiment and is associated with usually unmeasurable matters, such as the arrival of the pandemic or a management change.

Investors shall not overreact to daily news as this might lead to losses due to commissions/spread or wrong market direction from the expected behavior.

Value investing strategy is a long-term game and requires patience. This is the "boring method."

Growth investing is the adrenaline rush. However, it might be associated with losses, especially when you miss the train.

# 6

# Technical Analysis

## The Story Behind the Charts

*"If you diversify, control your risk, and go with the trend, it just has to work."*

– **Larry Hite**

Hedge Fund Manager and Forefather of System Trading

Even the best stocks, with very strong fundamentals, have their ups and downs. The stock price is often driven by invertors' emotions and the overall market sentiment. Sometimes, people overreact to bad news and sell the stock, but then the news is forgotten or proven misleading, and the stock rebounds.

**Fast Fact:**

In 2013, the Associated Press's (AP) official Twitter account was hacked, and a tweet was sent out claiming that explosions had occurred at the White House and President Barack Obama had been injured.

The tweet was quickly proven false, and the AP's account was suspended while the company investigated the incident.

However, the false tweet caused a temporary panic in financial markets, with the Dow Jones Industrial Average (DJIA) dropping by over 140 points in just a matter of minutes.[39]

This perfectly matches the famous saying: "Buy the rumors, sell the news," which indicates exactly the price behavior and its influence by media.

In the previous chapter, we justified the swing of the prices; now it is time to see how to read and use the charts showing these swings.

# So, first of all, what is Technical Analysis?

Technical analysis is price forecasting by using the data generated in the process of trading over time. In technical analysis, you have to read historical charts to determine the future price of stocks.

There is an essential foreword before we start. Technical analysis is not a crystal ball predicting the future; it is instead a mathematical, statistical, and graphical approach to help investors optimize their buy and sell points.

What is interesting is that the patterns in technical analysis are not always caused by fundamental economic factors but can also be influenced by psychological factors such as investor sentiment and market participants' behavior.

This means that technical analysis is not just about interpreting charts and graphs but also about understanding human psychology and behavior in the market. The combination of data analysis and psychological insights makes technical analysis such a fascinating field for investors and traders.

Now, let's look at the type of charts and which charts can be useful and accessible for technical analysis.

# Type of charts

The simplest possible chart is the Line Chart or the Mountain Chart. Here, the price is represented just by a line that goes from left to right:

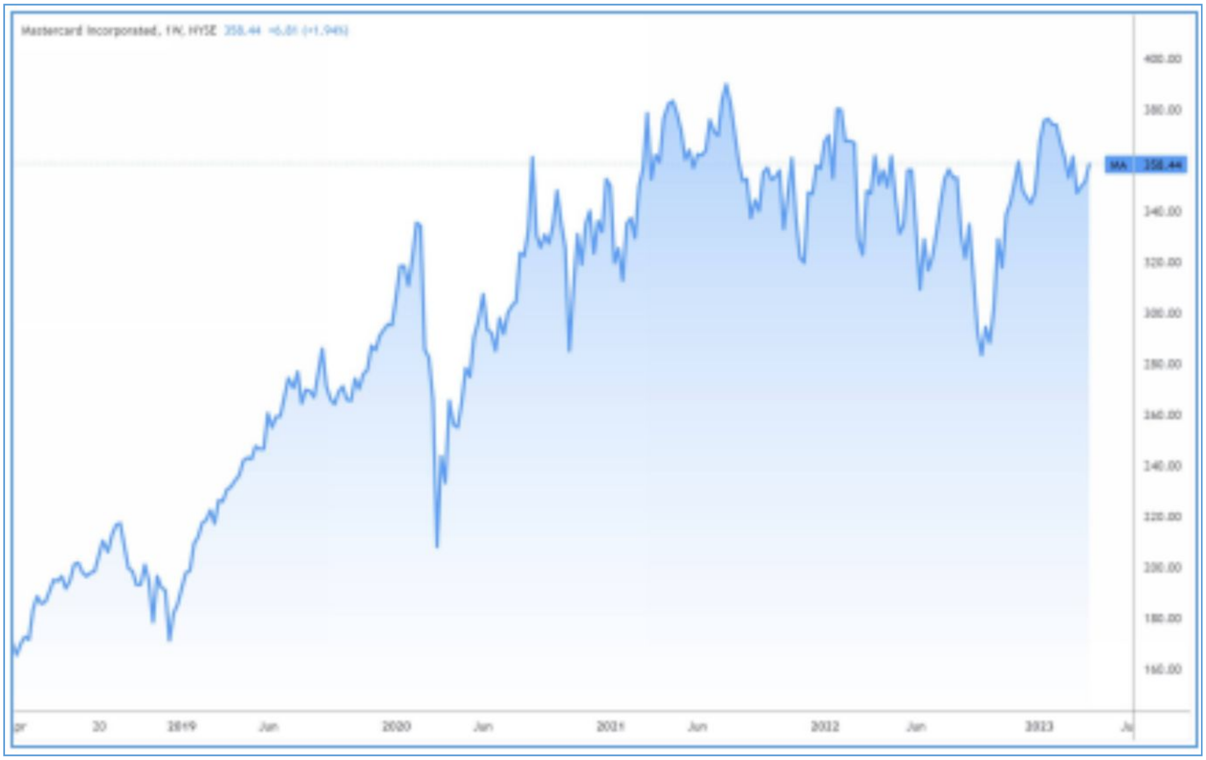


*Figure 59 – Mountain Chart of Mastercard (MA). Built with TradingView*

It is straightforward to understand; thus, there is nothing more to describe. It is good at providing a feeling about the price evolution over time; however, it does not give any information about the stock's intraday movements.

This is why people invented the so-called Candlestick Charts. They are the most used when speaking about technical analysis. Here is the same chart, but using candlesticks.

*Figure 60 – Candlestick chart of MA*

This type of chart gives much more information about the intraday movements of the stocks, and it is quite simple to read them.

In the image below, there are two types of candles, one is green, which means bullish candle (which depicts positive movement), and another one is red, which means bearish candle (which represents negative movement). The filled area is called the body, while the thin lines where high and low are marked are called wicks.

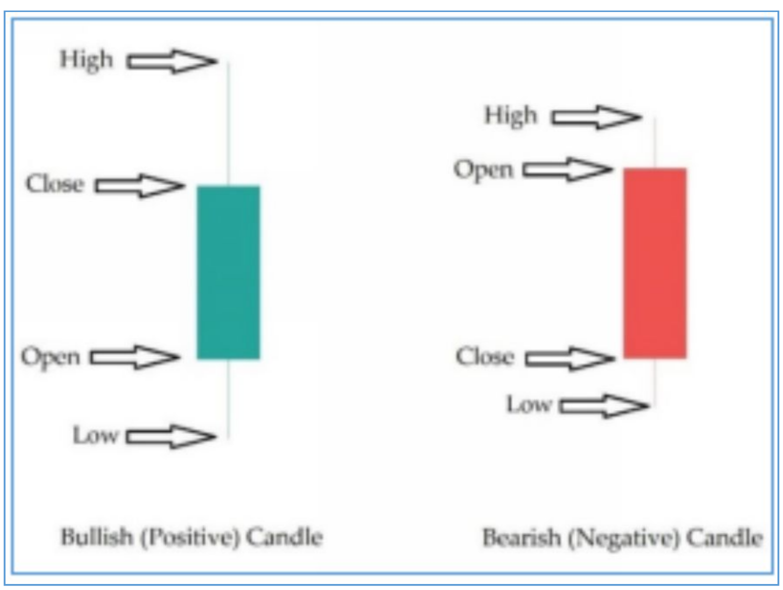


*Figure 61 – How to Read a Candle*

BULLISH CANDLE (Green) – is when a stock closes at a price higher than the opening price. For example, a stock opened at $40 and closed at $45.

BEARISH CANDLE (Red) – is when a stock closes at a price lower than the opening price. For example, a stock opened at $50 and closed at $45.

The upper and the lower wicks show where the price has been during the day, i.e., the top and the bottom of the intraday variation. Please note, although I am constantly referring to one candle representing one day, it can also be that one candle represents 4 hours, 1 hour, and so on, depending on how you set up the chart.

Now that you understand how to read them, we will move to the simplest patterns.

## One Candle Patterns

Based on the behavior of the price indicated by a single candle, one could anticipate the behavior during the next period. Of course, it is not possible to trade using solely one candle pattern. However, it is useful to understand them. Here are the most used.

**MARUBOZU Candle** – The Big Guy

The candle has a big body and a low wick or no wick. It could be a green or a red candle. It indicates the strength and weakness of the price, but it doesn't show any trend reversal (about that later). If it is green, it represents a strong bullish sign, and if red, that's a strong bearish sign.

You have to take a trade when a candle closes above the MARUBOZU candle if it's green and closes below MARUBOZU if it's red.

A simple example would help to understand better. So here are 3 of them, each candle representing a day on the chart of AMD:


*Figure 62 - Three Marubozu examples on the AMD chart*

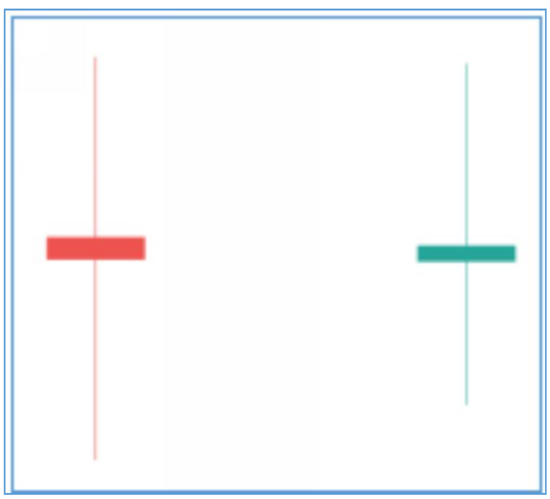
According to patternswizard.com, the Marubozu candle has a 30.5% success rate when having a target of a 2:1 reward-to-risk ratio.


*Figure 63 – Marubozu success rate with target 2:1 R/R ratio. Source: Patternswizard*[40]

Again, it is not advised to trade only relying on a single pattern; however, you can get an impression of where the market is heading.

**DOJI Candle** – The Indecision Pattern

This candle has a very thin body. For example, the stock opened at 49$ and closed at 50$.



During the day, there were buyers who moved the price upward, and there were sellers who moved the price down. Typically, it has a small body and long wicks, which indicates indecision in the market. Therefore, it is a neutral pattern, but it plays a significant role when spotted in groups of patterns, as you will see later.

**HAMMER Candle** – The Trend Reversal Pattern

If a stock is going down and you find a hammer, then there is a chance that the stock will change the direction upwards and vice versa.

This pattern has a significant probability of success, up to 40.8%, according to patternwizard.com, when targeting a 2:1 Reward/Risk ratio.


*Figure 64 – Hammer pattern success rate. Source: Patternwizard*[41]

Here are three examples of AMD stock:

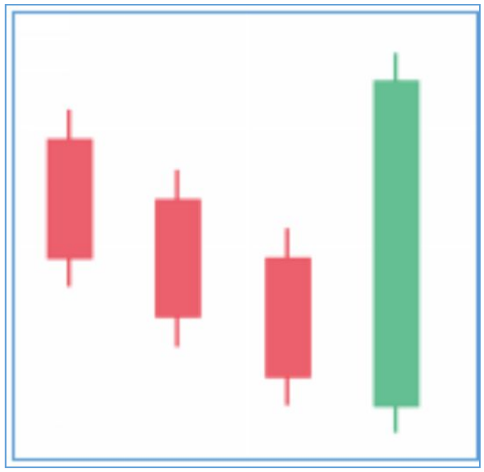

*Figure 65 – Three Hammer patterns spotted on AMD daily chart*

We covered 3 of the frequently spotted single-candle patterns. The next level is to analyze patterns formed by groups of candles.

## Groups of candles

By examining 3 or 4 consecutive candles, we can identify trend reversals. Let's have a look at three popular patterns.

**Three Line Strike** is formed by three consecutive red candles that close lower and lower, but then a 4th green candle comes and closes even higher than the first red candle. This is a sign the trend is going to reverse and continue upward.



This pattern has a Success Rate of 36.9%.


*Figure 66 – Three Line Streak Success Rate. Source: Patternwizard[42]*

**Abandoned Baby** – A bullish pattern comes when a Doji candle appears on a downtrend, with a gap from the previous candles. The thin Doji candle, in this case, indicates that there are no more fresh sellers to drive the price lower; thus, the buyers are likely to over-drive the price direction.

The success rate of this pattern is only 31.8%.

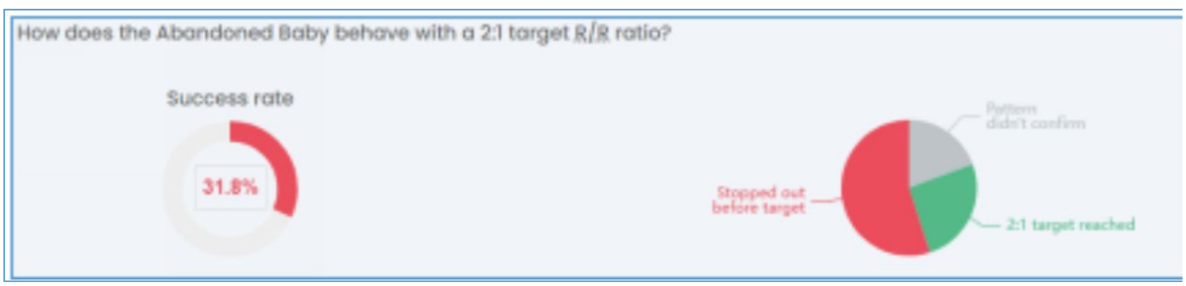



*Figure 67 – Abandoned Baby Pattern Success Rate. Source: Patternwizard*[43]

**Two Black Gapping** – this is a bearish pattern. It appears after a remarkable top when two strong red candles post lower lows. This pattern signals a possible longer downtrend.

My final word before moving forward is that none of these patterns will make you a fortune alone. Instead, you should understand and apply more patterns and follow higher-order techniques. And this is the next chapter about.

# Support and Resistance Levels

**Support Levels** are those price levels where a sufficient number of buyers exists to stop the downward movement of price. Similarly, **Resistance Levels** are the price levels where a good number of sellers exist to halt the upward movement of a price.

On the charts, this appears as consecutive valleys or peaks, which tend to behave as a barrier that is touched over and over again. Investors can optimize their performance if they buy at the support level and sell at resistance.


*Figure 68 – Support and Resistance Levels*

However, traders shall be careful with breakouts, as break-outs down through the support level could indicate a bearish trend is upcoming. If the resistance breaks, then the above resistance will act as a new support line, and this cycle continues like this.

## Going with the Trend

The trend is your friend. So let's get to know each other!

A trend line is a straight line that connects two or more price points and then extends into the future to act as a line of support or resistance, as the case may be. Trend lines connect a series of high or low-price points to define or confirm a trend. The trend may be up or down, but in all cases, at least two relative price highs or lows are needed to draw the trend line. You can also think of it as oblique support or resistance line.

If the price breaks the trend line, it's called a breakout, and a trend reversal might happen.


*Figure 69 – What is a trend line*

It is imperative to determine the trend of the asset that you are going to trade since making money by buying during a negative trend is barely possible.

Up to now, we have talked about the basic principles and techniques. Starting with the next section, we will go through more advanced instruments.

# Volume Indicator

It's not about liters or gallons, of course.

Volume is the number of shares or contracts traded during a given period, usually an hour, a day, a week, a month, etc.

Volume tells the strength or weakness of the price movement. The greater the volume, the more active the stock is; that’s why it’s advisable to trade in a stock where the volume is high.

For example, if an up or down price movement is accompanied by high volume, the move can be considered strong, and vice-versa.

On the chart, the volume indicator looks like a set of vertical bars at the bottom, each corresponding to a candlestick. The higher the bar, the higher the volume in that particular timeframe.

In the previous chart, we saw the trend on the graph of AMD, which had one false and one true break-outs. So let’s retake the same chart and add the volume indicator. This way, we could easily see that the false break-out was not accompanied by any unusual volume, while the true break-out came with an above-average selling volume.

*Figure 70 – Volume indicator on AMD technical chart*

Whatever your preferred indicator is from what is listed here, using it with the volume indicator is very useful. This is because volume might save you from false breakouts.

# Moving Averages

The moving average is a popular technical indicator used by traders. It helps to identify buy or sell opportunities. It is an average of the closing price in a given time frame.

Example: “9 Day moving average” is the average closing price of the last nine days. Similarly, for 20, 50, and 100 days.

If the price is above 200 Day moving average, it is considered the stock is trending. So, for example, you could look for a BUY opportunity when the stock trades above 50 Day moving average or a SELL opportunity when trading below 50 MA. The Moving Average term is often called “SMA,” meaning “Simple Moving Average.” But, as you will learn later, there can also be other types besides the “Simple” one.


*Figure 71 – Representation of a 50-Day Moving Average on a stock chart*

## Moving Average Crossovers

Based on intersections between moving averages, you can judge a trend reversal. For this, you need to use 2 SMAs with different periods, one longer and the other shorter.

As a rule, if the shorter-term moving average crosses the longer-term moving average from below to above, it is considered a BUY signal. In contrast, if the shorter-term moving average crosses the longer-term moving average from above to below, it is considered a SELL signal.

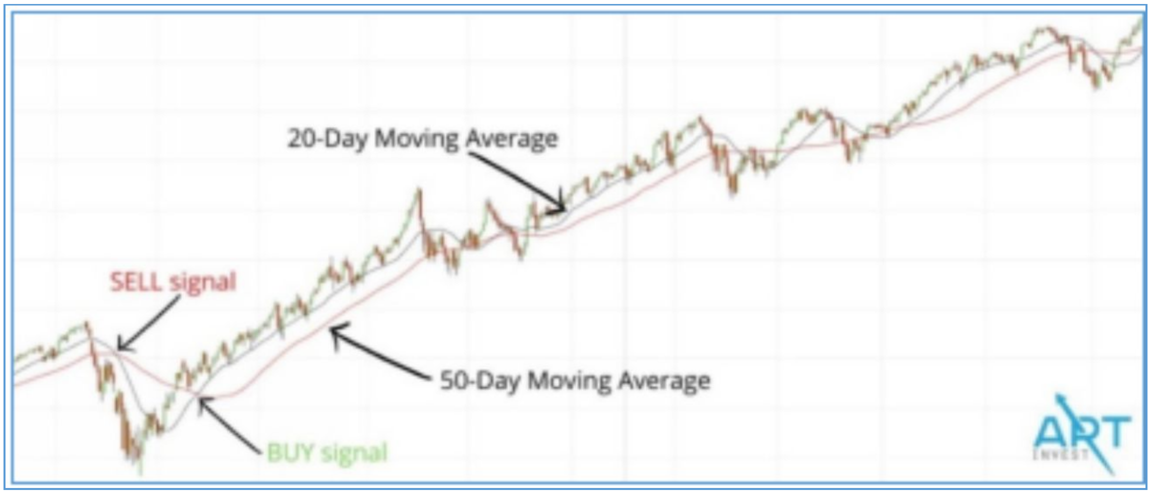



*Figure 72 – Moving Average crossovers*

The moving average crossovers are not used too often in this simple form. Therefore, it is not worth saying more words about it, so let's move to the most used application of this concept.

# MACD, Moving Average Convergence Divergence

Imagine how incredible it would be if you could identify the slowing down and price stabilization after a down-trend so that you can “jump on” the stock at rock bottom.


It looks like the chart is smiling at you!

You could search for such patterns with the naked eye; however, a much more professional approach is to use the MACD indicator, a much more sophisticated usage of the moving average concept.

As per Investopedia’s definition, "MACD is a trend-following momentum indicator that shows the relationship between two moving averages of a security’s price. The MACD is calculated by subtracting the 26-period exponential moving average (EMA) from the 12-period EMA. The result of that calculation is the MACD line."

Then you have to add to the MACD line a 9-Day moving average ("signal line"), which will serve as BUY or SELL signal.

Quite simple, right?

Before giving that up, you have to know that, fortunately, the brokerage tools or TradingView platform provide an easy-to-use feature that adds everything automatically.

The following picture will bring even more clarity:

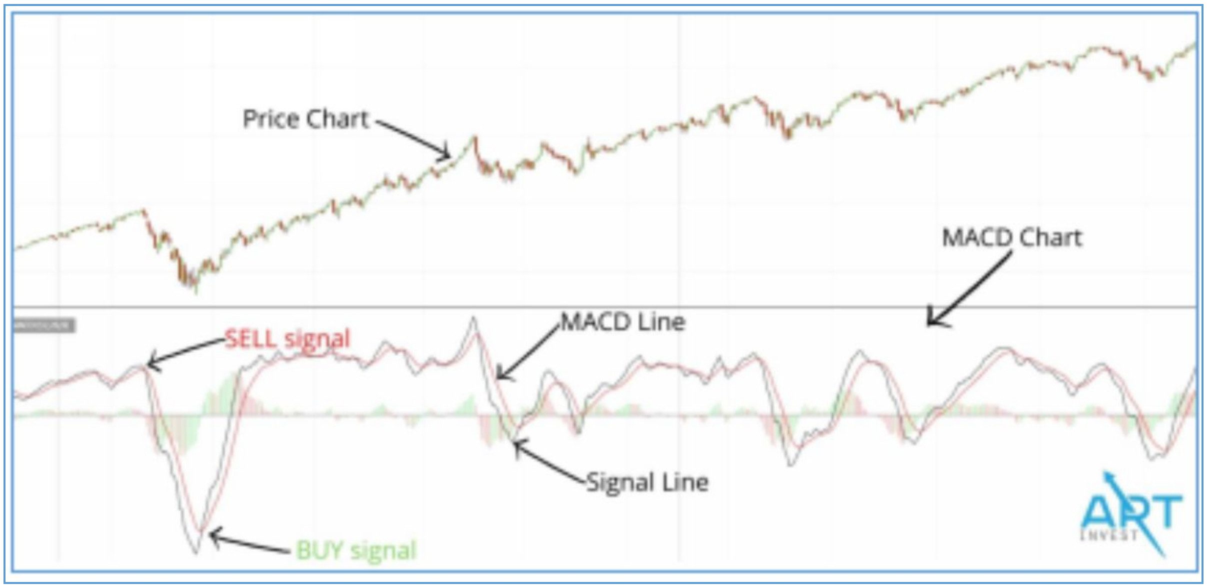



*Figure 73 – MACD example*

The indicator can be added to the chart with just a couple of clicks, and then you have to wait for the respective signals, which occur when the MACD line and the signal line intersect.

It is quite simple, indeed.

# RSI - Relative Strength Index

RSI is a very popular indicator developed by J. Welles Wilder, which is a leading momentum indicator that helps identify trend reversals.

The objective is to identify the overbought or oversold areas. The indicator can oscillate between 0 and 100, and the number will rise as the number and size of positive closures increase, and it will fall as the number and size of negative closures increase.

A value above 70 indicates the stock is overbought, while a value below 30 indicates it is oversold.

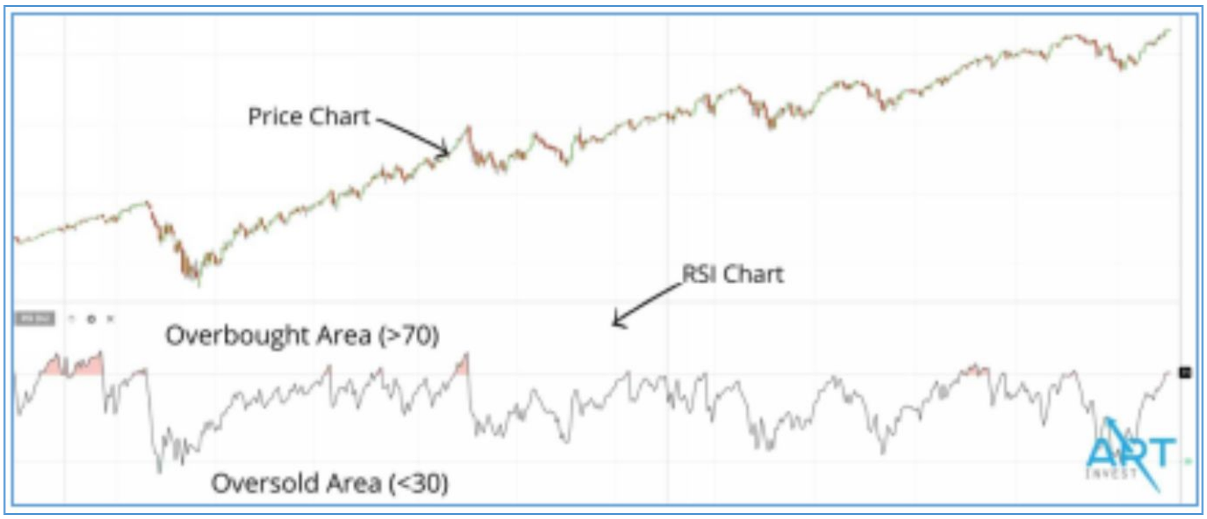



*Figure 74 – RSI example*

The actions to take are clear – buy when the stock is oversold, and sell when the stock is overbought.

As in the case of MACD, the RSI indicator can also be added to the chart quite easily, just with a couple of clicks.

# Bollinger Bands

Introduced by John Bollinger in 1980, it also tells you about the Overbought and Oversold areas.

You shall SELL when the price reaches the band's top and execute a BUY when the price reaches the bottom.

It has three components:

The middle line - 20 Day moving average

The upper band - acts as a resistance line

The lower band - acts as a support line

The upper and lower bands are constructed by evaluating the Standard Deviation of the stock and adding/subtracting that from the 20-Day Moving Average.

In human words, they represent how much the stock is expected to deviate, considering its standard behavior.

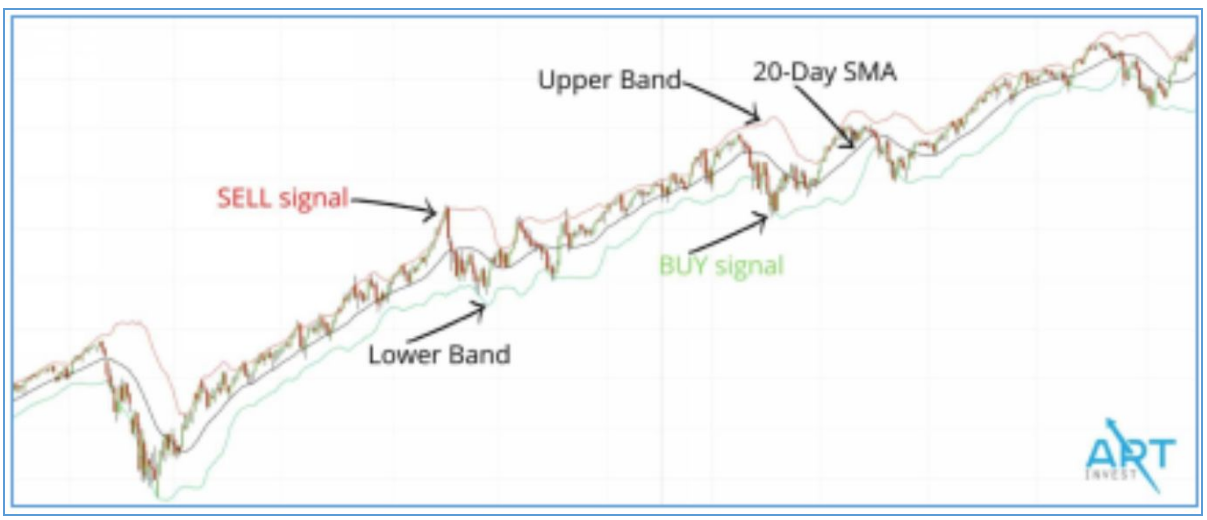



*Figure 75 – Bollinger Bands example*

Similar to the previous two cases, the Bollinger Bands indicator can easily be added to the stock chart using the tools available on your brokerage platform or TradingView. Think of them as more dynamic and flexible support and resistance lines.

# Automatic Signals Detection

**Pine Script** is a programming language designed to create custom technical indicators and trading strategies on TradingView. It was developed by TradingView and is used by millions of traders to build and back-test trading ideas on the platform.

With Pine Script, you can create your own custom indicators, trading signals, and automated trading systems using a simple yet powerful scripting language to perfectly fit your trading strategies. The language is based on JavaScript and is easy to learn, even for those with limited coding experience.

Pine Script allows you to access a wide range of built-in technical indicators and functions, including moving averages, Bollinger Bands, Relative Strength Index (RSI), and many more.

One of the most powerful features of Pine Script is its ability to back-test trading strategies. You can test your strategies on historical price data to see how well they would have performed in the past. This allows you to optimize your techniques.

**Fast Fact:**

Technical Analysis was invented long before computers and automated scripts. Some early pioneers of technical analysis include Charles Dow, credited with developing the Dow Theory in the late 19th century, and Richard W. Schabacker, who wrote a book called "Technical Analysis and Stock Market Profits" in 1932[44], considered a seminal work on the subject.

# Conclusions on technical analysis

I hope the information you got from this chapter will be helpful for you in your trading activity. However, please remember that these are just speculative methods to determine stock price movements. They cannot account for many other factors, including the fundamentals of the particular companies.

On the other hand, technical analysis has its own place in the game as a strategy and many investors claim to have successfully used it.

**So, what shall you do?!**

My personal approach is to combine both technical and fundamental analysis. I call it “A good stock at a good time.”

The fundamental approach comes first and helps me to identify great companies and evaluate their potential in the given economic environment. This is the “good stock” part.

Then, I apply technical analysis to spot opportunities to buy “the good stock“ at discounts and temporary dips. This is how the “good time” comes.

Maybe with time, you will develop your own approach, but for sure, you cannot totally neglect technical analysis, no matter how skeptical you are about it.

# Key Take Aways

Technical analysis is the act of predicting the future of a stock's price based on the past behavior of that price.

The story is not only about the charts. The point is that the graphs often represent the sentiment of market participants.

There are different types of charts. The most common is the Mountain Chart showing only the price over time, and the more advanced is the Candlestick chart, which also shows intra-day variations.

Individual candles can provide some hints on their own. However, the most valuable information is obtained by observing groups of candles that can form patterns.

Support and resistance are the price levels where the stock sees buying or selling pressure and can bounce back.

There are also more advanced tools such as Volume indicator, MACD, RSI, or Bollinger Bands. They can be easily added to a chart using TradingView.

You can also build your own custom indicators using Pine Script on TradingView.

Technical Analysis can be successfully used to optimize the time of a stock purchase. However, the stock to buy is better to identify via Fundamental Analysis.

# 7

# Investor’s Checklist

## To not Miss a Point

*“No matter how expert you may be, well-designed checklists can improve outcomes. “*

– **Steven Levitt**

co-author of Freakonomics

***First Officer***: *"Flight controls?"*

***Captain***: *"Checked!"*

***First Officer***: *"Flaps?"*

***Captain***: *"Flaps 5!"*

***First Officer***: *"Stabilizer trim?"*

***Captain***: *"Set for takeoff!"*

***First Officer***: *"Transponder?"*

***Captain***: *"Mode, Charlie."*

***First Officer***: *"Auto throttles?"*

***Captain***: *"Armed!"*

***First Officer***: *"Spoilers?"*

***Captain***: *"Retracted."*

***First Officer***: *"Before takeoff, checklist complete."*

Checklists are an incredibly powerful tool that can help you stay organized, focused, and productive while reducing the risk of costly errors or oversights. Whether you're a pilot, surgeon, engineer, **or investor**, using a checklist can help you follow a proven process and not miss any important steps.

Objectivity is a crucial attribute for an investor, as it diminishes the effects of emotions and cognitive biases. If you tend to buy a stock, you must also look at the counter-arguments, i.e., why you should not buy the stock.

There is no perfect or universal checklist. It rather depends on the strategy you are looking for. Thus, I will create four different checklists for three different approaches.

Before we start, let me share with you, as an introduction, ten ultimate commandments to identify a good investment:

1. Simple and predictable business
2. Free cash flow generative
3. Dominant market position

4. Difficult barriers to entry
5. High return on invested capital
6. Limited exposure to non-controllable external risks
7. Strong balance sheet where outside capital is not necessary
8. Excellent management, good governance
9. Discounted to intrinsic value
10. Skin in the game

You will find these principles within the following checkpoints. I tried to have them oriented primarily on intuitive answers and not too many numbers so that you are not forced to do extensive research on financial statements, balance sheets, etc.

When deciding whether to invest in a particular stock, go through the list item by item, get the information, and mark if it fits the criteria. A "check" ( ✅ ) means a pro-argument for buying, while an "X" ( ❌ ) indicates a negative argument. Note that they are inspired by the strategies and techniques of the best investors in the world.

How to use the checklists: you can go through all of them or pick what is best suitable for you and your investment profile. There will be a brief description for each of them; however, they all are dedicated to mid and long-term investors. As you probably noted, I do the research mainly by using SeekingAlpha and SimplyWall.st but feel free to use any other tool you prefer.

# General Checklist

Suitable for all kinds of investors. These general questions help you better understand and assess your motivation and feeling about the stock.

- ☐ Will I hold at least 2-3 years, even if it drops 50%?
- ☐ Am I buying on rationality, not emotions?
- ☐ Would I feel comfortable committing a significant portion of my wealth for five years, even if the market is closed for that time?
- ☐ If I had the money to buy the whole company 100% outright for the long term, would I do it? Would I feel comfortable doing it?
- ☐ What is the company's key insight? The secret to their success? What are they seeing that others aren't seeing?
- ☐ Does the company have a competitive advantage? What is it?
- ☐ Is Mr. Market in a euphoric or depressed state regarding this company?
- ☐ Is the entire ecosystem benefiting or only that company? Is it a win-win?
- ☐ Am I sure I am not buying this stock on the part of the greater fool theory in hopes of suckering someone else to buy this bad company at a higher price?
- ☐ Have I analyzed this company by first principles? That is, getting to basic fundamental truths and doing critical thinking to get to the underlying issue.

# Value Investor's Checklist

Suitable for investors who have patience and do not mind waiting a couple of years before their picked stock takes off. Usually, they are a kind of "boring" stocks.

- ☐ Am I buying a wonderful business at a fair price, not a fair business at a wonderful price?
- ☐ Is it at a discount to intrinsic value? If so, how much? Do I have a Margin of Safety?
- ☐ Does the company have good profit margins (>40% gross, >20% operating)? If not, can it improve operating margins over time with economies of scale and efficiency of operations?
- ☐ Is the P/E low enough?
- ☐ Is the P/E below the future growth rate (PEG Ratio <1)?
- ☐ Is the stock cheap on an absolute basis, not only on a relative basis compared to other companies?
- ☐ Am I paying for the business as it is today- not for an excessively rosy expectation of where it might be in the future?
- ☐ How is the firm's cash flow? How is the firm's leveraged free cash flow (operating – investing cash flow)? What is the free cash flow yield? FCF/current stock price
- ☐ Can the company cover current obligations? Is the "current ratio" above 2? Is the working capital improving year over year? Is the "cash ratio" (cash/current liabilities) above 1?
- ☐ Are they the number 1 player in the industry?

# Growth Investor’s Checklist

Suitable for investors and traders who enjoy some adrenaline during the investing process. Growth stocks are usually very volatile.

- ◻ Will the company experience good future long-term growth? Is there a long-run way for growth?
- ◻ Does the company offer 10x potential (or greater) on a 10-year horizon?
- ◻ Does the company have consumers addicted emotionally, even at a cult-like level? Do consumers and employees rave about the company’s products, or do they hate them?
- ◻ Is the company innovative? Do they constantly challenge the norm and try to disrupt the status quo instead of being complacent and basking in glory?
- ◻ Does the company have the ability to scale?
- ◻ Isn’t the company boring?
- ◻ Is the company the "next big thing"?
- ◻ Does this company have the potential to change how we behave or do our life? If so, how?
- ◻ Does the business have a clear path to profitability and gushing recurring operating cash flow?
- ◻ Does the company spend on research and development?

# Safe Investment Checklist

Suitable for risk-averse investors. This checklist will help you assess whether you feel comfortable with the amount of risk you take by investing in the picked company.

- ☐ Is revenue dependent on credit markets, one customer, or commodity prices?
- ☐ Can the company repay all debt within three years? Is debt equaling multiple years of free cash flow?
- ☐ Do the regulations favor or hinder the company?
- ☐ Will time help the company or hinder the company?
- ☐ Are we in an inflationary or disinflationary environment? In Inflation, energy, industrials, and financials do well. In disinflation, goldilocks environments, technology, and growth stocks do well.
- ☐ Why do sellers sell? Am I sure their arguments are wrong?
- ☐ Will I sleep well at night owning this company?
- ☐ Do insiders own a lot of the company?
- ☐ Does the CEO have a vision? Does the CEO have a good track record of success in entrepreneurship or business?
- ☐ Is the company recession-proof, antifragile?

Now that we know the questions, the best thing we can do next is to work out an example and see how to apply them. I will address the same questions, then put the checks, accompanied with explanations. At the end of each checklist, there will be the accumulated score.

# Investing in Tesla

Let's suppose we consider investing in Tesla (TSLA) stock. We will analyze this option based on the knowledge, economic environment, and financial data as of March 2023.

## General Checklist

✅ **Will I hold at least 2-3 years, even if it drops 50%?**

Yes, definitely. The Electric Vehicles industry still has a long way to grow, and Tesla is a key player. Even if it drops 50%, I am sure it will recover.

✅ **Am I buying on rationality, not emotions?**

This is a difficult one and personally addresses each investor. To prove myself that I decided on rationality, I will argue with the fact that Tesla became a profitable EV company in 2020 and has grown its Net Profits since then.

✅ **Would I feel comfortable committing a significant portion of my wealth for five years, even if the market is closed for that time?**

Again, a very personal question. To answer that, I will refer to my income stability. Even if the market is closed for five years after my investment, I won't have dramatic consequences on my living, as I have a stable income and do not depend on the investment performance.

✅ **If I had the money to buy the whole company 100% outright for the long term, would I do it? Would I feel comfortable doing it?**

Here is a sure yes, especially for the symbol that Tesla represents. However, when answering this question, try not to be misled by the euphoric dream of having so much money that you can buy the whole company. Better, think if this is the one company you would buy and not others. It's like marriage.

✅ **What is the company's key insight? The secret to their success? Is there something they see that others aren't seeing?**

I always liked Tesla's approach to building a whole infrastructure with their Superchargers and Storage solutions. Furthermore, Tesla is often seen as a technology company as it drives innovation in the EV industry and has a key role in autonomous driving.

✅ **Does the company have a competitive advantage? What is it?**

Let's look at some key indicators when talking about Electric Vehicles.

Range: According to cars.com, Tesla Model S gets second place in the longest-range electric cars with 405 miles[45], shadowed by Lucid Air (516 miles). Not the first place, but interesting is that Model X follows it in third place and Model Y in fifth.

I am not 100% comfortable giving the checkmark, and normally I would do much more research here. However, let's give the check since Tesla is showing up three times in a top 5 ranking.

✅ **Is Mr. Market in a euphoric or depressed state regarding this company?**

No need to do any research here. Content about Tesla is everywhere, and optimism can be felt in the air.

✅ **Is the entire ecosystem benefiting or only that company? Is it a win-win?**

Considering the environmental impact of what Tesla is doing, it is a clear "yes." It is not only the company making profits; both the ecology and society are benefiting from the progress Tesla is pushing and the products they offer.

✅ **Am I sure I am not buying this stock on the part of the greater fool theory in hopes of suckering someone else to buy this bad company at a higher price?**

This question can be simply exchanged by “Am I investing or just speculating”? In my case, I believe in the company’s prospects, and I will put my bold check here. However, if you just want a quick profit by riding its volatility, you shall not set your checkmark here.

✅ **Have I analyzed this company by first principles? That is, getting to basic fundamental truths and doing critical thinking to get to the underlying issue.**

I will put a check here immediately, at least because we will go through the rest of the checklists, meaning we will analyze the company’s fundamental aspects. Please don't put this checkmark if you will not use the other checklists when analyzing your stock.

**General Score: 10**

## Value Investor’s Checklist

❌ **Am I buying a wonderful business at a fair price, not a fair business at a wonderful price?**

Let’s try to be objective. The automotive industry is challenging and complicated. It can be victim to economic cycles, and the end product is an extremely complex piece of technology. A claim of some defect can cost the company millions of dollars. It is hard to say that it is a wonderful business, and I simply cannot put that checkmark, regardless of the valuation.

❌ **Is it at a discount to intrinsic value? If so, how much? Do I have a Margin of Safety?**

It is difficult to answer this question as the DCF computation is complicated, time-consuming, and partly subjective. Therefore, I recommend using tools such as SimplyWall.st to get your answer. According to them, the company’s fair price is $134, while it currently trades at $195 (March 2023). So, it misses this checkmark as well.

✅ **Does the company have good margins (ex >40% gross, >20% operating)? If not, can it improve operating margins over time with economies of scale and efficiency of operations?**

Hm, so, so. The Gross Profit Margin is about 25%, below the sector median of 35%. However, I like its EBITDA and Net Income margins, sitting at 21% and 15%, respectively. It is well above the sector median and extremely good for such an innovative company.

❌ **Is the P/E low?**

The question sounds ridiculous in the case of Tesla. Its P/E ratio is sitting at 54, which is very high.

✅ **Is the PEG Ratio below 1?**

Yes, indeed. Its PEG ratio is 0.44, which aligns with the sector average.

❌ **Is the stock cheap on an absolute basis, not only on a relative basis compared to other companies?**

We already saw that by the absolute valuation method used by Simplywall.st. The company is trading far from its intrinsic value, and its price is higher than many of its competitors.

❌ **Am I paying for the business as it is today- not for an excessively rosy expectation of where it might be in the future?**

To be honest, no. If I bought Tesla today, that would be not for what they are providing today but for the future potential.

✅ **How is the firm's cash flow?**

Let's look at the Free Cash Flow / Share to keep it simple. It has been consistently rising and currently sits at 2.41$ for the trailing twelve months and is projected to grow rapidly. This is a good sign, and thus I give a checkmark.

✅ **Can the company cover current obligations? Is working capital improving year over year? Is the cash ratio (cash/current liabilities) above 1?**

Here we get a surprising "yes." Tesla's cash flow improved over the last few years while its debt reduced significantly. The debt-to-equity ratio is as low as 12.5%

❌ **Are they the number 1 player in the industry?**

It depends a little bit on what you look at. Model Y is the best-selling car in the world[46], followed by BYD in second place and Model 3 in third. However, on overall sales, BYD has grown significantly in the last two years, and currently, it outpaced Tesla significantly in the market share[47]. Other automakers are trying hard to break into the EV industry, and I am afraid Tesla will lose steam.

**Value Score: 4**

## Growth Investor's Checklist

✅ **Will the company experience good future long-term growth? Is there a long-run way for growth?**

The company's revenue grew by 51% last year and is projected to grow by 35% next year. Impressive growth figures are also valid for EPS.

✅ **Does the company offer 10x potential (or greater) on a 10-year horizon?**

The current EPS is $4.02, and the average forecast is to reach $6.5 by 2026, while the most optimistic estimations say up to $10.5. On the other hand, the EV segment is just at about 13% of the entire automotive industry. So there is much room for growth as the pie will get bigger and bigger.

✅ **Does the company have consumers addicted emotionally, even at a cult-like level? Do consumers and employees rave about the company's products, or do they hate them?**

Yes, definitely. Everyone knows what Tesla company is, and many listen to what Elon Musk says. Most people love the company and its products.

✅ **Is the company innovative? Do they constantly challenge the norm and try to disrupt the status quo instead of being complacent and basking in glory?**

No comments here.

✅ **Does the company have the ability to scale?**

This is an interesting question. What would it mean for Tesla to scale? Gain more customers, i.e., sell more cars. It is tough, but it gets my checkmark due to past performance and because the EV sector has just started its era.

✅ **Isn't the company boring company?**

Of course not. Its eccentric CEO makes it a first-page company.

✅ **Is the company the "next big thing"?**

This question is related more to the sentiment of the public and investors. It is already the "next big thing" and will still be at least from inertia.

✅ **Does this company have the potential to change how we behave or do our life? If so, how?**

I see it from two perspectives. First, it is the EV stuff itself, but on the other hand, we are all aware that autonomous driving is the future and will change our lives.

✅ **Does the business have a clear path to profitability and gushing recurring operating cash flow?**

My answer is yes, and my argument is the amount of free cash flow the company managed to grow during the last few years. Not in the so distant 2017, it had a negative FCF / share of -$4.99, while in 2021, it had $3.53. During the same period, it turned the negative Net Income of -$1,962 million into a positive $5,519 million.

✅ **Does the company spend on research and development?**

Yes, it spent a decent $3 Billion on Research and Development in 2022. And the number has been steadily increasing since 2019.

**Growth Score: 10**

## Safe Investment checklist

❌ **Isn't revenue dependent on credit markets, one customer, or commodity prices?**

Well, it is. Its revenue is highly dependent on the credit markets as most people are taking loans to buy a car. It also directly depends on commodity prices such as steel, aluminum, and lithium.

✅ **Can the company repay all debt within three years? Isn't debt equaling multiple years of free cash flow?**

The cash covers all the debt more than four times.

✅ **Do the regulations favor or hinder the company?**

In the case of Tesla, it is easy to answer as the green energy and electric vehicles segment is highly favored nowadays.

✅ **Will time help the company or hinder the company?**

I consider that time will help the company as people get more used to electric vehicles, the infrastructure evolves, and the technology becomes cheaper, thus more accessible. Even if Tesla might lose its slice of the cake, the cake itself gets bigger.

❌ **Are we in an inflationary or disinflationary environment? In Inflation, energy, industrials, and financials do well. In disinflation, goldilocks environments, technology, and growth stocks do well.**

We are clearly in an inflationary environment. This means the current economic climate does not favor the automotive industry.

❌ **Why do sellers sell? Am I sure their arguments are wrong?**

Well, we have to deal now with one of the most controversial stocks. The arguments for not buying Tesla stock are straightforward: it is overvalued, the competition is getting tight, it is too much based on euphoric sentiments, and so on. Unfortunately, I can hardly prove these arguments are wrong.

❌ **Will I sleep well at night owning this company?**

Not really. What happens if Elon Musk dies in an accident? Tesla is a symbol company, and nothing good awaits us in case its symbol dies. In addition, what happens if there is a loud car crash at the fault of the autopilot? What happens if the vehicles start to burn during charging because of some stupid engineering mistake? As mentioned before, it is a super complicated technology, and plenty of risks are associated with it.

✅ **Do insiders and institutions own a lot of the company?**

Yes. Individual insiders hold 14.5% of shares, and institutions hold about 43%.

✅ **Does the CEO have a vision? Does the CEO have a good track record of success in entrepreneurship or business?**

In this particular case, it is very simple to answer – yes.

❌ **Is the company recession-proof, antifragile?**

Unfortunately, no. That's the case with the whole automotive industry. Nobody will take a loan for a new car when they lose their jobs or can barely pay their bills and put food on the table.

**Safety Score: 5**

## Score Summary

Here are the accumulated scores:

General Score: 10

Value Score: 4

Growth Score: 10

Safety Score: 5

You got the relevant ideas throughout the checklists, and the main conclusion is that Tesla is an excellent stock to invest in, with very high potential. However, it is very much overvalued at the moment of writing, and it also presents several risks as it relies very much on public opinion and operates in a challenging industry.

# Key Take Aways

Checklists are a valuable tool to keep you objective and focused.

Checkpoints can be tuned to patch any particular investing approach.

By always following your checklists, you will avoid making decisions in a rush, impatient, or based on your emotions.

You can analyze a stock through more checklists and then weigh the score summary to match what is most important for you.

Believe it or not, checklists are a great tool to make you more disciplined.

# 8

# Diversification

## The Free Lunch in Finance

*"Don't put all your eggs in one basket."*

**– a well-known proverb**

I bet you know the famous saying, “You should not put all your eggs in one basket.” The simple logic behind this proverb implies that you can lose all your resources if you direct them to only one area.

Investing on its own is a risky venture, especially if you don't have proper knowledge of how to go about it. Hence, diversification in stock investing will require buying stocks from different companies rather than from only one company.

**But how to diversify?**

Diversifying your portfolio is not as complicated as it sounds. In this chapter, I will cover the importance of diversification in investing and guide you on creating a diversified portfolio as an investor.

# What is Diversification, and why should you diversify

The main aim of diversification is to manage risk in your investment so that there will be a difference in the performance of your investments cumulatively.

Imagine buying stocks of only one company. If the company's performance reduces or they go bankrupt, it will affect your investment dramatically. On the other hand, if you invest in multiple asset classes, you will have less fear if one asset class eventually performs poorly.

For instance, generally, stocks perform better than cash and bonds in terms of returns, although they often present more risks. On the other hand, bonds don't produce many returns but often hedge against risks when the stock market is down. By properly diversifying your investment, you will be conserved or even growing, even if a part of your portfolio is declining.

# Types of Diversification

Diversifying your investment portfolio doesn't have a particular formula. The basic rule is that you should invest in different financial assets so that your rate of returns will be different and losses in one asset class might be compensated by another.

Another foreword here is that regardless of the type of diversification, the key thing is to choose assets that are **not correlated**. The correlation coefficient is the mathematical relationship that describes how much two assets tend to move together in the same direction. More about that later.

## Diversification across sectors

This is one of the easiest ways to create a diversified portfolio. In doing this, you shall buy several stocks from different sectors. Hence, you shouldn't just restrict your investments to a particular sector to avoid a significant loss during an economic slowdown.

In general, the stocks are split into 11 sectors:

**1. Consumer Cyclicals**

Rely heavily on the business cycle and economic conditions. Consumer cyclical include industries such as automotive, housing, entertainment, and retail.

Think that they sell things people don't necessarily need but enjoy buying, like cars, clothes, game consoles, and dining out.

The risk of investing in this sector is that people may stop spending money on these things during tough economic times.

However, when the economy is doing well, these companies can make much money because people have more money to spend on non-essential items.

Stocks: Amazon (AMZN), Tesla (TSLA), Home Depot (HD), Alibaba (BABA), Toyota Motor (TM).

ETFs: Vanguard Consumer Discretionary ETF (VCR), Consumer Discret Sel Sect SPDR ETF (XLY).

### 2. Technology

Relating to the research, development, or distribution of technologically based goods and services. This sector contains businesses revolving around electronics manufacturing and creating software, computers, or products and services relating to information technology.

Investors are often attracted to the technology sector due to its rapid growth and innovation potential. Companies in this sector are often at the forefront of technological advancements and, as such, can experience significant growth if their products and services are booming.

However, investing in the technology sector can also be risky, as companies in this sector can be susceptible to changes in consumer preferences, technological advancements, and global economic conditions.

Stocks: Apple (AAPL), Microsoft (MSFT), Nvidia (NVDA), Taiwan Semiconductor (TSM), ASML Holding (ASML).

ETFs: Vanguard Information Technology ETF (VGT), Technology Select Sector SPDR ETF (XLK).

### 3. Communication Services

Companies that make communication possible on a global scale, whether it is through the phone or the Internet, through airwaves or cables, through wires or wirelessly.

The more often you call your mom, the better this sector is doing.

Investors interested in the communication services sector often look for companies with a competitive advantage in their respective markets, as well as those positioned to benefit from trends such as increased internet usage and digital media consumption.

However, this sector can also be subject to regulatory risks, as governments can restrict the types of content that can be distributed and the pricing and quality of telecommunications services.

Overall, the communication services sector is an important and rapidly evolving sector that has become increasingly important to our daily lives. As such, it is an area of focus for many investors seeking to capitalize on the continued growth of technology and media consumption.

Stocks: Alphabet (Google), Meta Platforms (Facebook), Vodafone (VOD), Orange (ORAN), AT&T (T).

ETFs: Vanguard Communication Services ETF (VOX), Fidelity MSCI Communication Services ETF (FCOM).

**4. Financial Services**

This is about financial firms, including banks, investment houses, lenders, finance companies, real estate brokers, and insurance companies.

This sector is pleased when you use your credit card.

The financial sector tends to perform well during periods of economic growth and low-interest rates. However, the sector can also be subject to significant risks and volatility, particularly during economic uncertainty or regulatory changes. As such, it is important for you to carefully evaluate the financial health, competitive positioning, and regulatory environment of financial companies before investing in them.

Stocks: Berkshire Hathaway (BRK.A, BRK.B), JPMorgan (JPM), VISA (V), Bank of America (BAC), Mastercard (MA).

ETFs: Vanguard Financials ETF (VFH), Financial Select Sector SPDR ETF (XLF)

**5. Healthcare**

If you want to support this sector, stop having a healthy life. Just kidding.

The healthcare industry is like a vibrant ecosystem comprising various players working together to keep people healthy and happy.

Each player in the healthcare industry brings their unique expertise and strengths to the table, resulting in a diverse and dynamic environment. As a result, pharmaceutical companies and medical device manufacturers create innovative products that improve the quality of life for millions of people.

The healthcare industry is also at the forefront of technological innovation, with cutting-edge digital health technologies like telemedicine and wearable health devices transforming how healthcare is delivered. It's fascinating to see how these technologies are making healthcare more accessible and convenient, allowing people to receive care from the comfort of their own homes.

However, the healthcare industry faces challenges, such as rising costs, workforce shortages, and the need to ensure equitable access to care for all. Despite these challenges, the healthcare industry remains one of the most exciting and rewarding fields to invest in.

Stocks: Johnson & Johnson (JNJ), AstraZeneca PLC (AZN), Pfizer (PFE), Abbott Laboratories (ABT)

ETFs: SPDR S&P Health Care Equipment ETF (XHE), Health Care Select Sector SPDR ETF (XLV)

### 6. Industrials

The industrial sector is fascinating and diverse, including many companies involved in manufacturing, construction, engineering, and other related industries. Moreover, the industrial sector plays a critical role in the global economy, providing the infrastructure and goods needed for modern life.

For example, the industrial sector produces everything from automobiles and airplanes to construction materials and industrial machinery. These products are essential for transportation, construction, manufacturing, and many other industries that drive economic growth and development.

Moreover, the industrial sector is also a key player in the transition to a more sustainable and environmentally friendly economy. Companies in the sector are increasingly focused on developing and implementing clean technologies and sustainable practices that reduce waste and greenhouse gas emissions.

Stocks: Caterpillar Inc. (CAT), Deere & Company (DE), General Electric (GE)

ETFs: Invesco S&P 500 Equal Wt Indls ETF (RGI), Industrial Select Sector SPDR ETF (XLI)

**7. Basic Materials**

The Basic Materials sector includes companies involved in extracting, processing, and manufacturing raw materials, such as metals, chemicals, and construction materials.

For example, metals such as copper, aluminum, and steel are essential for building infrastructure, including roads, bridges, and buildings. Chemicals produced by the Basic Materials sector are used in various applications, from pharmaceuticals to plastics and fertilizers. Construction materials such as cement and asphalt are used to build homes, commercial buildings, and other structures.

Stocks: LG Chemical (LGCLF), Newmont Corporation (NEM), Air Products and Chemicals (APD), Barrick Gold (GOLD), BHP Group Limited (BHP)

ETFs: Materials Select Sector SPDR Fund (XLB), Vanguard Materials ETF (VAW)

**8. Real Estate**

If you want to support this sector, you can buy a new house.

The real estate sector deals with companies involved in the ownership, development, and management of real estate, including residential and commercial properties.

The real estate sector is responsible for developing and managing the buildings and infrastructure we rely on for work, leisure, and everyday life. This includes everything from office buildings and shopping malls to residential apartments and public spaces.

An interesting aspect of the real estate sector is how it is affected by demographic trends and social change. For example, population size, age, and income level changes can significantly impact demand for different real estate types, such as housing, commercial properties, and senior living facilities.

Economic and financial factors, such as interest rates, capital flows, and market cycles, heavily influence the real estate sector. Shifts in these factors can significantly impact real estate prices and investment returns, making the sector a dynamic and challenging area for investors and real estate professionals.

**Fast Fact:**

Have you heard about 3D-printed houses?

3D-printed houses can be built in a fraction of the time and cost of traditional construction methods, just in days or weeks.

Another impressive aspect of 3D-printed houses is that they can be highly customizable, creating unique designs and shapes that would be difficult or impossible to achieve with traditional construction methods.

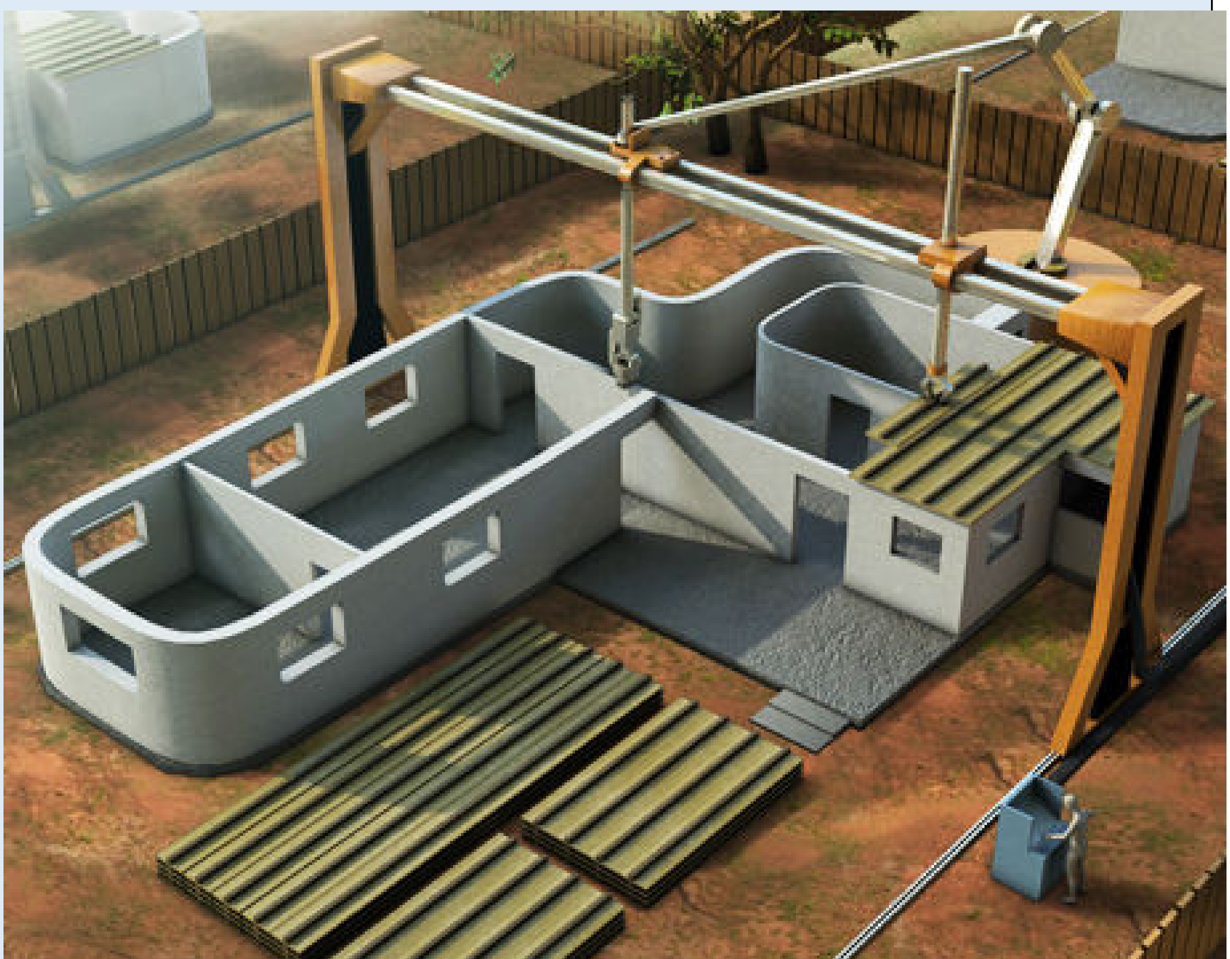


*Figure 76 – House 3D Printing. Image Source: ASME[48]*

Stocks: Prologis (PLD), American Tower (AMT), Crown Castle International (CCI), Public Storage (PSA), Welltower (WELL).

ETFs: Real Estate Select Sector SPDR (XLRE), iShares Cohen & Steers REIT ETF (ICF).

## 9. Consumer Defensive

The Consumer Defensive sector includes companies that produce essential consumer goods, such as food, beverages, and household products. Smokers are great supporters of this sector, as well.

Interestingly, this sector tends to be relatively stable and resilient during economic downturns, as people still need to purchase essential items regardless of the economic climate. Even if you get a wage cut, you still need to wash your head and teeth, shave your beard and use toilet paper.

Here we can find many well-known and established brands like Head & Shoulders, Coca-Cola, and Gillette.

Are you likely to get a “Coca-Cola” or a “NoName-Cola”?

You see, these brands have built up strong customer loyalty and trust over time, making them less vulnerable to shifts in consumer preferences and market trends.

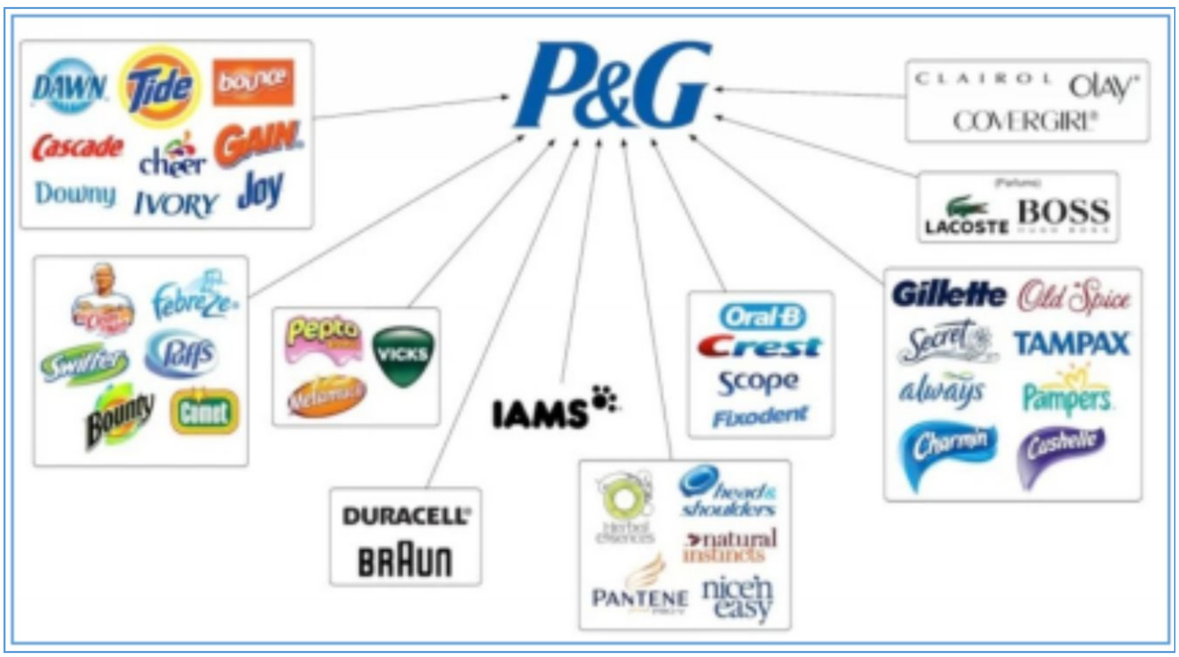



*Figure 77 – All these brands belong to Procter and Gamble. Source: Genesislbsimblog[49]*

The Consumer Defensive sector is heavily regulated, with strict food safety and product labeling requirements, as well as labor and environmental regulations. This presents both challenges and opportunities for companies in this sector as they seek to comply with regulations while maintaining their competitive edge in the market.

Stocks: Walmart (WMT), The Procter & Gamble Company (PG), The Coca-Cola Company (KO), PepsiCo (PEP), Costco Wholesale (COST)

ETFs: iShares US Consumer Staples ETF (IYK), Consumer Staples Select Sector SPDR ETF (XLP).

### 10. Energy

“Let there be light!” - Said the electrician.

The energy sector is a critical part of the global economy and encompasses a wide range of industries involved in the production and distribution of energy.

**Fast Fact:**

Renewable energy is proliferating: Renewable energy, such as solar and wind power, is the fastest-growing energy source globally. In fact, renewable energy accounted for 72% of all new power capacity additions in 2019. This shift towards renewable energy is driven by concerns about climate change and the desire to reduce greenhouse gas emissions.

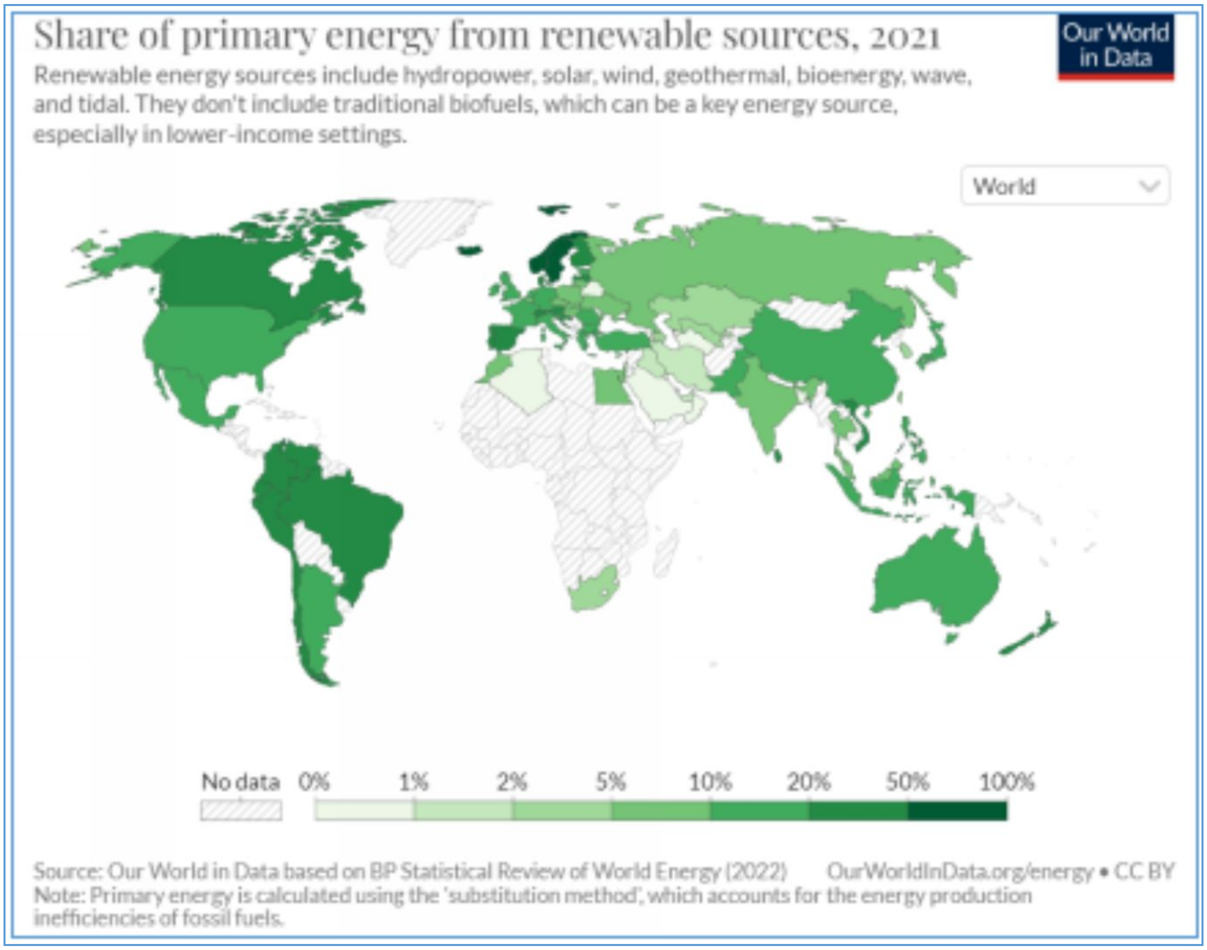



*Figure 78 - How much of our energy comes from renewables? Source: [Ourworldindata](#)[50]*

Investing in the energy sector is different from other sectors because it depends a lot on the prices of commodities like oil and gas, and the industry requires a lot of money to maintain and grow operations.

Energy companies are also heavily regulated, and regulation changes can impact their profitability. In addition, technological advancements and global events can also impact the energy sector. As an investor, it's important that you are aware of these factors and understand how they can affect energy companies and the energy market.

Stocks: Exxon Mobil (XOM), Chevron (CVX), Shell plc (SHEL), BP plc (BP)

Renewable Energy Stocks: NextEra Energy (NEE), Brookfield Renewable Partners (BEP), Clearway Energy (CWEN)

ETFs: Energy Select Sector SPDR ETF (XLE), Vanguard Energy ETF (VDE)

Renewable Energy ETFs: First Trust Nasdaq Clean Edge Smart Grid Infrastructure Index ETF (GRID), First Trust Nasdaq Clean Edge Green Energy Index Fund (QCLN)

### 11. Utilities

Pay your bills regularly to support this sector!

The utility sector provides essential **services** like electricity, gas, and water necessary for modern life. The sector is a significant employer and an important investment opportunity, with utility companies often paying dividends to investors. Sometimes it is hard to distinguish whether a company belongs to the Utilities or Energy Sectors.

Stocks: National Grid (NGG), Canadian Solar (CSIQ), Sunnova Energy International (NOVA)

ETFs: Invesco S&P 500® Equal Weight Utilts ETF (RYU), Utilities Select Sector SPDR® ETF (XLU).

Whew! These were all of them!

To prove that it is good to diversify across sectors, we can look at their performance over some time. For example, here are the returns as shown by Finviz:


*Figure 79 – Different sectors' performance as of April 2023. Source: Finviz*[51]

As you can see, if you were primarily invested in the Real Estate sector, you won't be too happy right now. On the other hand, Energy seems to have returned a stable growth. It is hard to predict how they will behave in the future, so the best thing you can do might be to diversify across sectors.

But it is not as simple as throwing your money into different stocks.

So, let's work out some examples.

# Examples of Diversification

## Bad Diversification Example – Mastercard (MA) and VISA (V)

Although your performance would have been brilliant if you invested in any of these two stocks, it is not a good diversification example as both companies operate in the same sector and are highly correlated. Using PortfolioVisualizer, we can see the performance from 2015 to 2023 of a portfolio consisting of MA only and a portfolio of 50% MA and 50% V.

| Portfolio | Initial Balance | Final Balance | CAGR | Stdev | Best Year | Worst Year | Max. Drawdown | Sharpe Ratio |
|---|---|---|---|---|---|---|---|---|
| 100% MA | $10,000 | $42,239 | 19.98% | 24.08% | 59.16% | -2.66% | -26.19% | 0.84 |
| 50% MA / 50% V | $10,000 | $39,163 | 18.82% | 22.14% | 51.24% | -3.02% | -26.61% | 0.84 |

*Figure 80 – Comparison between 100% Mastercard and 50% Mastercard / 50% VISA*

Please have a look at the Standard Deviation (Stdev). It has reduced a little bit in the diversified portfolio, but on the other hand, also the gain was slightly reduced. Consequently, the Sharpe Ratio remained the same, which means we got almost the same return for a unit of volatility.

Before we go further, please note that, in general, diversification is aimed at reducing portfolio volatility or increasing the return for a given level of risk (Sharpe Ratio). A diversified portfolio will never compete with a super performer like Tesla, but it will protect you against massive drops like the one we saw on TAL Education Group (TAL) stock.

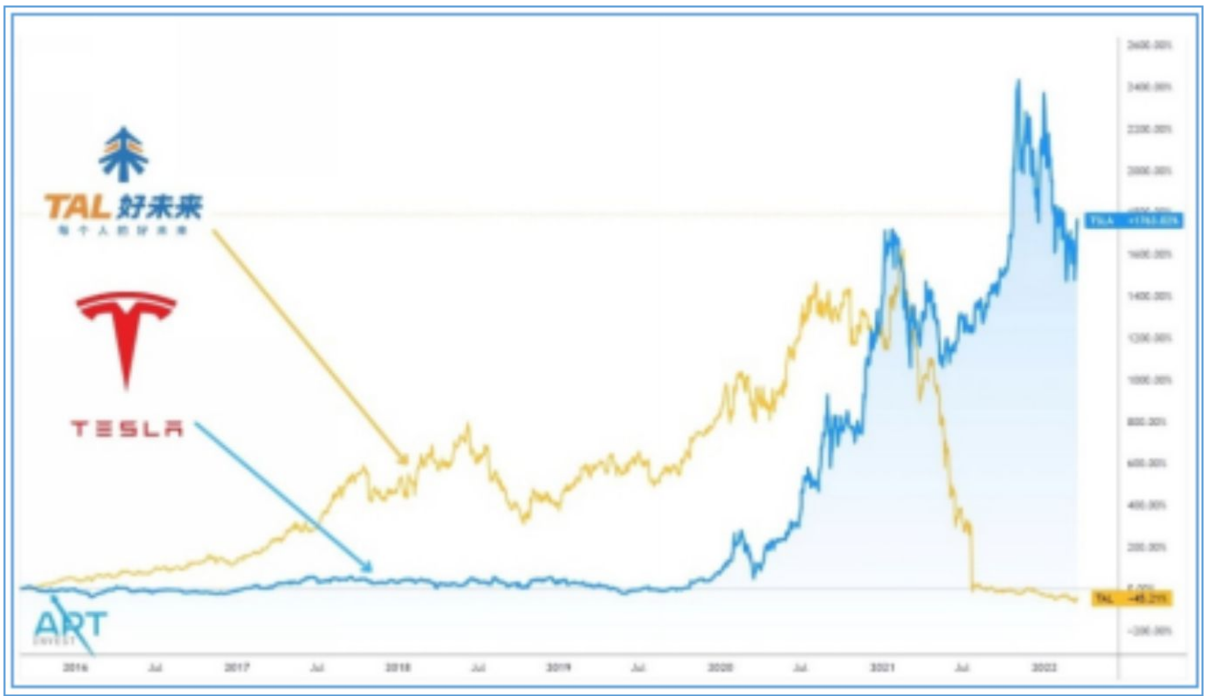



*Figure 81 – Skyrocketing Tesla vs. Nosediving TAL*

## Good Diversification Example - Mastercard and NextEra Energy

After reading this chapter and knowing that you must diversify across sectors, you add NextEra Energy (NEE) stocks to your MA portfolio. Let's see how the three portfolios performed:

| Portfolio | Initial Balance | Final Balance | CAGR | Stdev | Best Year | Worst Year | Max. Drawdown | Sharpe Ratio |
|---|---|---|---|---|---|---|---|---|
| 100% MA | $10,000 | $42,239 | 19.96% | 24.08% | 59.16% | -2.66% | -26.19% | 0.84 |
| 50% MA / 50% V | $10,000 | $38,163 | 18.82% | 22.14% | 51.24% | -3.02% | -26.61% | 0.84 |
| 50% MA / 50% NEE | $10,000 | $40,173 | 19.20% | 16.08% | 50.93% | -5.62% | -17.61% | 1.11 |

*Figure 82 – Adding NextEra Energy (NEE) stock for diversification*

As you can see, the Standard Deviation went significantly lower, while the return remained similar to the previous example. Thus the Sharpe Ratio increased. The maximum Drawdown is impressively sweeter than in the other two cases.

**Now, the unexpected fact comes!**

Just look at the individual CAGR and Standard Deviation of our assets:

| Ticker | Name | CAGR | Stdev | Best Year | Worst Year | Max Drawdown |
|---|---|---|---|---|---|---|
| MA | Mastercard Incorporated | 19.96% | 24.08% | 59.16% | -2.66% | -26.19% |
| V | Visa Inc. | 17.58% | 21.24% | 47.17% | -3.39% | -27.28% |
| NEE | NextEra Energy, Inc. | 18.06% | 19.50% | 42.69% | -8.58% | -23.52% |

*Figure 83 – CAGR and Standard Deviation of the three stocks*

The Standard Deviation of NEE is 19.5%, and the Maximum Drawdown is -23.5%! So how does it come that it reduced the volatility of the portfolio?!

You already have the answer: **Correlation**.

In simple words, the volatility of NEE moves independently of MA volatility, so the two stocks compensate for each other's swings. Mathematically, you can see the correlation matrix between these assets below:

| Ticker | MA | V | NEE |
|---|---|---|---|
| MA | 1.00 | 0.91 | 0.09 |
| V | 0.91 | 1.00 | 0.14 |
| NEE | 0.09 | 0.14 | 1.00 |

*Figure 84 – Correlation of the three stocks*

As you can see, the correlation between MA and NEE is only 0.09, meaning they move almost independently. On the other hand, the correlation between MA and V is 0.91, which means they are close friends and move in tandem 91% of the time. Thus it did not bring an advantage to diversifying MA with V.

If you don't believe in this kind of mathematical and statistical units, you can simply have a look at the chart below, which represents the three stocks since 2015:

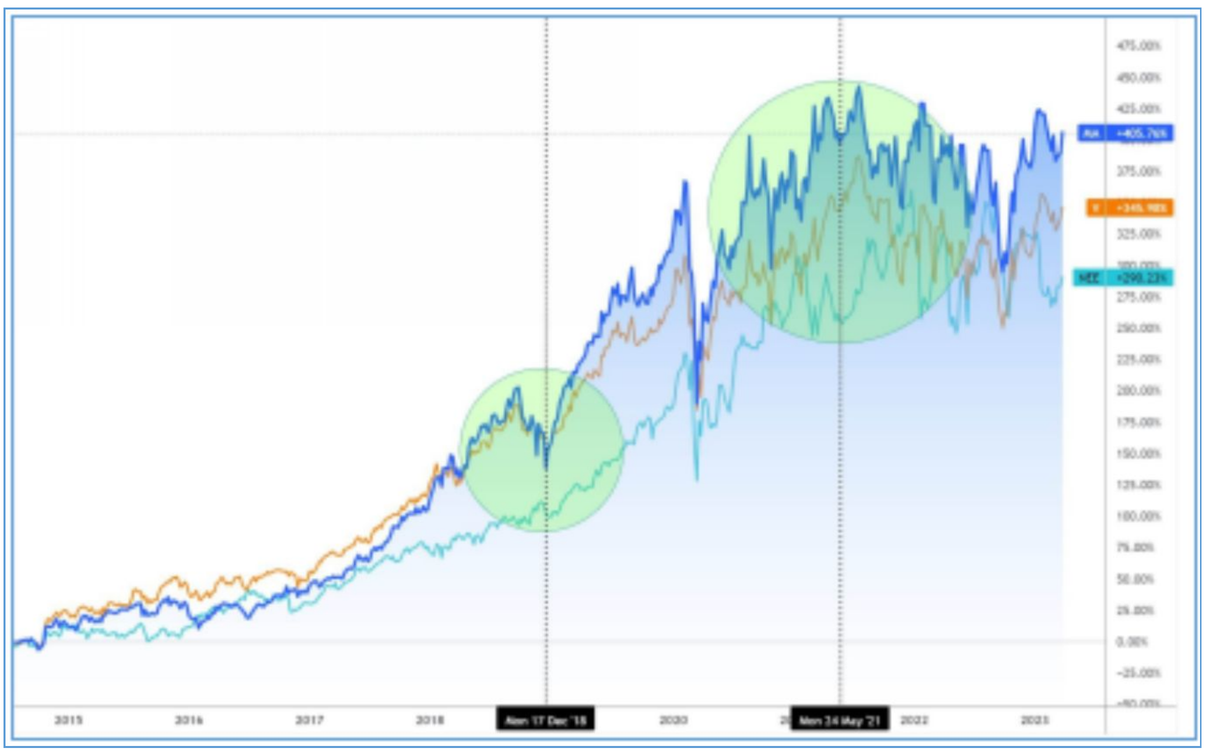


*Figure 85 – Chart with the comparison of the three stocks*

We can spot at least two instances illustrating the low correlation between MA and V compared to NEE. The perfect one was on December 17, 2018, when the financials dipped while NEE kept steady. The second example, less visible though, is on May 24, 2021, when NEE declined while financials were more stable.

**Is there a simpler way to diversify?**

Yes, of course! You can do that by simply buying the broad market indices like S&P500 or the associated ETFs like SPY. By doing that, you effectively "buy the market," as these kinds of indices include hundreds of companies, and you get exposure to all of them through one single transaction.

We will talk more about investing strategies in the next chapter.

## Diversification across asset classes

Generally, an investment portfolio includes a wide range of investments across several assets. For example, they may include cash equivalents, cash, stocks, bonds, commodities, ETFs, and closed-end funds. To illustrate an example, I will show you the big players.

Here is the relative performance between the stock market (represented by the S&P500 index) and the well-known Gold:

*Figure 86 – Comparison chart between S&P500 and Gold*

Look how well Gold performed during the 1978 recession and the 2008 crisis. On the other hand, when the market rebounded, the gold started to fall.

So, you might ask yourself how did 100% and 50%/50% portfolios perform?

Here is a simulation starting in 2005, beginning before the 2008 events:

| Portfolio | Initial Balance | Final Balance | CAGR | Stdev | Best Year | Worst Year | Max. Drawdown | Sharpe Ratio |
|---|---|---|---|---|---|---|---|---|
| 100% S&P | $10,000 | $50,142 | 9.42% | 15.26% | 32.31% | -36.81% | -50.80% | 0.59 |
| 100% Gold | $10,000 | $45,437 | 8.82% | 17.46% | 31.92% | -27.33% | -41.55% | 0.50 |
| 50% S&P / 50% Gold | $10,000 | $53,240 | 9.78% | 11.91% | 25.70% | -16.24% | -25.54% | 0.74 |

*Figure 87 – Performance of S&P500 and Gold diversified portfolio*

As you can see, the 50/50 portfolio has the best Return, by far the least Volatility, the lightest Worst Year, and the minor Drawdown. You can experiment further with different asset classes, as you got the idea now.

**Is diversification a free lunch in finance?**

Yes, many investors and specialists are considering diversification as being the only free lunch in investing. Statistically, it is possible to maximize the returns for a given volatility or to minimize volatility for a given return.

The subject can be studied in more detail and in statistical terms. Here we fall into the area of Modern Portfolio Theory, where we speak about Strategic Asset allocation, Efficient Frontier, and so on. More about that in the last chapter.

# Conclusion on Diversification

Diversification is a crucial financial concept and can be a powerful tool for managing risk and optimizing returns.

If you invested all your money in a single stock, your portfolio would be subject to the ups and downs of that particular company. But if you instead spread your investments across various stocks, bonds, and other assets, any losses in one area can be offset by gains in another. This means that your portfolio may experience less volatility overall, which can help to reduce the risk of significant losses.

Diversification can also help you to take advantage of different market conditions. For example, if you invest in both stocks and bonds, you may benefit from stock market growth while having some protection against market downturns through your bond investments.

# Key Take Aways

The primary purpose of diversification is to reduce your portfolio's risk exposure.

To diversify efficiently, consider investing across different sectors and asset classes.

When diversifying, you shall be prepared that the overall portfolio might perform worse than one of the individual assets; however, the overall volatility will be lower.

There are statistical approaches that help you choose the right diversification instruments. Correlation is a good metric showing how closely two assets are moving together.

Bear in mind that over-diversification can be harmful. By having more than 25 assets in your portfolio, you can hardly monitor and understand all of them.

ETFs are a great way to diversify your exposure by excluding a big deal of your efforts spent to find good stocks.

# 9

# Your First Strategy

## Plan your work; work your plan.

*"A vision without a strategy remains an illusion."*

**– Lee Bolman**

Author of "How Great Leaders Think: The Art of Reframing"

Investing is a means to put money away for the future and have that money work for you so that you can reap the full benefits of your labor in the future. Maybe you have $10,000 saved up and are ready to go into the investment world. Or perhaps you have an extra $50 weekly and want to start investing. Whichever applies to you, it is good that you reached this chapter and understand the possible paths.

Here, I will guide you through the steps of becoming an investor and teach you how to optimize your profits while reducing your risks.

Many beginner investors fall into the trap of ineffective day trading strategies or are simply hyperactive and cannot keep their hands away from the action of trading. Unfortunately, this rarely brings consistent gains, especially for inexperienced investors.

After reading this book, I hope you are not one of them any longer. Nevertheless, the strategies I will walk you through in this chapter will focus on passive techniques.

Passive investing methods attempt to avoid the fees and underperformance resulting from active trading. The goal of passive investing is to gradually accumulate wealth through a buy-and-hold strategy, unlike active traders. Passive investors do not seek to profit from short-term price fluctuations or market timing. Instead, passive investing assumes the market will produce normalized positive returns over time.

Passive investment involves fewer purchases and sales versus active investing, which can result in lower expenses. Passive Investing also requires lower maintenance, as the strategy relies on achieving long-term returns.

That can be very well combined with the well-known Dollar Cost Averaging or Lump Sum technique, which tells to add additional funds during a defined period, for example, monthly.

Making investments hands-off eradicates most of the other unconscious biases and uncertainties that arise in a stock-picking strategy. In 2021, of the 3,000 active funds that deployed an active strategy, only 47% outperformed their passive counterparts. Over the long term, the statistic is even worse, with nearly 85% of active Money Managers underperforming the S&P500.

# The Sleeping Investor Strategy

It is challenging for you as a beginner investor to do stock picks, especially if you cannot decipher the mystics behind the financial reports or do not have the patience.

Or even if after reading this book you, hopefully, can, it requires a lot of effort, and often the market behaves irrationally. This is why the first strategy I will present to you is Passive Index Investing.

Passive Index Investing is a passive investment strategy that seeks to replicate and optimize the returns of a benchmark index. Passive Funds only have transaction expenses of between 0.1-0.2%, which is much lower compared to Active Funds, where managers charge an expense ratio of as much as 2%.

A passive index investment strategy also poses a much lower risk to investors compared to an active investing strategy, as it relies on investing in a broad mix of assets compared to investing directly in individual stocks.

In August 2011, I got an extra $5,000 in cash after some part-time work. If I simply invested them in the S&P500 index, then they would have grown to about $20,000 today, even after the 2022 crash.

Most importantly, I would have had this performance without thinking and only by enterprising one single action – buy-and-hold.

A Piece of Cake. A tasty one.

Do you know what would have happened if I had contributed some money regularly? We talked about that in the Compounding Interest section on page 89. But, of course, not all decades are so successful, but in the case of recessions, active investors barely do better, either.

So far, so good, but I am not adding this section to bore you with the same index again. Instead, let's optimize this approach in two different ways.

## Sleeping more profound – low volatility optimization

Here is a potential passive investment portfolio that aims to reproduce the S&P500 returns but significantly reduce the volatility.

You need to grab a fancy smartphone, some shiny golden jewelry, 20+ years matured bonds, toothpaste, and shampoo, and don't forget to take your medicine. Cook all together; the longer, the better.

**Here is the recipe:**

| Ticker | Name | Allocation |
|---|---|---|
| QQQ | Invesco QQQ Trust | 30.00% |
| GOLD | Gold Price Index | 22.00% |
| XLP | Consumer Staples Select Sector SPDR ETF | 22.00% |
| TLT | iShares 20+ Year Treasury Bond ETF | 17.00% |
| XLV | Health Care Select Sector SPDR ETF | 9.00% |

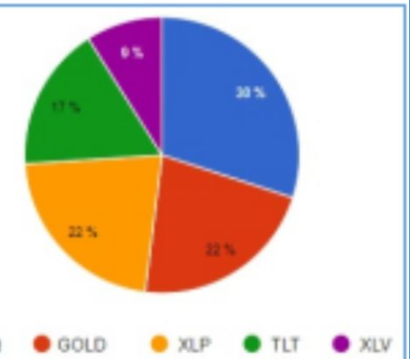



*Figure 88 – Low Volatility Optimized Portfolio Allocation*


*Figure 89 - Low Volatility Optimized Portfolio Growth*

| Portfolio | Initial Balance | Final Balance | CAGR | Stdev | Best Year | Worst Year | Max. Drawdown | Sharpe Ratio |
|---|---|---|---|---|---|---|---|---|
| S&P500 Portfolio | $10,000 | $66,824 | 9.63% | 15.00% | 32.31% | -36.81% | -50.80% | 0.61 |
| Low Volatility Optimization | $10,000 | $84,685 | 10.89% | 11.09% | 32.72% | -21.69% | -24.85% | 0.88 |

*Figure 90 - Low Volatility Optimized Portfolio Metrics*

The simulation started in 2002, after the "dotcom" bubble.

Will the recipe prove itself in the future? Nobody knows. The kitchen of investing is not the same as cooking.

## Sleeping faster – high return optimization

Are you emotionally prepared for some more fluctuations in favor of higher returns? Then, you can get significantly higher returns while keeping the same volatility as the S&P500 Index.

I've got a different recipe for you, and you need only two ingredients: Gold and Tech:

**High Performance Optimization**

| Ticker | Name | Allocation |
|---|---|---|
| QQQ | Invesco QQQ Trust | 77.00% |
| GOLD | Gold Price Index | 23.00% |

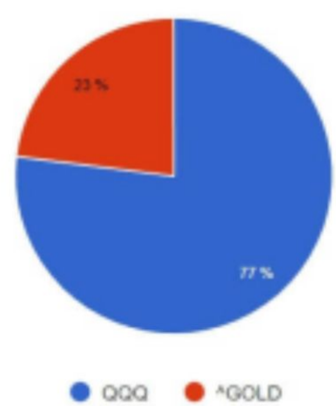



*Figure 91 – High-performance optimization. Gold and Tech*

This strategy suits you if you can emotionally afford volatility similar to the overall stock market. In this case, you will be rewarded with higher returns.


*Figure 92 – The three sleeping portfolios' performance*

**Performance Summary**

| Portfolio | Initial Balance | Final Balance | CAGR | Stdev | Best Year | Worst Year | Max. Drawdown | Sharpe Ratio |
|---|---|---|---|---|---|---|---|---|
| S&P500 Portfolio | $10,000 | $66,824 | 9.63% | 15.00% | 32.31% | -36.81% | -50.80% | 0.61 |
| Low Volatility Optimization | $10,000 | $84,829 | 10.90% | 9.60% | 26.45% | -15.30% | -20.20% | 1.00 |
| High Performance Optimization | $10,000 | $143,830 | 13.77% | 15.17% | 47.88% | -31.14% | -36.33% | 0.85 |

*Figure 93 – The three sleeping portfolio summaries*

What have you learned here?

You learned that you can optimize your portfolio to fit your sleeping habits best. You can either get satisfied with close-to-average market returns while minimizing the fluctuations, or you can prepare yourself for the market standard deviation and get rewarded with an extra return.

Would you prefer to drive a Ford Mustang or a Ford Fiesta? What you choose is entirely up to you.

# Steady Income Investing

Let's say you are unwilling to only watch the numbers and feel optimistic about some far-distant future when you will reap the rewards. I completely understand you. This is why I describe the possibility of getting smaller rewards along the way by setting up an Income Portfolio.

As you might have guessed, we are talking about a dividend portfolio.

Dividend stocks are among the most straightforward ways for investors to generate passive income. As companies generate profits, a part of the bottom line is diverted off and distributed to shareholders in the form of dividends.

Dividend yield varies significantly across industries and fluctuates based on a company's financial performance. In general, three key factors determine the total income an investor can receive from Dividends: Dividend Yield, Growth Rate, and Payout Ratio.

The Dividend Yield is the percentage of dividends received per share concerning the stock's current price. For instance, let's take the example of a Dividend Aristocrat to understand yield (a dividend aristocrat stock consistently raises dividends for 25 years).

Telecom stock AT&T (T) is currently trading at $19.79 per share, with an expected forward annual dividend of $1.11. This implies a dividend yield of 5.61%.

Dividend Growth is an essential factor that determines the expected future passive income. AT&T's dividends have grown by about 2% annually from 2009 to 2021. However, I picked this example to show that nothing is guaranteed, as AT&T cut its dividends by 22% in 2022.

The Dividend Payout Ratio is the proportion of dividends relative to a company's earnings. A company with a higher payout retains a limited amount of cash itself, implying that the business has matured. In the example of AT&T, the dividend payout stands at 41% as of April 2023, indicating that the company retains 59% of its current earnings.

So, if you buy 1000 shares of AT&T, spending $19,790, you will get an annual cash of $1,110.

However, the big catch is about re-investing the dividends. That means you use the received dividend to acquire more shares and receive more dividends in the future. You saw an example earlier in the book; let's see one more example.

Below is a picture of a $20,000 portfolio growth since 2010, which is 100% of AT&T stock.


*Figure 94 – AT&T stock without and with dividends re-invested*

The first graph is without re-investing the dividends. As you can see, the stock is drifting, and the total return over the decade is negative (you are still green considering the received cash).

The second chart shows the portfolio growth while all the dividends are re-invested. And this time, the portfolio value is sitting at about $36,000. Impressive how much difference for the same stock.

**Performance Summary**

| Portfolio | Initial Balance | Final Balance | CAGR | Stdev | Best Year | Worst Year | Max. Drawdown | Sharpe Ratio |
|---|---|---|---|---|---|---|---|---|
| AT&T Inc. No Div Reinvest | $20,000 | $17,382 +$8,699 cash | -1.07% | 18.35% | 45.57% | -22.05% | -53.08% | 0.32 |
| AT&T Inc. With Div Reinvest | $20,000 | $36,955 | 4.84% | 18.45% | 45.62% | -22.24% | -37.45% | 0.32 |

*Figure 95 – AT&T stock dividend impact summary*

I hope I have convinced you that dividends can significantly affect a portfolio.

Using these metrics, investors can identify a basket of securities that generate dividends that meet their passive income criteria.

There is so much more to say about dividend investing that I wrote a dedicated book called "Live Off Dividends," which I invite you to read.

# Spicing everything up

The above strategies are boring; I feel you.

I know this kind of passive investing tastes like food without spices. Where are the adrenaline, emotions, and palpitations?! Where has the Wolf from Wall Street gone?!

If you want to feel the action and be a hands-on investor, there is also a suitable approach for you. Let's call it the "**Core and Satellites Strategy**."

The Core might be one of the passive approaches described above. The High Return Optimization from page 160 would probably be most suitable for an active investor. Allocate the most significant portion of your portfolio to the Core, say 80%. Use the other 20% of your portfolio to buy stocks you love, and you are convinced they will overperform and bring you extra returns while satisfying your thrilling sentiments.

Please keep in mind not to overdo it. For example, if your satellites flew away and you lost some money, don't be tempted to sell a part of your Core portfolio to get new satellites, as you might lose everything by doing this. Instead, stay calm and wait until you can afford new "spicy" stocks.

# Strategic Asset Allocation and Modern Portfolio Theory

These are the secret keywords that lead to the tactics we used above.

Strategic asset allocation is an investing strategy that statistically determines what proportion of one's assets ought to be in different asset classes.

Strategic Asset Allocation is based on the Modern Portfolio Theory (MPT). MPT, constructed by Henry Markowitz in 1952, states that, if given a choice, investors would opt to reach their financial goals by opting for the least amount of risk.

Since its introduction, MPT has become a key strategy asset managers use with a buy-and-hold approach. Strategic asset allocation relies on an individual investor's tolerance for risk to the desired returns expected from their portfolio.

The above-studied portfolios are perfect examples of strategic asset allocation.

Based on the returns of an individual asset class, an investor dynamically adjusts their portfolio to limit the risk. This is called re-balancing of the portfolio, which is usually done annually.

You already learned that this works due to correlation. To truly diversify, you shall hold poorly correlated assets, meaning when one goes down, the other might go up and compensate for the loss.

The last thing I want to show you in this chapter is how I have discovered the above portfolios.

## Stepping on the Edge - The Efficient Frontier

I will not dig into the math of this method. The fundamental principle is that you can determine the best asset combinations suitable to your investing profile using the efficient frontier tool.

Here is how it works: You select a set of assets and a period. These assets are then individual points distributed on a Standard Deviation and

Expected Return chart. The Efficient Frontier is the line representing the maximum possible return for a given Standard Deviation, which can be achieved by combining the given assets. You can quickly build and evaluate Efficient Frontiers using PortfolioVisualizer[52].

Here is what it looks like:

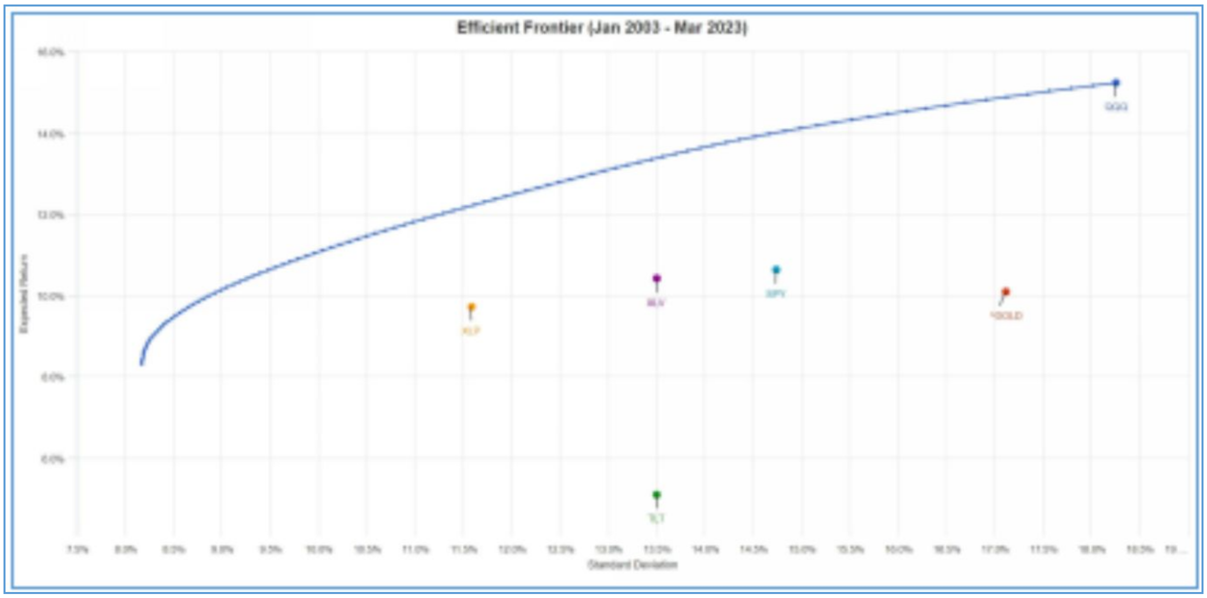



*Figure 96 – Efficient Frontier Example*

As you can see, I selected six distributed points: XLP, XLV, TLT, SPY, GOLD, and QQQ.

The line connecting many dots is the Efficient Frontier, i.e., the maximum possible return for a particular standard deviation achievable by combining the six given assets.

Now, you can walk along the frontier and see your winning combination.

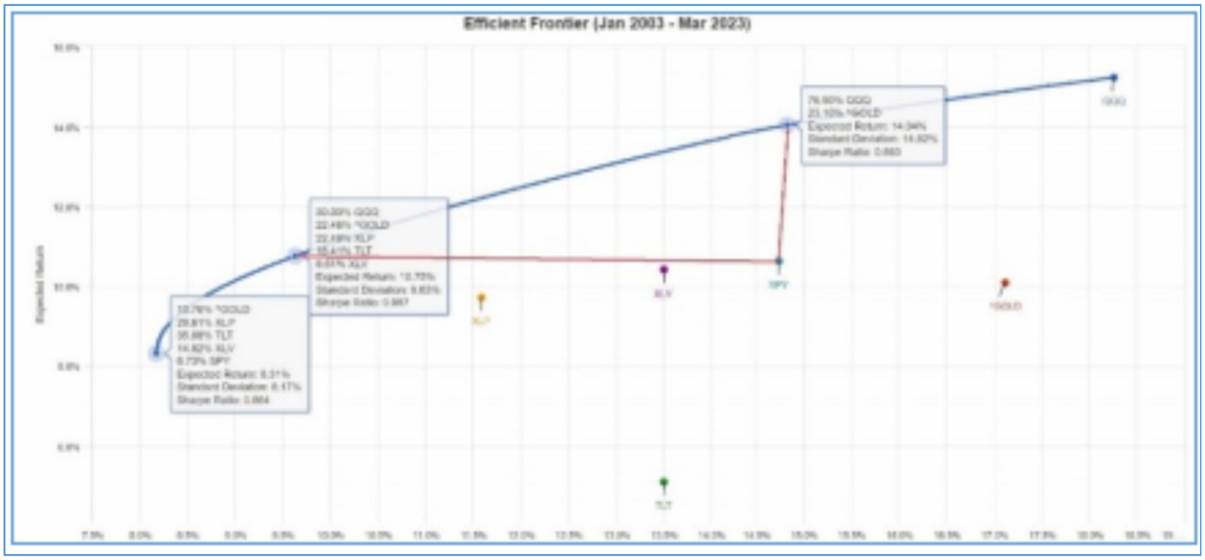



*Figure 97 – Three portfolio examples on the Efficient Frontier*

If you look carefully, you will notice the Minimum Volatility and the Maximizing Returns optimizations portfolios, as depicted by the additional lines above. You can further minimize your volatility by giving up on the return, as shown by the most left portfolio allocation.

Now you should have the basic skills to understand and manipulate the tool. You should experiment with and use it as often as possible, preferably each time you consider making an investment decision.

# Conclusion on Your First Strategy

You might like or not like the presented investing strategies. They are not perfect; neither claim they to be so. This was just the Tip of the Iceberg, and there are many more concepts that you will encounter once you get more advanced with portfolio construction.

My scope in this chapter was to give you some examples but also instruct you on the tools you need to handle to build your strategy. Whichever your future strategy will be, it is crucial that you stick to it. Of course, you will improve and optimize it on the way, but make sure you are not making emotional decisions and keep your gambling instincts under control.

# Key Take Aways

Passive investing strategies are a good option for hands-off investors as they require less time and less expense.

A passive portfolio can be optimized to reach target returns or target volatility by combining different assets in different proportions.

Dividend investing can be a great source of income but can also be further exploited by re-investing the dividends.

Core and Satellite strategy is an excellent approach to spice up your portfolio while not jeopardizing your wealth.

The Efficient Frontier method is excellent for finding the best portfolio setup for your needs.

# Final Word

Finance is a fascinating world, and there are so many bright minds working in this area that there is a real universe of strategies and insights. This essential guide will make you feel more confident in entering this realm.

You will make good decisions and bad decisions. You will have green days but also red days. So be prudent and always make informed decisions. Even if they prove themselves wrong, if they were based on rationales and not your impulsive emotions, your judgments would improve, and you would make more profitable decisions.

Investing can be fun, entertaining, and profitable. I hope you will be successful in managing and building your wealth and you will also enjoy the process!

Artenie Alexandru

Iasi, 2023

# What else do you need to know

# Bonus Chapter

In this extra chapter, I will briefly explain some important concepts that did not find their place elsewhere in the book.

# Contracts for Difference (CFDs)

CFDs (Contracts for Difference) are financial derivatives allowing traders to speculate on the price movements of various underlying assets, such as stocks, commodities, currencies, and indices, without **owning the underlying assets.**

When trading CFDs, the trader agrees to exchange the difference in the underlying asset's price between the contract's opening and closing. If the price goes up, the trader profits; if the price goes down, the trader incurs a loss.

CFDs are a popular way of trading because they allow traders to access a wide range of markets with a relatively small amount of capital and offer the opportunity to profit from rising and falling markets. However, trading CFDs also involves a high degree of risk, and traders should carefully consider their risk appetite and financial objectives before trading.

# Share Buybacks

Share buybacks, also known as stock buybacks or share repurchases, are when a company purchases its outstanding shares from existing shareholders. This is typically done on the open market but can also be done through a tender offer or other means.

Share buybacks can be used for a variety of reasons. One common reason is to return value to shareholders by increasing the value of the remaining shares. In addition, by reducing the number of outstanding shares, the earnings per share (EPS) increases, making the company's stock more attractive to investors.

Buybacks can signal to the market that a company believes its stock is undervalued and prevent the dilution of existing shareholders caused by the issuance of new shares for things like employee compensation or acquisitions.

However, some critics argue that share buybacks are often used to artificially inflate stock prices and benefit executives with stock-based compensation rather than benefiting long-term shareholders or investing in the company's growth.

# Dynamic Spread

When a security is traded, the buyer offers the bid price, the highest price they are willing to pay for the currency, while the seller offers the asking price, the lowest price at which they are willing to sell the currency. The difference between these two prices is the spread.

The spread can be fixed or variable depending on the broker and market conditions. In the case of a dynamic or variable spread, the difference between the bid and ask price can change depending on the market's volatility, the currency pair's liquidity, and other factors.

A dynamic spread can be detrimental for investors, especially in the case of automatic “Stop Loss” or “Buy Entry.” They can lead to triggering the stop losses although the nominal security price was before the stop loss level, or they can lead to higher than nominal purchase prices.

# Fear and Greed Index

The Fear and Greed Index is a tool used to measure market sentiment and investor psychology. It is a composite index that considers several factors that indicate whether investors feel optimistic or pessimistic about the market.

The Fear and Greed Index was created and is maintained by the financial news and data website CNNMoney. The index is based on seven indicators, including market volatility, momentum, and stocks trading in their 52-week range. Each indicator is weighed, and the index is calculated on a scale from 0 to 100.

A reading of 0 on the index indicates extreme fear in the market, while a reading of 100 indicates extreme greed. A reading in the middle of the range suggests a more neutral sentiment.

The Fear and Greed Index can be helpful to investors and traders as a way to gauge market sentiment and help inform their investment decisions.

*"Be fearful when others are greedy, and greedy when others are fearful."* – Warren Buffett


*Figure 98 – Fear and Greed Index. Source: CNN*[53]

# Initial Public Offering (IPO)

An IPO, or initial public offering, is when a private company raises capital by selling its shares to the public for the first time. When a company conducts an IPO, it essentially transitions from a privately-owned entity to a publicly-owned one, meaning that its shares can be bought and sold by investors on a public stock exchange.

The IPO process typically involves several steps, including selecting underwriters to help with the offering, preparing financial statements and prospectuses, and filing with regulatory agencies such as the Securities and Exchange Commission (SEC) in the United States. The company will then set an initial share price, and the underwriters will work to market the shares to potential investors.

Once the shares are sold to the public, the company will use the funds raised to finance its growth, pay off debt, or for other purposes. The public shareholders then have a stake in the company and can participate in any future profits or losses through dividends or capital gains/losses as the stock price fluctuates.

# Pre-market Trading

Pre-market trading refers to buying and selling securities before the stock market's official opening. This can occur through electronic trading platforms that allow investors to trade securities outside of regular market hours, typically before 9:30 am Eastern Time in the US.

Pre-market trading allows investors to react to news and events outside regular market hours, such as earnings releases or economic reports. It can provide an opportunity to buy or sell securities at prices that may differ from those seen during regular trading hours.

However, pre-market trading is typically characterized by lower liquidity and higher volatility than regular market hours, as there are fewer market participants, and the bid-ask spreads can be wider. This can make pre-market trading riskier and more difficult for inexperienced investors.

# Annex

These are the websites and the tools I use.

**Websites for wise investors:**

www.art-invest.net – Investing blog with high-quality content

www.seekingalpha.com – Leading platform with investing articles and stock data

www.cnbc.com – Highly rated for stock news and market analysis

www.investopedia.com – Simply a Wikipedia for investing

www.finviz.com – One of the best stock market screeners

www.statista.com – Best statistics for any topic

www.tradingeconomics.com – A pool of exclusive indices and their history

www.investing.com – Good for news and stock ratings

**Tools for smart investors:**

www.tradingview.com – Very versatile tool for technical analysis

www.portfoliovisualizer.com – Best in class for portfolio construction and back-testing

www.simplywall.st – A very intuitive, simple, and useful tool for fundamental stock analysis

# Claim Your Bonus

Congratulations for reaching so far!
Get your **7 Checkpoints to Pick a Great Dividend Stock!**

**https://www.art-invest.net/dividend-checklist**

**References:**

[1] https://www.investopedia.com/terms/i/inflation.asp
[2] https://tradingeconomics.com/united-states/inflation-cpi
[3] https://www.macrotrends.net/2526/sp-500-historical-annual-returns
[4] https://www.nerdwallet.com/article/investing/average-stock-market-return
[5] https://www.bankrate.com/banking/cds/historical-cd-interest-rates/
[6] https://www.forbes.com/advisor/investing/stock-and-bond-returns/
[7] https://fred.stlouisfed.org/series/ASPUS
[8] https://www.reit.com/what-reit/frequently-asked-questions-about-reits
[9] https://fundrise.com/how-it-works
[10] https://fundrise.com/real-estate-strategies
[11] https://www.realtymogul.com/how-it-works
[12] https://www.realtymogul.com/knowledge-center/track-record
[13] https://www.yieldstreet.com/how-it-works/
[14] https://www.yieldstreet.com/
[15] https://www.coingecko.com/en/global-charts
[16] https://www.tradingview.com/
[17] https://seekingalpha.com/
[18] https://seekingalpha.com/symbol/AMD/earnings
[19] https://simplywall.st/
[20] https://simplywall.st/stocks/us/real-estate/nyse-o/realty-income
[21] https://www.portfoliovisualizer.com/
[22] https://seekingalpha.com/symbol/SPHD/dividends/yield
[23] https://coinmarketcap.com/coins/
[24] https://www.bankrate.com/investing/popular-thematic-etfs-invest-in-hottest-trends/
[25] https://www.cnbc.com/2020/10/27/amd-to-buy-chip-peer-xilinx-for-35-billion-in-data-center-push.html

[26] https://www.cnbc.com/2023/02/01/facebook-parent-meta-earnings-q4-2022.html

[27] https://en.wikipedia.org/wiki/Pygmalion_effect

[28] https://www.cnbc.com/2020/01/10/these-5-analysts-won-the-decade-with-their-stock-picks.html

[29]https://www.macrotrends.net/2016/10-year-treasury-bond-rate-yield-chart

[30] https://www.bankrate.com/banking/cds/historical-cd-interest-rates/

[31]https://admiralmarkets.com/education/articles/shares/the-best-performing-stocks-in-history

[32] https://www.art-invest.net/compounding-calculator

[33]https://www.bloomberg.com/news/features/2021-04-08/how-bill-hwang-of-archegos-capital-lost-20-billion-in-two-days

[34] https://www.cnbc.com/2018/09/17/big-shorts-who-thrived-during-the-financial-crisis-have-faltered-since-2008.html

[35] https://seekingalpha.com/filing/7162769

[36] https://seekingalpha.com/symbol/AMT/valuation/metrics

[37]https://simplywall.st/stocks/us/real-estate/nyse-amt/american-tower/valuation

[38]https://www.theguardian.com/technology/2014/feb/04/microsoft-satya-nadella-new-ceo

[39] https://www.theguardian.com/business/2013/apr/23/ap-tweet-hack-wall-street-freefall

[40] https://patternswizard.com/marubozu-candlestick-pattern/

[41] https://patternswizard.com/hammer-candlestick-pattern/

[42] https://patternswizard.com/three-line-strike-candlestick-pattern/

[43] https://patternswizard.com/abandoned-baby-candlestick-pattern/

[44] https://amzn.to/40uja41

[45]https://www.cars.com/articles/electric-vehicles-with-the-longest-range-422227/

[46]https://cleantechnica.com/2023/03/03/best-selling-electric-cars-in-the-world-january-2023/

[47]https://www.counterpointresearch.com/global-electric-vehicle-market-share/

[48] https://www.asme.org/topics-resources/content/3d-printing-houses

[49] https://genesislbsimblog.wordpress.com/

[50] https://ourworldindata.org/renewable-energy

[51] https://finviz.com/groups.ashx

[52] https://www.portfoliovisualizer.com/efficient-frontier

[53] https://edition.cnn.com/markets/fear-and-greed