
Essentials to Start Managing
Your Own Investments

INVESTING

FOR

NON-FINANCE PEOPLE



TERO TOIVANEN

CONTENTS

Introduction	1
1. The Basics	3
Reasons to Invest.....	4
Compounding of Interest.....	6
Introduction to Asset Classes.....	9
2. Human Capital.....	11
Increasing the Value of Your Human Capital	12
Other Aspects of Human Capital	13
3. Cash.....	14
How to Select a Bank Account	16
Foreign Currencies	16
Cryptocurrencies	18
Conclusion	20
4. Equities	21
Equity Indices.....	25
<i>Geographical Indices</i>	26
<i>Sector Indices</i>	28
<i>Style Indices</i>	29
Investment Products	30
<i>Active Equity Funds</i>	30
<i>Passive Equity Funds</i>	35
<i>Direct Investments in Stocks</i>	40
Currency Aspects.....	42
Tax Aspects	43
<i>United States</i>	44
<i>Finland</i>	46

<i>Germany</i>	46
<i>United Kingdom</i>	47
<i>Switzerland</i>	48
Market Timing.....	50
How to Invest.....	53
<i>United States</i>	54
<i>Eurozone</i>	56
<i>United Kingdom</i>	58
<i>Switzerland</i>	60
Buying and Selling ETFs.....	61
Other Thoughts on Equities.....	62
Conclusion.....	63
5. Fixed-Income	65
Different Types of Fixed-Income Investments.....	70
Investment Products.....	72
<i>Active Fixed-Income Funds</i>	73
<i>Passive Fixed-Income Funds</i>	74
<i>Direct Investments in Fixed-Income</i>	77
Crowdlending.....	77
<i>Lending Club</i>	78
<i>Mintos</i>	81
<i>Assetz Capital</i>	83
Currency Aspects.....	84
Tax Aspects.....	86
<i>United States</i>	86
<i>Finland</i>	86
<i>Germany</i>	87
<i>United Kingdom</i>	87
<i>Switzerland</i>	87

Timing of Fixed-Income Investments	87
How to Invest	90
<i>United States</i>	90
<i>Eurozone</i>	93
<i>United Kingdom</i>	94
<i>Switzerland</i>	96
Further Thoughts on Fixed-Income Investments	97
Conclusion	98
6. Real Estate	100
Residential Real Estate	100
<i>Purchasing Your Own Home</i>	101
<i>Becoming a Landlord</i>	106
<i>Best Practices for Investing in Residential Real Estate</i>	109
Vacation Properties	119
<i>Vacation Apartment in Spain</i>	119
<i>Another Vacation Apartment in Spain</i>	124
<i>Additional Thoughts on Vacation Properties</i>	127
Real Estate Investment Trusts (REITs)	131
Real Estate Mutual Funds	133
Crowdfunding for Real Estate	134
Timing of Real Estate Investments	139
Conclusion	140
7. Commodities	141
Gold	143
Conclusion	146
8. Hedge Funds	148
Hedge Fund Categories	151
Example of a Hedge Fund	154
Hedge Fund Due Diligence	155

Fund of Hedge Funds	156
Hedge Fund ETFs	157
Conclusion	158
9. Private Equity	160
Private Equity Funds	163
Equity Crowdfunding.....	166
<i>SeedInvest</i>	168
<i>Companisto</i>	171
<i>AngelList</i>	173
Conclusion	174
10. Other Asset Classes.....	175
11. Asset Allocation.....	177
Factors That Affect Asset Allocation	178
<i>Risk Tolerance</i>	178
<i>Investment Time Horizon</i>	178
<i>Human Capital</i>	179
<i>Expected Returns of the Asset Classes</i>	180
<i>Expected Risks of the Asset Classes</i>	181
<i>Expected Correlations between Different Asset Classes</i>	181
<i>Liquidity Considerations</i>	182
<i>Time and Effort Considerations</i>	183
<i>Minimum Cash Requirement</i>	183
How to Make an Asset Allocation Plan	183
<i>Use an Advisor</i>	184
<i>Balanced Funds</i>	185
<i>Robo-Advisors</i>	191
<i>Do-It-Yourself with a Simple Approach</i>	194
<i>Do-It-Yourself with Asset Allocation Software</i>	197
Example Asset Allocation Plans.....	204

USD ETF Investor with Average Risk Tolerance.....	205
USD ETF Investor with Low Risk Tolerance.....	211
USD ETF Investor with High Risk Tolerance.....	214
EUR ETF Investor with Average Risk Tolerance.....	218
GBP ETF Investor with Average Risk Tolerance.....	223
CHF ETF Investor with Average Risk Tolerance.....	228
My Own Asset Allocation Plan.....	233
My Own Asset Allocation Plan with Human Capital.....	239
Rebalancing.....	244
12. Why People Fail at Investing	246
Failing to Start Investing.....	246
Having No Investment Plan.....	247
Being Unable to Commit to Long-Term Goals.....	247
Being Too Conservative.....	247
Taking on Too Much Risk.....	248
Being Too Impulsive.....	249
Being Too Confident.....	250
Paying Excessively High Fees.....	250
Failing to Do the Homework.....	251
<i>WinCapita</i>	252
<i>Zero-Fee Investment Products</i>	253
<i>Madoff Case</i>	253
Appendix.....	255
Recommended Product List.....	255
<i>Equity / USD</i>	255
<i>Equity / EUR</i>	259
<i>Equity / GBP</i>	263
<i>Equity / CHF</i>	266
<i>Fixed-Income / USD</i>	267

<i>Fixed-Income / EUR</i>	272
<i>Fixed-Income / GBP</i>	276
<i>Fixed-Income / CHF</i>	278
<i>Commodities / USD</i>	280
<i>Commodities / EUR</i>	281
<i>Commodities / GBP</i>	281
<i>Commodities / CHF</i>	282

Introduction

I have many friends who are experts in their professional lives in various industries unrelated to finance. In many cases, they lack the knowledge of how to successfully invest their hard-earned money. Because I work in the finance industry, they often ask me for guidance on what they should do. Therefore, I have decided to write this book to answer many of the questions that come up during our discussions.

The second target group for this book is the younger generations; my own kids included. In many parts of the world, basic investing principles are not part of the curriculum taught in high schools—or even most universities. It's no wonder investing seems so difficult for people when they haven't even been taught the basics.

In this book, I share the basic investing principles everyone should know. And I present them in a straightforward way so you are able to use them regardless of your background. In addition to the general principles, I also go into detail about *how* to invest—and *what* to invest in. The end result is that you should be able to start successfully investing right away, shortly after reading this book.

The good news is that, in some ways, the time to invest has never been better for individual investors. In the past, investing basically meant putting your money in products offered by your bank, paying high costs, and getting terrible after-cost returns. Nowadays, there are a number of products, services, and online platforms that don't involve the banks at all. This means you can invest in solid, professional investment products at low costs—resulting in increased investment returns.

In this book, I go through all the traditional investment categories, such as equities, fixed-income, and real estate. I also take a look at hedge funds and private equity, which have traditionally been the playground for institutional investors, but, in recent years, have become increasingly open to individual investors. To round out the discussion, I also take a look at some of the newer innovations in finance, such as crowdfunding, and offer my opinion on which platforms are good for investors.

Even though the products available to individual investors are better than ever, the current investment environment is difficult. At the time of this writing, interest rate levels around the world are close to an all-time low. This means that the expected

returns from investments are also low—not only for fixed-income investments, but for all other investments too. So, at the moment, a patient and conservative attitude is required from beginning investors.

The investment principles described in this book can be applied globally. However, depending on your home country, the exact implementation of the investments may vary. Throughout the book, I explain in detail how the investment principles can be implemented in the following five countries: the United States, Finland, Germany, the United Kingdom, and Switzerland.

Now some words about my own background. I've worked for more than 10 years in the finance industry, and I've spent the last seven serving as the Chief Investment Officer in a mid-sized asset management company in Switzerland. I co-implemented the investment platform we use to manage our equity portfolios, and I actively perform investment research in addition to acting as a fund manager. Together with my colleagues, I have tested countless investment approaches and strategies, implementing only those that actually work.

I have studied both Computer Science (MSc from the Helsinki University of Technology) and Finance (MBA from Purdue University, CFA). Earlier in my career, I spent seven years working for a major telecommunications company—first as a software engineer, and later in different management positions.

Equally worth mentioning, I have also been an individual investor for the past 20 years. I've probably made most of the beginner mistakes that everybody else makes when they start investing, and my emotional setup isn't any different from other human beings. Investing is easy on paper, but psychologically it's a difficult thing to do.

I use the principles and many of the investment products described in this book to manage my own investments. It is my hope that the investing concepts that I've provided will give you the necessary insights and tools you'll need to start managing your money with confidence.

1. The Basics

The basic definition of investing is to put money into something that is expected to produce income and/or increase in value in the future. For example, you might buy shares of Microsoft, which currently pays dividend income on a quarterly basis and may increase in value during the holding period. Or you could buy an apartment and rent it for monthly rental income and, again, hope that it will increase in value over time.

The rationale behind investing is that, when implemented the right way, the long-term returns you'd receive for your investments would significantly outweigh the returns you would get from keeping the money safely in your bank account. So, if Person A decides to save money in their bank account, and Person B decides to invest that same money in stocks and real estate, then in 30 years' time, we would expect Person B to have much more money saved than Person A.

Investing always includes an element of risk. On the one hand, all investment returns fluctuate in the short term, which means the value of investments sometimes goes up and sometimes goes down. On the other hand, an investment may occasionally lose its entire value. For example, this can happen if you own stock in a company that goes bankrupt. But risk is an unavoidable part of investing. You cannot get good returns for your investments without taking on some risk. However, you can limit and control that risk so it always stays at an acceptable level.

Reasons to Invest

The first question every person should ask themselves is *why should I save and invest money?* Although it is difficult to list a single reason that applies to everyone, there are some good reasons that apply to most of us. A few examples include:

- Saving and investing for retirement
- Financing the education of your children
- Achieving full or partial financial independence

In some countries, the pension system is so bad that there is no guarantee of getting state-paid retirement income that would cover even the bare minimum of living expenses. In other countries, the pension system may currently be good enough, and the pension benefits may even have increased with the rate of inflation. But the question would still be *is this sustainable into the foreseeable future?*

In many developed-market countries, the number of people moving into retirement is greater than the number of people currently entering the workforce. The reason for this is twofold: birth rates have lowered and people are tending to live longer than ever before. In many countries, the working population finances part of the current retirees' pensions. So, when there are more people eligible for pension benefits but fewer people to finance them, then the pension system comes under significant pressure.

Whether future pension benefits are too small or just uncertain, it makes sense to take some responsibility for your own financial security, and that means starting to save and invest well before you reach retirement age. You can never be sure whether the current pension system will be sustainable, but you can ensure that your own savings will contribute to a better quality of life as you enter into retirement.

Another common reason to save and invest money is to finance the education of your children. In many countries, a university education is not free and can cost a significant amount of money. This is the case, for example, in the United States and the United Kingdom. Even in countries that currently offer free education, the financing may not be sustainable, and there is pressure to introduce tuition fees. Saving and investing as early as possible is a good way to ensure that your children will have the opportunity to get a university education, regardless of what happens with the cost of education.

A third common reason to start saving and investing early is to achieve financial independence, either fully or partially. Full financial independence means that you

have saved so much that your savings generates enough income to finance your living expenses, whatever they are. This means that you don't need to work anymore, unless you want to. That's why it's called *independence*. You will be free to do whatever you want with your time.

In many cases, becoming fully financially independent is a very difficult goal to reach. However, you could reframe your goal to target partial independence, which could mean, for example, that you only need to work part-time or that you take long sabbaticals from work at regular intervals. Saving and investing is the way to accomplish this goal, whether your aim is to achieve full or partial financial independence.

Sometimes people have to work part-time when there just aren't enough full-time jobs available. For example, in the United States, the number of part-time jobs increased massively during and after the financial crisis of 2008. Also, in the dynamic global business world, we see that some industries are in decline while new ones are created. For example, an employee may notice that their company, or even their entire industry, is in decline, and there are fewer and fewer jobs available. It is especially tough for older people to find new full-time jobs, particularly if their skills have become redundant. Saving and investing as early as possible is a good way to create a buffer against any nasty surprises later in life.

All three of these examples I've shared are very good reasons to start investing, and they help you to understand and accept the long-term attitude that is crucial for becoming a successful investor.

In addition to these good reasons, there are also some bad reasons to start investing. The most common is the desire to make as much money as possible as quickly as possible. This is a recipe for disaster, and, in most cases, leads to a significant loss of investment.

There are also several reasons why people decide not to invest. For example, some people spend everything that they earn. Others decide to live above their means, taking on credit card or consumer debt, which is a very bad idea. If there are no savings, there is no money to invest. So, the first critical step is to stop spending more than is earned and to gradually start saving money.

Many people also avoid investing because they think they lack the required knowledge, or they don't want to devote time to it. It is this group of people that I would like to ask to finish this book and reconsider. Everybody can gain enough knowledge to start investing, and when implemented the right way, the time and effort required is insignificant.

Compounding of Interest

Let's take a look at one simple example of compounding. You make an investment that returns, on average, 5% over the long term with an initial investment of 10,000 dollars. In the first year, the profit is $5\% * 10,000 = 500$ dollars. In the second year, not only does the initial investment of 10,000 dollars earn a 5% return, but the first year's profit of 500 dollars will also earn a 5% return. So, the profit after two years is $500 + 5\% * 10,500 = 1,025$. The total investment value is now 11,025 dollars. In the third year, the profit from years 1 and 2 will also earn 5%, and so on. This effect is called the *compounding of interest*. While the concept is relatively simple, it is remarkable how much the initial investment can grow over a long period of time.

In the following table, I've created an example where we've invested 100 dollars for different time periods and varying annual returns. In the rows, we have the investment horizon ranging from 1 to 50 years, and in the columns, we have the average return earned for the investment per year. The interest is compounded, so all the proceeds from each year are reinvested in the next year. The table shows the value of the total investment at the end of the investment period.

Years	0%	2%	5%	6%	10%	15%
1	\$100	\$102	\$105	\$106	\$110	\$115
5	\$100	\$110	\$128	\$134	\$161	\$201
10	\$100	\$122	\$163	\$179	\$259	\$405
20	\$100	\$149	\$265	\$321	\$673	\$1,637
30	\$100	\$181	\$432	\$574	\$1,745	\$6,621
50	\$100	\$269	\$1,147	\$1,842	\$11,739	\$108,366

From the compounding table, you can see that the longer you keep the money invested, the better. In other words, the earlier you start investing, the more time you have for the compounding to work for your benefit. In many cases, it isn't possible to start seriously investing before you've reached a certain level in your

professional life, but this table should help you get the point. It is better to start saving and investing when you're 40 rather than waiting until you're 50.

You can also see that the higher the return, the higher the compounding effect. Just look at the difference between the 10% return and the 15% return after 50 years. Likewise, if there is no return, as shown in the 0% column, then there is no growth in the investment. Even a 1% increase in investment returns makes a huge impact in the long run. If you have a return of 6% instead of 5%, the value of your investment after 50 years would be 60% higher.

Now let's take a look at another example. In the following table, let's see what happens if the profits earned each year are *not* reinvested but instead taken out of the investment and used for an annual vacation trip. In this case, the interest does *not* compound. The following table shows how much money there is in total at the end of the investment period:

Years	0%	2%	5%	6%	10%	15%
1	\$100	\$102	\$105	\$106	\$110	\$115
5	\$100	\$110	\$125	\$130	\$150	\$175
10	\$100	\$120	\$150	\$160	\$200	\$250
20	\$100	\$140	\$200	\$220	\$300	\$400
30	\$100	\$160	\$250	\$280	\$400	\$550
50	\$100	\$200	\$350	\$400	\$600	\$850

You can see that when the compounding effect is removed, the final cash balance is very modest compared to the first table. In order to generate a significant amount of savings in the long term, you need to reinvest the profits year after year.

One more example is needed to make this more realistic in real life. Based on the very long-term history, the value of money tends to decrease over time. This effect is called *inflation*. This means that if you have 100 dollars today that will buy a

certain amount of goods, then in 50 years, those 100 dollars will buy far less. In other words, the purchasing power of the money decreases.

To understand this better, let's take a look at the very long-term inflation rate in the United States. The Consumer Price Index is published by the Bureau of Labor Statistics on a monthly basis, with records going back to January 1913. It measures how consumer prices have changed over time. Below, the logarithmic chart shows the Consumer Price Index starting in January 1913 and running through November 2017. I have indexed it to start at 1.0 in 1913.

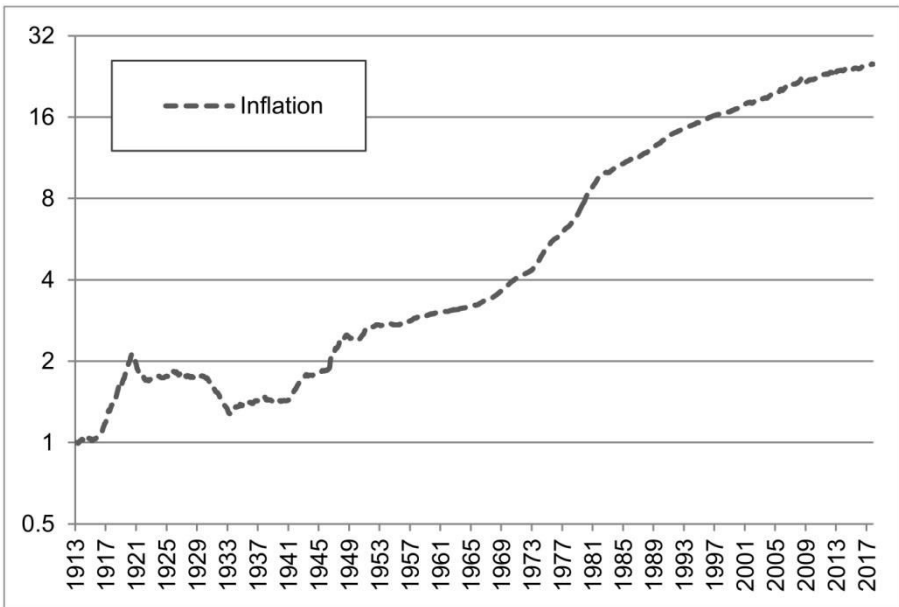


Figure 1. US Consumer Price Index between January 1913 and November 2017

As you can see, the Consumer Price Index has increased from 1.0 to 25.1 in the span of 105 years. This corresponds to a 3.1% annual increase in consumer prices. Is the inflation always positive? No, it is not. For example, between May 1920 and April 1933, the Consumer Price Index decreased from 2.1 to 1.3, indicating an average -3.7% per annum depreciation in consumer prices. This was during a severe worldwide depression known as The Great Depression. Both before the Great Depression and during the 70s, the rate of inflation was much higher than average. In the 70s, the Consumer Price Index increased from 3.8 to 7.8, corresponding to 7.4% annual growth. This period was called The Great Inflation. Since then, inflation has been relatively stable without big shocks, growing at an average of 3.1% per annum.

Although we will likely see periods of slow and fast inflation in the future, let's assume that the average inflation is 3% per annum. This means that in each year, 100 dollars will buy 3% less goods than the previous year. What happens if the return table is adjusted for the inflation rate of 3% per annum?

Years	0%	2%	5%	6%	10%	15%
1	\$97	\$99	\$102	\$103	\$107	\$112
5	\$86	\$95	\$110	\$116	\$140	\$176
10	\$74	\$90	\$122	\$134	\$197	\$311
20	\$54	\$82	\$149	\$181	\$387	\$965
30	\$40	\$74	\$181	\$243	\$761	\$2,996
50	\$22	\$61	\$269	\$438	\$2,946	\$28,900

You can see that if you do not invest the money at all but keep it at home as banknotes hidden in a closet, after 50 years, a 100 dollar bill is only worth 22 dollars in purchasing power. If you can buy five Argentinian steaks with your cash today, you will only get one steak in 50 years.

This is why saving but not investing doesn't really work. Inflation will just eat the value of your savings in time. The minimum level of acceptable returns should be to at least match the long-term inflation rate (about 3%); otherwise, the value of your savings will decrease in purchasing power. If you can beat the inflation rate with your investment returns, then you will increase the amount of savings measured in purchasing power.

Introduction to Asset Classes

By now, you should understand why investing in general makes sense. At this point, you may be asking, "But what should I invest in, and how to do it?" This is where things start to get complex, so let me take you through it.

There are literally tens of thousands of investment possibilities to select from. All of these investments have some kind of return and risk expectation. Before you invest in anything, you need to have a general idea of the expected return and the risks involved with the specific investment. In addition, you should have an idea of how the specific investment fits into your total investment portfolio and whether it complements your other investments.

Similar types of investments are grouped together as *asset classes*. The returns and risks inside of an asset class are expected to be comparable. Depending on how granular we make it, there can be anywhere from three to ten different asset classes. Inside of each asset class, there are multiple ways to make the actual investment.

In this book, I define seven financial asset classes that should be considered by any investor: cash, equities, fixed-income, real estate, commodities, hedge funds, and private equity. I will devote a chapter to each of these asset classes, study the returns and risks involved with them, and then go deep into detail on the exact products that investors should consider.

However, before we delve into the financial asset classes, I'd like to take a moment to describe a non-financial asset class that is very important for the investor but is often neglected in the literature: *human capital*.