TIPS FROM THE MASTER

THREE TYPES OF INVESTORS

Content adapted from Edward O. Thorp's direct quotes from the following sources:

Leslie P. Norton and Dan Lam. The Stockpicker's Burden, and Other Lessons. *Barron's*. March 19, 2018.

Edward O. Thorp. A Man for All Markets: From Las Vegas to Wall Street, How I Beat the Dealer and the Market. Random House, 2017.

Tren Griffin. A Dozen Lessons on Investing from Ed Thorp [Blog Post]. 25iq My Views on the Market, Tech, and Everything Else, July, 2017.

Scott Patterson. Old Pros Size Up the Game; Thorp and Pimco's Gross Open Up on Dangers Of Over-Betting, How to Play the Bond Market. *Wall Street Journal, Eastern edition*; March, 2008.

PASSIVE INVESTORS

PEOPLE WHO WANT TO DO WELL AND NOT SPEND A LOT OF TIME.

- If you're a long-term investor, equities are the way to go. Invest in a broad, no-load, US stock index fund with a very low expense ratio, such as the Vanguard S&P 500 or the Vanguard Total US Stock Index.
- They do better than maybe 90% of all other investors who are busy paying fees to advisers.
- They will beat most of the others who will be dragged down by fees and costs and punished by what I call "the scared-rabbit syndrome," which is that they run out at the bottom and get back in at the top.

EXPERIMENTAL INVESTORS

PEOPLE WHO JUST ENJOY MESSING AROUND IN THE MARKET AND ARE WILLING TO SPEND TIME TO GET AN EDUCATION.

- I say, take a small amount of capital and learn. Put most of it in an index fund where it will grow while you are busy getting your education and paying for it.
- If they want to learn more, they should go out and have their go at trying to make some money, but they shouldn't use the bulk of their resources to do this.
- If they find something that really works then they can start putting more money into it. They'll find that most of the time they haven't really found anything that really works.

PROFESSIONAL INVESTORS

MOST PEOPLE WHO WANT TO BE PROFESSIONAL INVESTORS DON'T ACTUALLY GET AN EDGE.

- Those people get a start somehow in the market just like I got a start with an option's formula, so I have an edge.
- I build an organization, which is small, and it gradually grows. It gets more and more skills.
- You, basically, get over the hurdle and get yourself established. If you can do that as a professional then you're kind of on your way to collecting what people call Alpha, excess return.

MISTAKES MADE & LESSONS LEARNED

Adapted from: Edward O. Thorp. A Man for All Markets: From Las Vegas to Wall Street, How I Beat the Dealer and the Market. Random House Publishing Group. 2017. Chapter 11.

MISTAKE 1

I bought one hundred shares at \$40 and watched the stock decline over the next two years to \$20 a share, losing half of my investment. I had no idea when to sell.

LESSONS

- Most stock-picking stories, advice, and recommendations are completely worthless.
- Avoid Anchoring: The error was in the way I thought about the problem
 of when to sell, choosing an irrelevant criterion the price I paid rather than focusing on economic fundamentals like whether cash or
 alternative investments would serve better. Behavioral finance theorists
 call this anchoring a subtle and pervasive aberration in investment
 thinking.

MISTAKE 2

Two "expert" longtime insurance investors claimed to have become rich investing in life insurance companies. According to their figures, the A. M. Best AAA index, which refers to the health of an insurance company, of the average price of such companies had gone up in each of the last twenty-four years, and they had plausible arguments that this would continue. Sure enough, the amazing winning streak they had identified ended just after my purchase, and we all lost money.

ESSON:

 Do not assume that what investors call momentum, a long streak of either rising or falling prices, will continue unless you can make a sound case that it will.

MISTAKE 3

In the early 1960s the demand for silver was exceeding supply, and I expected prices to spurt sharply. Believing the economic supply and demand analysis was correct, I opened a Swiss bank account to buy silver, with the encouragement of local promoters who got a commission for making the arrangements. I borrowed to buy 3x as much silver as I could have with cash alone. Silver rose as predicted and the promoters recommended using the profits together with more bank loans to buy yet more silver.

Then the price of silver dropped. As people sold silver to capture their profit, the price dropped rapidly, just enough to wipe me out for a few thousand dollars.

LESSONS:

- Though I was right in my economic analysis, I hadn't properly evaluated the risk of too much leverage, i.e. borrowing money.
- When the interests of the salesmen and promoters differ from those of the client, the client had better look out for himself.

PERSONAL FINANCE POINTERS

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THINK OF THE TRADEOFFS AMONG HEALTH, WEALTH, AND TIME.

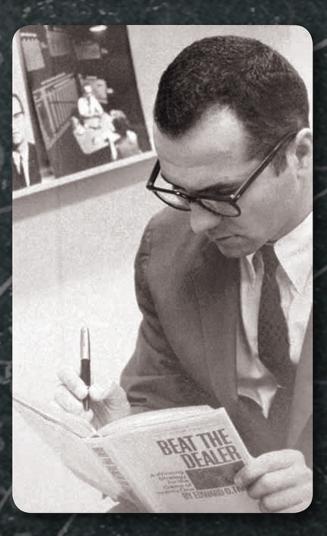
- You can trade time and health to accumulate more wealth.
- You can invest time and money on health.
- You can trade money for time by working less and buying goods and services that save time.

TO GET AN IDEA OF WHAT YOUR TIME IS WORTH, TAKE A MOMENT NOW TO THINK ABOUT HOW MUCH YOU WORK AND THE INCOME YOU GET FROM YOUR EFFORT.

 Once you know your hourly rate you can identify situations where buying back some of your time is a bargain and other situations where you want to be selling more of your time.

THE LESSON OF LEVERAGE, I.E. BORROWING MONEY, IS THIS:

 Assume that the worst imaginable outcome will occur and ask whether you can tolerate it. If the answer is no, then reduce your borrowing.



COMPARING GAMBLING TO INVESTING

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CHANCE CAN BE THOUGHT OF AS THE CARDS YOU ARE DEALT IN LIFE. CHOICE IS HOW YOU PLAY THEM.

WHEN THERE IS MONEY AND NOT FULL ACCOUNTABILITY, WHETHER IT IS IN CASINOS OR ON WALL STREET, THERE'S GOING TO BE STEALING AND CHEATING.

- At blackjack, it can be marked cards, second-dealing, or a stacked deck.
- On Wall Street, it can be Ponzi schemes and other frauds, such as insider trading, fake news, or stock price manipulation.
- Mathematically, the biggest difference is that the odds can be figured exactly or approximately for most gambling games, whereas the numbers are usually far less certain in the securities markets.
- How are casinos similar to the stock market?

IMAGINE YOU ARE INVESTING IN AN INDEX FUND. THE CASINO IS MR. MARKET, WHO OFFERS YOU A COLLECTION OF BETS. IF YOU CHOOSE AN INDEX FUND, SAY VTSAX [THE VANGUARD TOTAL STOCK MARKET INDEX FUND], ON A TYPICAL DAY IT RANDOMLY FLUCTUATES BY 1%.

BUT THERE IS A LONG-TERM DRIFT IN YOUR FAVOR OF ABOUT ONE TWENTIETH OF A [PERCENTAGE POINT]. SO IF YOU HAD \$1 MILLION IN YOUR PORTFOLIO IN SUCH AN INDEX, MR. MARKET WILL COME TO YOU EACH DAY AND SAY, LET'S FLIP A COIN. IF IT'S 50/50, THEN YOU'LL WIN \$10,000 OR LOSE \$10,000. BUT I'LL PAY YOU \$500 IF YOU PLAY THAT DAY.

- If you play for one day, you'll be losing \$9,500 or winning \$10,500.
- If you play for a year, the chances are moderately good that you'll be ahead because those \$500 payments add up and overcome the fluctuation. Maybe a third of the years, you'll be down and unhappy.
- If you play for 10 years or 20 years, then those \$500 payments just keep adding up.

SO A SIMILAR PROCESS HAPPENS AT BLACKJACK TABLES. IF YOU'RE COUNTING CARDS, YOU HAVE A LITTLE DRIFT IN YOUR FAVOR. BUT IN BLACKJACK YOU PLAY 100 HANDS AN HOUR, AND IN A WEEK YOU MAY PLAY 4,000 HANDS. IN A CASINO, YOU GET TO THE LONG RUN FAIRLY QUICKLY.

- What can your blackjack strategy tell us about how to manage risk in today's markets?
- Don't over bet. Suppose you have a 5% edge over your opponent when tossing a coin. The optimal thing to do, if you want to get rich, is to bet 5% of your wealth on each toss but never more. If you bet much more you can be ruined, even if you have a favorable situation.