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FOCUS
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Do You Have a Sporting Chance at Beating the Market? Don't Bet On It!

If you read much at all about how the stock market works, odds are in your favor that you'll quickly run into similes borrowed from the sporting and gaming industries to help describe the market's inner workings.

As deeply passionate as some of us can be about our favorite team, player or game of chance, deep down, most of us will grudgingly admit that, "It's just a game." (Unless you're a professional athlete whose livelihood depends on your success.) Not so with the market, where life savings are won or lost based on the "team" you support.

Yet it makes sense that so many parallels remain among the worlds of investing, sports and entertainment. Throughout history, we have used games as safer ways to explore the nature of our behavior — how to become and remain excellent, how to win with aplomb and lose with grace.

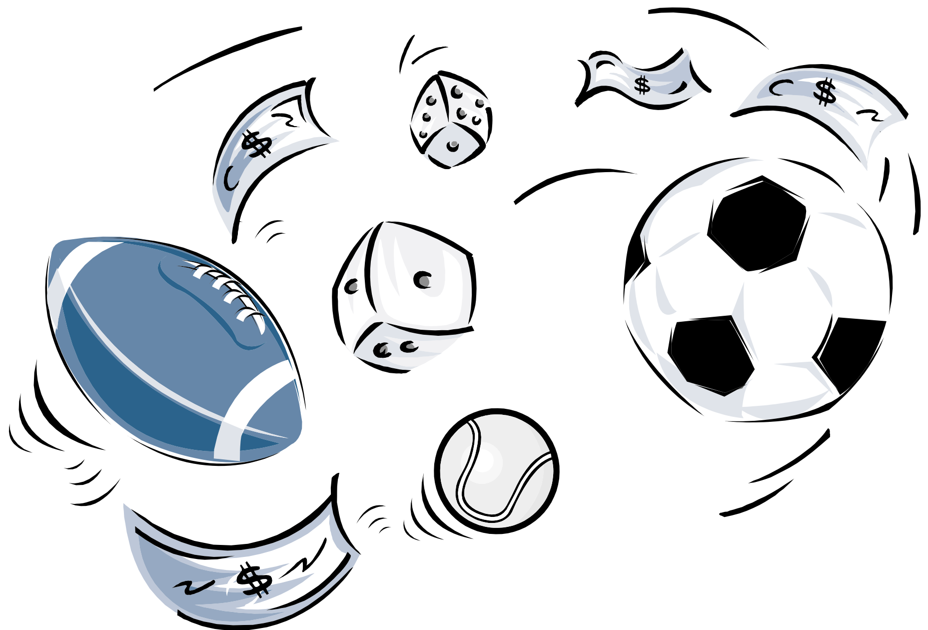
Anyone who has seen or read *A Beautiful Mind* knows that game theory is not only taken seriously by the academic community, but in some respects forms the underpinnings of modern economic theory. Taken a degree further, field scientists teach us that even most animal species play competitive games among friendly opponents as a way to hone the skills they need for the serious business of survival of the fittest.

We humans are no exception to the laws of nature. From English economist John Maynard Keynes' 1936 description of the market as a vast game of musical chairs, to the examples we have compiled in this edition of *The Educated Investor,* we feel we can learn much by examining the way we investors work, the way we play, and some of the interesting similarities between the two.

Take just a single lesson from these entertaining tales and it is this: While our innate love to persevere and succeed where others have failed has led to many of our collective successes, so too has our intellectual capacity to recognize when odds are so vastly against us that the prudent course is to reject the bet. Similarly, given the enormous odds against an individual successfully timing the market or selecting a portfolio of winning stocks (particularly after expenses), the prudent course to market survival is to:

- Build a diversified portfolio across all appropriate asset classes.
- Tailor it to your individual risk profile.
- Maintain the discipline to rebalance regularly to remain true to your investment objectives.

Returning to Keynes (as quoted in Peter Bernstein's excellent book, *Against the Gods),* this witty economist also observed, "When the capital development of a country becomes the by-product of the activities of a casino, the job is likely to be ill-done."



Win Some, Lose A Lot

Properly done, investing is a **positive sum game,** in which there can be winners without equivalent losers. Simply by investing in the market, you can expect to be rewarded with a premium for accepting the risk of equity investing. However, try to *outperform* the market, and you are gambling in a **zero-sum game**. For you to win, other players must equally lose.

Comparing the two approaches, Economics Professor and Investment Advisor Ron Ross, PhD, describes some interesting analogies between sports wagering and investing in his book, *The Unbeatable Market*.

In many sport games, it is so easy to guess who is likely to win that even a casual fan might guess right 60 percent of the time. Sports experts can do even better. As with selecting winning stocks, a fan does not have to bet on every game (nor an investor purchase every stock), but can instead bet only on games that are easy to call (or on stocks that seem sure to win), thus increasing their correct forecasts even further.

Yet, as Ross observes in his book, we don't know anyone who has made a successful career out of sports gambling. Why does consistent winning remain elusive? Because it's not just which team or player wins, but by what "point spread."

Whether sports wagering or playing a zero-sum game in the stock market, it is important to have a way to assess your investment's value via an unbiased estimator, on average neither too high nor too low. In sports, the point spread turns out to be an unbiased estimate of the outcome. While it is not expected to always be correct, its errors are randomly distributed with a zero mean. To beat the spread, you must either know something that few else know — like a key player is injured and the announcement not yet made — or you must be better (or luckier) at interpreting public information.

Similarly, to outperform the stock market, it is not enough to identify a great stock. The stock also must be mispriced by the market, which serves as the unbiased estimator. This is a tough challenge to overcome. As with sports betting, there also are costs to play, including but not limited to commissions, bid-offer spreads and market impact costs. If you have information unavailable to the public, it's highly likely to be insider information, upon which it is illegal to trade. Equity and bond markets are so efficient at processing information that it is difficult to gain a fair advantage that would enable you to beat them, without incurring costs that are likely to be higher than the potential profits to be had.

In summary, even if it is possible to identify a great team or stock, the odds we have to overcome and the high price we have to pay to place our bets result in an even risk-and-reward playing field. While it is possible to periodically win within a relatively efficient market, the only long-term winners are likely to be those taking your trade orders. Returning to the beginning of our tale, investors can choose the positive sum game of seeking to capture market returns through proper diversification, disciplined rebalancing and cost control, or they can choose the zero-sum game where they might win some but they are expected to more often lose.

What's a "Point Spread"?

In 2001, the St. Louis Rams were one of the best teams in the NFL. If they were playing a weaker opponent, there might be a 20-point spread to bet on them. For your bet to pay off, the Rams would not only have to win, but would have to do so by more than 20 points.

While the bookies set the initial point spread, it is really the market that determines its direction. For example, on Monday morning the spread might be set at 15 points. If this brings in more betting on the Rams than on their opponent, the spread would widen until supply and demand equalize. The bookies don't want to gamble their own money, so they set prices to stabilize, and they collect their commissions whether the bettors win or lose.

Stock prices are set similarly. For example, an investor might have to pay $30 for each dollar of earnings (or perhaps 10 times book value) for a glamour growth stock, while having to pay just $7 for each dollar of earnings (or perhaps just 90 percent of book value) for a distressed value company. And fund managers and stockbrokers get paid, regardless of whether you, "the player," win or lose.

Games Belong on the Golf Course

It's your lucky day, and you've won a golf game with Tiger Woods! On one of the holes you both hit poor shots, with the balls landing next to each other under a large tree. There is a small opening between the branches through which a great shot might head right for the hole. There also is a safer, less spectacular shot that would enable you to chip out and be in the clear. Tiger decides to go for the great shot ... and misses. What's your next move?

Of course the prudent approach would be to play it safe. One of the greatest golfers in the world missed the difficult shot, so your odds are pretty low. But even if you miss, so what? If you succeed where Tiger failed, what a great story you will have to tell.

What does a fantasy golf game have to do with investing? Periodically, the consulting firm Piscataqua Research, Inc. studies the performance of major US corporate pension plans. Most recently, they analyzed 179 plans for the 14-year period 1987-2000.[1] The plans controlled enormous sums of money and could afford to hire the "Tiger Woods" superstars of the investment industry. They had access to stellar portfolio managers, each one clamoring to manage the plans' billions of dollars, and each with successful track records. The pension plans also could hire professional advisors such as Frank Russell, SEI, and Goldman Sachs to help them select the best of the best.

Yet, even with all that management expense and expertise, out of 179 pension plans attempting to outperform the market in Piscataqua's survey, only 19 of them succeeded. While each pension plan obviously believed it could outperform — otherwise it would not have tried — nearly 90 percent failed in the attempt.

Why do individual investors attempt to stretch for above-market returns that even well-paid professionals have been unable to consistently achieve? Daniel Kahneman, Professor of Psychology and Public Affairs at Princeton University, comments:[2]

> … People are playing a game which, in some sense, cannot be played. There are so many people out there in the market; the idea that any single individual without extra information or extra market power can beat the market is extraordinarily unlikely. Yet the market is full of people who think they can do it and full of other people who believe them.

Perhaps most people are simply unaware of the evidence, such as the Piscataqua study. Or perhaps, just as making a shot that Tiger Woods missed provides a great story, so does being able to beat significant odds and outperform the market from time to time. The problem is that, just as it would be pure luck for an amateur golfer to make a shot missed by Tiger, it would also probably be lucky, not skillful, to predict which few fund managers will outperform. Before attempting the effort ask yourself these questions:

- Do I have a different approach, so I can succeed where others have failed?
- Can I apply more resources to my attempts than the pension plans did?
- Will I have screening processes or access to information that they did not?
- Am I simply smarter than the others?
- Do I have a method for consistently selecting winners or is it more likely that my winners will be lucky picks?

An alternative approach is to build a portfolio of passive investment vehicles that enable proper diversification among appropriate asset classes. This is precisely what the pension plans for major corporations such as Exxon, Intel, and Philip Morris did when they fired their active managers.

In short, unless the entertainment value of going for the proverbial long shot is of more value than whether you actually construct a winning portfolio, the prudent approach remains implementing passive asset class management for your investments, and keeping the long shots on the golf course, where they belong.

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[1] Piscataqua Research Inc. and Dimensional Fund Advisors, Inc.

[2] **Hard Wired.** *Dow Jones Asset Management,* November/December 1998.

Worth Repeating

Worth Repeating

> "Even if a broker could time the market and pick stocks better than you, research has shown that market timing and stock picking have little effect on your portfolio's overall value. If your broker could actually reliably beat the market, he or she would be as likely to be working as an 'account executive' at a brokerage firm's local branch office as Michael Jordan would be playing pickup basketball at the court in the schoolyard."
>
> — Daniel R. Solin
> *Does Your Broker Owe You Money?*

Gambling Away Your Investments

Casinos benefit greatly from two typical human behaviors that encourage the gambler in us to linger at the table — one if we are on a lucky streak and the other if we are losing.

If we are playing strictly for entertainment and we know when to call it quits, these two behaviors can enhance the experience of giving away our money in exchange for a good time at a casino. On the other hand, if an investor is bringing these same traits to the investment table, he or she should think twice.

Gamblers who are **winning** tend to perform a mental accounting that enables them to keep playing after they have won. They treat their growing wealth as if it were house money, not their own until they have cashed in and left the table. Thus they are less concerned about losing these funds than they would be if they had earned the same amount in a professional capacity.

Gamblers who are **losing** also tend to continue playing, hoping they will recover. We know that the odds are in the house's favor, but logic doesn't always win out over our desire to turn defeat into victory.

Investors are subject to the same behavioral traits that can lead to the same mistakes.

For example, a "winning" investor who buys Cisco at $20 per share and watches it go to $80 without selling is susceptible to "house money" mental accounting, thinking that there is little risk in continuing to hold the stock. We reason that, after all, we only paid $20 for it. The mistake is viewing the unrealized $60 profit as house money rather than our own earnings.

Similarly, "losing" investors who pay $80 per share for Cisco and watch it drop to $20 might reason that they cannot sell until the stock returns to its break-even point. Behavioral finance specialists call this particular mistake "loss regret avoidance." We tend to avoid the pain of admitting an investment error by reasoning that, as long as we have not yet sold, there is no actual loss.

How do you decide when to "hold 'em or fold 'em"? By far, the dominant factor should be the present risks of the current holdings versus the desired risk that you have defined for your portfolio within a carefully designed investment policy. Also, while not the dominant factors, you should also weigh the impact of taxes (for taxable accounts) and transaction costs.

Unfortunately the bear market that began in March 2000 has taught investors some very painful lessons. Investors who made (or continue to make) the two common gamblers' mistakes of playing with house money and loss regret avoidance are even more susceptible to disastrous consequences. Investors who instead base their buy and sell decisions on a long-term investment policy stand the best chances to beat the odds.

Recommended Reading

1. The Unbeatable Market, by Ron Ross, PhD. Copyright 2002.
   Read about passive asset class investing, the investment approach we recommend, from the viewpoint of Dr. Ross, an economist and financial advisor.

2. Does Your Broker Owe You Money? by Daniel R. Solin, Copyright 2003.
   Securities Attorney Dan Solin describes ways in which individuals can protect themselves against investment fraud, in part by adopting and only doing business with those who have adopted a passive investment approach.

FOCUS

Our Basic Tenets

Our objective is to design portfolios using passive asset class funds that maximize investors' returns within their tolerance for risk. Here is what sets us apart:

- Fee-only investment management
- A disciplined investment strategy
- Access to institutional no-load passive asset class funds
- Fixed income expertise
- An academic Nobel Prize-winning investment approach
- Continued access to academic research
- A tax-efficient focus, with valuable tax and estate-planning ideas
- Risk tolerance assessment
- Periodic portfolio rebalancing
- Regular communications and state-of-the-art reporting
- MOST IMPORTANT ... A TRUSTED ADVISOR RELATIONSHIP

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