

# **Behavioral Finance**

WE HAVE MET THE ENEMY AND...



Source: Charles M. Schulz

# THE DOCTOR IS IN

Many professional investors will tell you that investing is a science, with rules, technology and arcane statistics driving their investment decisions. For others, it is a blend of science and art with experience and intuition adding elements to the process. But for most of us investing is really a combination of art, science and emotion, and the emotional aspect may often create the difference between successful and less successful outcomes. In this paper, we discuss some of the more common tendencies that affect investors and we offer a few tips that may help keep investors from being meaningfully impacted by them.

Many of us know that much of investment theory is based on investors making rational decisions and that market participants are sophisticated, informed and only act on available information, with no place for emotion or psychology as part of the investment decision-making process. But, during the market declines that occurred during COVID-19, the Great Financial Crisis, the aftermath of 9-11, the 1987 market crash, etc., how did the rational person react? How did you react? Did you tune out the news confident in your long term plan? Did you see each event as a fabulous opportunity and then had the guts to act on that impulse? Did you sell in fear of further declines? Experts tell us that we should not let our emotions drive our investment decisions. In other words, acknowledge your emotions — but do not act on them. That goes for whether you want to sell during a steep market decline or buy into a market on the rise. It may be easier said than done and has fostered a school of investment theory and research known as "behavioral finance".

# A LITTLE SELF-AWARENESS GOES A LONG WAY

Sometimes, perhaps more than sometimes, investors are not rational in the way investment theory would like us to believe.

Some biases are driven by emotions, including fear. Studies by Nobel Prize winners in Economic Sciences suggest that the desire to avoid losses is nearly twice as great as the hope of earning a reward, making loss aversion a powerful motivator. This may cause investors to take on less (or more) risk than they can tolerate.



Behavioral finance is finance for normal people like you and me. Normal people are not irrational. Indeed, we are mostly intelligent and usually "normal-smart". We do not go out of our way to be ignorant and we do not go out of our way to commit cognitive and emotional errors. Sometimes, however, we are "normal-foolish" misled by cognitive errors such as hindsight and overconfidence, and emotional errors such as exaggerated fear and unrealistic hope.

- Meir Statman, "Finance for Normal People: How Investors and Markets Behave"

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Investors who suffer from **loss aversion** may sell during market declines and fail to reinvest to capture some of the subsequent recovery, or they may hold onto a risky investment for too long simply to avoid realizing the loss. How often do periods of meaningful loss occur and how long do they last? Exhibit 1 displays the length and depth of typical periods of loss in the S&P 500 over a 70-year period. The chart provides some comfort that while periods of loss were painful, they eventually subsided.



A second bias is known as **trend chasing**. It is the idea that investors are influenced by recent news, events, and experiences. When investors overweight the importance of recent events (bullish or bearish), they are more likely to chase performance rather than make suitable strategic investment decisions. We have a tendency, when we feel good during bull market experiences, to add money, often near market tops, and as market declines occur, we become frustrated and emotions take over, and that fear concept causes us to liquidate assets often closer to market bottoms. Emotional reactions to market events are perfectly normal. Investors should expect to feel nervous when markets decline, but it is the actions taken during such periods that can mean the difference between investment success and shortfall. "Those trying to trade stocks at a rapid-fire pace are likely to miss out on the market's best gains", a team at Bank of America said in an August 2020 client note. "If an investor missed out on the 10 best trading days per decade since the 1930s, their returns would total just 17%. Had they stayed in the market, their portfolios would have swelled by 16,166%", the team said.

## **Exhibit 1: Market Downturns Happen but Don't Last Forever**

Standard & Poor's 500 Composite Index (1952-2021)

Size of decline	-5% or More	-10% or More	-15% or More	-20% or More		
Average frequency <sup>1</sup>	About three times per year	About once per year	About once every three years	About once every six years		
Average length <sup>2</sup>	43 days	110 days	251 days	370 days		
Last Occurrence	October 2021	September 2020	March 2020	March 2020		

<sup>&</sup>lt;sup>1</sup> Assumes 50% recovery of lost value

Source: Capital Group, 2023

Another concept is known as **anchoring**. It is the idea that as investors, we are often influenced by prior purchase points, price levels, or other data that occurred in the past. We cling to these numbers, these reference points, and we use them in making decisions as to whether to buy or sell. Using the experience during the first quarter of 2020 (during the COVID-19 crisis) as an example, the S&P 500 began the first quarter at 3,230 and closed at 2,584. Investors may use their most recent performance reports and most likely compared their current balance against that prior peak. But what if we changed our reference point? What if we changed the data point to which we anchor? For example, a year earlier, on the first trading day of 2019, the S&P 500 opened at 2,531. Had we anchored instead to a year earlier, the impact of the market closing at 2,584, would have felt very different. By taking a longer-term perspective, the impacts of volatile moves can be seen in a renewed light.

#### STRATEGIES TO AVOID MAKING EMOTIONAL INVESTMENT DECISIONS

Investors can take control to better position themselves to deal with the inevitability of market volatility. The planning and action steps are not quick and easy fixes but spending the time up-front will provide much needed perspective for when "the going gets tough" or when the market looks like "easy money".

Creating and adhering to a thoughtfully constructed investment plan, often referred to as an Investment Policy Statement ("IPS"), is a key tool employed by institutional investors. An IPS puts an objective framework around portfolio management that can help reduce emotional reactions and helps to avoid knee-jerk investment decisions. Every IPS should consider several factors, including risk tolerance and short- and long-term investment goals. As important as it is to have a plan, it is just as important to review the plan, at *least annually* to confirm that it is still reflective of the investor's long-term goals and changing life circumstances.

<sup>&</sup>lt;sup>2</sup> Measures market high to market low



Portfolio rebalancing (bringing the portfolio back in line with what is expressed in an IPS) often can add to return and/or help to lower volatility. Maybe the greatest benefit of portfolio rebalancing is non-financial. It is emotional. It is the idea that portfolio rebalancing, when followed and implemented on a consistent basis, instills a sense of discipline into an emotionally charged world. After all, rebalancing requires us to do what is emotionally uncomfortable but financially productive. Think about it. Rebalancing requires the investor to reduce their exposure to assets that have done well recently and to redeploy those assets into securities or asset classes that have done less well.

A diversified portfolio does not guarantee profits or provide assurances that investments will not decrease in value, but it does help by attempting to lower risk. By allocating investments across a variety of asset classes, investors can buffer the effects of volatility on their portfolios. Overall returns will not likely reach the highest highs of any single investment — but they are unlikely to hit the lowest lows either. Exhibit 2 displays the annual returns of a variety of asset classes. The asset class in orange, with the line connecting it across periods, called *Asset Alloc*. represents a diversified portfolio of asset classes. Note that while it is never at the top of the chart, indicating the top return for a given period, it has never been at the bottom, representing the poorest return each year. Compare this to the more volatile experience of *Small Cap* which have been at both the very top and near the bottom during several years. While *Small Cap* has modestly outperformed the *Asset Alloc*. Portfolio, it has done so by taking on nearly twice the volatility of the diversified portfolio. How many investors would have had the patience to have their entire portfolio invested in this single asset class to achieve the modest outperformance? According to some of the behavioral finance concepts discussed above – very, very few.

#### **Exhibit 2: Asset Class Returns**

Annual returns of a variety of asset classes (2008-2022)

Cap																2008	2022
Income   Equity   REITs   REITs   REITs   Cap   REITs   Cap   REITs   Cap   REITs   Cap		2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	Ann.	Vol.
Same			REITe	REITs	REITe		REITs	REITs			Cash	_		RETS	Comdty.	_	REITs
Cash   Yield   Cap   Income   Yield   Cap   Cap   Cap   Cap   Cap   Yield   Cap			27.9%	8.3%	19.7%		28.0%	2.8%			1.8%			41.3%	16,1%		23.4%
1.8%   26.9%   7.8%   19.6%   19.6%   19.8%	Cach	High	5mall	Fixed	Hgh	Large	Large	Large	High	DM	Fixed	DEITA	EM	Large	Cach	5m all	5m all
Asset Alloc. Equity																	
Alloc. Equity	1.8%	59,4%	26.9%	7.8%	19.6%	32,4%	13.7%	1.4%	14.3%	25,6%	0.0%	28.7%	18.7%	28.7%	1.5%	7.2%	23.2%
Page				_							REITS			Comdty.		REITS	
High   Yield   28.0%   16.8%   2.1%   17.9%   14.9%   5.2%   0.0%   11.8%   14.6%   4.1%   22.7%   10.6%   14.8%   13.0%   6.1%   20.2%											-4.09/			27 197		e ew.	
Vield   28.9%   16.8%   2.1%   17.9%   14.9%   5.2%   0.0%   11.8%   14.6%   4.1%   22.7%   10.6%   14.8%   13.0%   6.1%   20.2%		Jan 076	100270					01000	12.071								20.070
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Cap	Small	Small	Large	Caub	Small	High	Small	DM	EN	Asset	Large		DM			High	DM
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18.6%   18.6%   14.8%   16.0%   2.9%   0.0%   2.0%   8.6%   10.4%   -5.8%   19.9%   7.5%   11.8%   -14.0%   2.7%   17.7%	Comdty.	1				REITs	Cash		REITS								Large
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Source: J.P. Morgan Asset Management "Guide to the Markets | U.S. | 1Q2023 | As of December 31, 2022". Bloomberg, FactSet, NAREIT, Russell, Standard & Poor's

Large cap: S&P 500, Small cap: Russell 2000, EM Equity: MSCI EME, DM Equity: MSCI EAFE, Comdty: Bloomberg Commodity Index, High Yield: Bloomberg Global HY Index, Fixed Income: Bloomberg U.S. Aggregate, REITs: NAREIT Equity REIT Index, Cash: Bloomberg 1-3m Treasury. The "Asset Allocation" portfolio assumes the following weights: 20% in the S&P 500, 10% in the Russell 2000, 15% in the MSCI EAFE, 5% in the MSCI EME, 25% in the Bloomberg U.S. Aggregate, 5% in the Bloomberg 1-3m Treasury, 5% in the Bloomberg Global High Yield Index, 5% in the Bloomberg Commodity Index and 5% in the NAREIT Equity REIT Index Balanced portfolio assumes annual rebalancing. Annualized (Ann.) return and volatility (Vol.) represents period from 12/31/2007 to 12/31/2022. All data represents total return for the stated period. The "Asset Allocation" portfolio is for illustrative purposes only. Past performance is not indicative of future returns.



## **CONCLUDING THOUGHTS**

A key element for many sophisticated investors is having someone to talk to about their portfolio – for many it is their investment advisor or consultant. This advisor should provide a sounding board, rational thinking, less emotion and most importantly – an element of time to minimize emotional reactions. Investors find that it is best to talk about how they will deal with a rapidly rising or falling market in advance by gauging the investor's risk tolerance. Doing this in a "normal period" is much better than dealing "in the moment" as the market is declining. It provides the objectivity that will allow investors to reflect and make better decisions.

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