

My way to the second generation of behavioral finance

Second
generation of
behavior
finance

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Abstract

Purpose – The purpose of this paper is to depict how the author’s way from standard finance to the first and second generations of behavioral finance illustrates the ongoing general transition.

Design/methodology/approach – The first generation, starting in the early 1980s, largely accepted standard finance’s notion of people’s wants as “rational” wants – restricted to the utilitarian benefits of high returns and low risk. That first generation commonly described people as “irrational” – succumbing to cognitive and emotional errors and misled on their way to their rational wants. The second generation describes people as normal.

Findings – It begins by acknowledging the full range of people’s normal wants and their benefits – utilitarian, expressive and emotional – distinguishes normal wants from errors and offers guidance on using shortcuts and avoiding errors on the way to satisfying normal wants. People’s normal wants include financial security, nurturing children and families, gaining high social status and staying true to values. People’s normal wants, even more than their cognitive and emotional shortcuts and errors, underlie answers to important questions of finance, including saving and spending, portfolio construction, asset pricing and market efficiency.

Originality/value – The article identifies that people’s normal wants include financial security, nurturing children and families, gaining high social status and staying true to values. People’s normal wants, even more than their cognitive and emotional shortcuts and errors, underlie answers to important questions of finance, including saving and spending, portfolio construction, asset pricing and market efficiency.

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My way from standard finance to the first and second generations of behavioral finance illustrates the ongoing general transition. I was a student at the Hebrew University in Jerusalem in the late 1960s, in a building housing the economics and finance faculty. I majored in economics and statistics in my undergraduate program and finance in my MBA program.

Daniel Kahneman and Amos Tversky were doing their pioneering work on cognitive shortcuts and errors in the building right next to mine, which housed the psychology faculty. Yet I had no idea who Kahneman and Tversky were, and none of my economics, statistics or finance professors mentioned their names or referred to their work. It was the time of standard economics and finance.

I would walk over to the psychology building from time to time to earn pocket money by participating in psychological experiments. Speaking with Kahneman and Tversky many years later, I found out that none of the experiments I remembered were theirs. One experiment called for writing stories when presented with Rorschach inkblots. Another was a “prisoner dilemma” type of experiment I played long before I knew its name. I let the student on the other side of the partition win five games and hoped that he or she would reciprocate by letting me win five so we would both win at the expense of the experimenter. But that student never reciprocated. I remember the smirk on his face as we left the building.

The experiments taught me further what I had known before; human behavior has more components than just those taught in my economics and finance courses. Yet they did not teach me how to incorporate those components into economics and finance.

I got a job as a financial analyst at a high-technology company when I completed my Hebrew University studies. The job was interesting for a while, and then it was not. I would say later that projects lasted much longer than my interest in them. Yet, I gained many insights about human behavior in that job and have incorporated some into my research, including those about excessive optimism regarding the likely success of new projects, the



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games people play as they champion their projects and the disposition to throw good money after bad by continuing projects that should be terminated. I remember the head of the company saying that engineers regularly championed complex projects that included components yet to be developed. He was adamant in turning down pleas from such project champions.

I quit my job in late August 1973 and came to New York City to study for my PhD at Columbia Business School. The October 1973 Yom Kippur War and subsequent energy crisis caught me by as much surprise as it caught the long lines of drivers hoping that gas pumps would not run dry before they reached them. Reading the *New York Times* became a daily practice.

“Stockholders and Pickets Score Con Ed Management” was the headline of a May 1974 article by Ernest Holsendolph in the *New York Times*. (Holsendolph, 1974) Above the headline was a photograph of a packed Commodore Hotel ballroom. More than 4,000 Consolidated Edison (Con Ed) shareholders overflowed the ballroom into two auxiliary suites, leaving many shareholders outside, including Sydell Pflaum, a 76-year-old widow who relied on her \$90 Con Ed quarterly dividend for precious financial support.

The May 1974 Con Ed shareholder meeting was the first since the company’s April 1974 announcement that it was suspending its quarterly dividend, something it had never done since it started paying dividends in 1885. Con Ed attributed its decision to an urgent need to conserve cash reserves severely depleted by soaring fuel prices in the wake of the Arab oil embargo. But Con Ed’s reasoning did not sway Ms. Pflaum.

Fuming with anger, Ms. Pflaum paid \$189 to fly from Miami Beach to New York City for the Con Ed meeting. “Where is Luce? Since I cannot get in, maybe he’ll at least pay my way back home,” she said, referring to Charles F. Luce, the utility’s chairman.

I remember being struck by the fury of the shareholders at the Con Ed meeting. I knew that the behavior of Con Ed’s shareholders contradicted standard finance theory. In my finance courses at the Hebrew University, we studied the 1961 article by Merton Miller and Franco Modigliani that proved that rational investors do not care whether a company pays dividends or not. According to them, rational investors who expect company-paid dividends but do not receive them substitute for them “homemade” dividends they create by selling as many shares of stock as necessary to yield the same amount. (Miller and Modigliani, 1961)

Why then were Con Ed’s shareholders fuming when they did not receive their dividends? This is what Fischer Black called the “dividend puzzle” in a 1976 article. (Black, 1976) “Why do corporations pay dividends? Why do investors pay attention to dividends? . . . The harder we look at the dividend picture, the more it seems like a puzzle, with pieces that just do not fit together” (p. 8).

I joined Santa Clara University at the end of 1979, and some months later heard Hersh Shefrin speak about joint work with Richard Thaler on framing, mental accounting and self-control and their relation to saving behavior. (Thaler and Shefrin, 1981) Richard Thaler was the 2017 Nobel Prize winner in economics, but in 1979, he must have been wondering if he would ever get tenure.

I could see the link to the dividend puzzle. Normal investors with imperfect self-control are concerned that they might give in to temptation and turn a 3% homemade dividend into a 30% homemade dividend. They bolster their self-control by framing their money into separate mental accounts, one for income and one for capital and use a rule – “spend income but do not dip into capital” – to prevent spending too much and saving too little. Rational investors have perfect self-control, obviating any need for framing, mental accounting and spending rules.

It turned out that Shefrin was thinking along the same lines, and we decided to collaborate. We offered a solution to the dividend puzzle in “Explaining Investor Preference for Cash Dividends,” built on framing, mental accounting, self-control, regret aversion and prospect

theory. (Shefrin and Statman, 1984) I asked Con Ed for the transcript of the 1974 meeting, and we included in our paper illuminating questions and statements by shareholders and Mr. Luce's responses.

We submitted our paper to the *Journal of Financial Economics* in early 1982. We used Fischer Black's dividend puzzle as a platform for our discussion and found out later that he was our paper's reviewer. The opening words of Black's review still make me blush: "This paper is brilliant. It rings both new and true in my ears." The last sentence of the review said, "Please spell my name right." We had spelled Black's first name without the "c."

William Schwert, the journal's editor, accepted Black's recommendation after "some non-trivial soul-searching," as he described it in our personal correspondence. Much later, we learned that some of the journal's associate editors objected vociferously to the paper's publication, and a few threatened never to submit any paper to the journal if our paper was published. This surely was the era of standard finance.

I presented the dividends paper at the 1982 European Finance Association meeting at the Hebrew University in Jerusalem. Audience reactions were mostly bewilderment, but Avraham Beja, one of my former Hebrew University professors, liked it. "This is a pretty mischievous paper," he said with a smile.

At the 1983 European Finance Association meeting at INSEAD in Fontainebleau, France, I presented a paper that contained the basics of two other papers I subsequently wrote with Shefrin, "The Disposition to Sell Winners Too Early and Ride Losers Too Long: Theory and Evidence" and "Behavioral Aspects of the Design and Marketing of Financial Products." (Shefrin and Statman, 1985; Shefrin and Statman, 1993a) The discussant did not like the paper much, dismissing it by pointing out that Shefrin and I argue, in effect, that investors perceive a half-full glass as holding a different amount of water than a half-empty glass. Rational people like himself, he said, know and teach their students that the two glasses contain identical amounts of water.

Black was elected president of the American Finance Association and planned its December 1984 meeting. Shefrin and I offered to organize a session at the meeting, and he accepted. The session included our paper, "The Disposition to Sell Winners Too Early and Ride Losers Too Long" and the paper of Werner De Bondt and Richard Thaler, "Does the Stock Market Overreact?" Black chose to publish both papers in the *Journal of Finance* in 1985. (Shefrin and Statman, 1985; De Bondt and Thaler, 1985)

Peter Bernstein accepted my invitation to serve as the discussant of the paper of De Bondt and Thaler at the December 1984 meeting, and I accepted Bernstein's invitation to serve as a discussant in a session he organized. I ended my discussion of that paper with what reads like a manifesto: "Finance is full of puzzles and it seems as if one is added every day. It is clear, as stated by William Schwert, that we need new theory. However, unlike Schwert, I see no reason why this new theory must be consistent with rational maximizing behavior on the part of all actors in the model. We should develop descriptive (positive) theories. If evidence shows that models allowing actors to display cognitive biases and changing perceptions explain the world of finance better than models allowing only rational behavior, so be it." (Statman, 1985)

Two University of Chicago Booth School of Business professors – Melvin Reder, an economist and Robin Hogarth, a psychologist – organized a conference at the University of Chicago in October 1985, pitting behavioral economics against standard economics. Shefrin and I were there but without speaking roles. At the reception on the evening before the conference's start, I heard a man behind me say to Reder, "If you see Shefrin or Statman, please point them out to me." Reder touched my shoulder and said, "Here is Meir Statman." The man said, "Hi, I'm Merton Miller." Being introduced to God would have made a greater impression on me, but being introduced to Merton Miller came close.

On the morning of the first day of the conference, the Swedish Academy announced that it had awarded the Nobel Prize in Economics to Franco Modigliani, in part for the article on

dividends he wrote with Miller. (Miller and Modigliani, 1961) Newspaper reporters from around the world called Miller early that morning, asking for a one-sentence description of this joint work. Miller, known for his wit, said with a chuckle, "Moving money from your left pocket to the right will not make you rich. Franco and I proved it rigorously!"

Later that day, Miller devoted his entire presentation to an attack on the dividends paper Shefrin and I had written. (Shefrin and Statman, 1984) He mistakenly identified us as psychologists, perhaps because he could not conceive of economists writing a paper that incorporated psychology. Demonstrating his wit again, he said, "So here come two boy scouts, Shefrin and Statman, who want to help me cross the street. But I do not want to cross the street!"

In the conference volume published in 1986, following the conference, Miller wrote the following:

As the title ["Behavioral Rationality in Finance: The Case of Dividends"] suggests, this paper attempts to get to the specifics of the behavioral rationality theme of this conference by focusing on an area in the main core of finance, namely, the demand and supply of dividends, where, by common consent, the essentially "rationalist" paradigm of the field seems to be limping most noticeably. Important and pervasive behavior patterns on both the paying and the receiving ends have despairingly been written off as "puzzles" even by theorists as redoubtable as Fischer Black (see especially his much-cited 1976 article).

Behaviorists have homed in on precisely these same dividend-related soft spots in the current body of theory (see especially Shefrin and Statman 1984). We seem to have, in sum, an ideal place to look for signs of an imminent "paradigm shift" in the behavioral direction of precisely the kind envisioned by some of the other contributors to this conference. (p. S451) (Miller, 1986)

Miller downplayed the likelihood of a "paradigm shift":

How much concern should they show at this point about our dividend anomalies? Less, I will argue here, after a fresh look at the evidence, than I and others in finance may once have thought (see, e.g., the introduction to Miller and Scholes (1978)). This is not to say that we do not have our share and have more of still-unsolved problems. Finance, after all, is one of the newer specialty areas in economics. But I do not see us in such disarray, even on the much-mooted dividend issues, that we must think of abandoning or even drastically modifying the basic economics/finance paradigm on which the field has been built. (p. S452) (Miller)

I would argue that "a fresh look at the evidence" points to a "paradigm shift in the behavioral direction," a shift that was "imminent" only in 1986, when Miller downplayed it but is clearly evident today.

The optimism of investors as they buy stocks has an analog in the optimism of project champions as they pitch investment projects, and the disposition of investors to hold on to losing stocks has an analog in the disposition of project champions to throw good money after bad into losing projects. In the second half of the 1980s, I examined this managerial behavior and its reflection in the stock market, collaborating with colleagues in the marketing, management and accounting departments. (Statman and Tyebjee, 1985; Statman and Caldwell, 1987; Statman and Sepe, 1989)

Investors use the term "sentiment" when speaking about optimism and pessimism. They speak of optimism, especially excessive optimism, as "bullish sentiment" and of pessimism, especially excessive pessimism, as "bearish sentiment."

In the mid-1980s, I noticed statements about the Bearish Sentiment Index, calculated as the ratio of the number of writers of investment newsletters who are bearish on the stock market to the number expressing an opinion. A contrarian use of the index calls for buying stocks when it is high and selling when it is low. The index was discussed frequently in the financial press at the time. For example, John Andrew wrote in the *Wall Street Journal* in 1984,

"In recent years, the numbers [of the Bearish Sentiment Index] have become one of the most popular contrary indicators in investment circles. On the theory that the stock market generally does the opposite of what most people think it will do, a high percentage of bullish advisers is considered bearish for the market. If most advisers are bears, then the stock market is supposed to be poised for a big rally." (Andrew, 1984)

There was little interest in investor sentiment among investment academics at the time, but I thought that investor sentiment might help us understand the behavior of both investors and markets. I received the Bearish Sentiment Index data from the publisher, and fellow economist Michael Solt and I proceeded to find a significant relation between past stock returns and subsequent sentiment, teaching us about the behavior of investors but no significant relation between sentiment and subsequent returns, teaching us about the behavior of the stock market. (Solt and Statman, 1988)

I also wondered at the time whether a range of return "regularities" – from market value of equity to price-to-earnings ratios, price-to-book ratios and measures of company "neglect" and "excellence" – proxy for a preference for stocks of "good" companies over stocks of "bad" companies, in the mistaken belief that good stocks are stocks of good companies. The exploration was published as "Good Companies, Bad Stocks." (Solt and Statman, 1989) That paper is not explicit in attributing the preference for stocks of good companies to the "affect heuristic," but my subsequent work was explicit about it, including "Affect in a Behavioral Asset Pricing Model." (Statman *et al.*, 2008)

My article "A Behavioral Framework for Dollar-Cost Averaging" was published in 1995, but its origins go back to the early 1980s (Statman, 1995) I found the practice of dollar cost averaging interesting because it is not consistent with rational behavior, yet it is persistent. The subtitle of that article is "Dollar-Cost Averaging May Not Be Rational Behavior, But It Is Perfectly Normal Behavior." I ended the article as follows: "It might be time to move on to a positive theory that is consistent with the evidence, and to remember that a normative theory is useless if investors cannot be persuaded to follow it. Meanwhile, I offer a hypothesis. The practice of dollar-cost averaging will persist" (p. 77).

Socially responsible investments caught my attention at about the same time as I was reading newspaper reports about investors following social responsibility principles. They did so by excluding from their portfolios "sin" stocks, such as those of tobacco, alcohol and gambling companies and by favoring stocks of companies demonstrating concern for employees, communities and the environment.

I found social responsibility investment criteria especially relevant to my thinking because they cannot be reasonably classified as proxies of risk or expected return. Instead, they stand for wants of socially responsible investors for the expressive and emotional benefits of staying true to their values, even when sacrificing the utilitarian benefits of higher returns and lower risk. This was an opening for discussing a wider range of investors' wants, such as wants for social status or fairness.

Few financial studies about socially responsible mutual funds were conducted at the time despite availability of data about their returns. Standard finance academics neglected these funds likely because they do not fit within standard finance. And standard finance professionals were generally dismissive of, even hostile to, incorporating social responsibility criteria into their investments. Indeed, socially responsible mutual funds were first offered by small mutual fund companies specializing in them.

Fellow economists Hoje Jo and Sally Hamilton and I examined the performance of socially responsible mutual funds in "Doing Good While Doing Well? The Investment Performance of Socially Responsible Mutual Funds." (Hamilton *et al.*, 1993) We found that the returns of socially responsible funds were no different from those of conventional funds. The most important part of the article for me, however, was introducing ideas about investor wants into a mainstream finance journal. We ended the article with a quote from the provost of a Quaker

college who was asked why the college does not invest in manufacturers of armaments: "Our board isn't out to change the world. We're seeking a oneness between ourselves and our Lord."

Also, in the late 1980s, Shefrin and I wondered about the rationale for financial regulations such as those that mandate disclosure, restrict margin loans or prohibit insider trading. We asked what are the roles of cognitive and emotional shortcuts and errors? And what are the roles of wants for fairness?

Baruch Lev, one of my finance professors at the Hebrew University, adhered to standard accounting and finance. In 1988, he presented a framework explaining regulations mandating disclosure by companies as influenced by considerations of fairness, but he rejected "moralistic" notions of fairness. He wrote, "The equity-orientation of disclosure regulation advanced here differs markedly from the traditional, moralistic concepts of equity in accounting, which are generally phrased in terms of maintaining fairness, eliminating fraud, and protecting the uninformed investors against exploitation by insiders. In contrast to such vague, anachronistic, and unattractive notions, the equity concept advanced here is state of the art and operational, being linked directly to recent theoretical developments in economics and finance" (p. 1). (Lev, 1988)

Shefrin and I noted that Lev's concept of fairness may be state of the art and operational, but it is too narrow to provide a framework for merit regulations, suitability regulations, margin regulations, trading halts, insider trading regulations or even mandatory disclosure regulations. We argued instead that a framework consistent with the wide range of regulations in financial markets requires broader notions of fairness. We were inspired by the work of Daniel Kahneman, Jack Knetch and Richard Thaler, who explored the role of fairness in economic choices. (Kahneman *et al.*, 1986)

Shefrin and I argued, for example, that margin regulations protect investors from their own cognitive and emotional errors because low margins facilitate speculation and resulting losses. We quoted a passage from the deliberations underlying the Securities Exchange Act of 1934: "A Federal judge furnished this committee with instances from his long experience on the bench, indicating that a large proportion of business failures, embezzlements and even suicides in recent years were directly attributable to losses incurred in speculative transactions." (Shefrin and Statman, 1992; Shefrin and Statman, 1993b)

I explored fairness further in the context of insider trading using vignettes of the kind used by Kahneman, Knetch, and Thaler, such as one about "Paul Bond," whose story corresponds to that of James O'Hagan, who was found guilty of insider trading by the US Supreme Court. Justice Ruth Bader Ginsburg addressed fairness in the court's decision as she stressed that "an investor's informational disadvantage vis-à-vis a misappropriator with material, nonpublic information stems from contrivance, not luck; it is a disadvantage that cannot be overcome with research or skill." The first of the resulting articles was titled "Fair Trading." (Statman, 2005)

I broadened the exploration of investor wants by specifying their benefits. In "Behavioral Finance: Past Battles and Future Engagements," published in 1999, I divided benefits into utilitarian and value expressive. Later, in my 2011 book, *What Investors Really Want: Discover What Drives Investor Behavior and Make Smarter Financial Decisions* and my 2017 book *Finance for Normal People*, I divided benefits into utilitarian, expressive and emotional.

My current project focuses well-being, exploring the utilitarian, expressive and emotional benefits that enhance it and the utilitarian, expressive and emotional costs that detract from it. My first article on the topic, "Financial Advisers as Well-Being Advisers," was published in the *Journal of Financial Planning* in September 2019. (Statman, 2019)

Well-being in the context of finance usually implies financial well-being. And discussions about enhancing well-being are usually about enhancing financial well-being, such as by saving during our working years to sustain us in retirement. Well-being, however, is broader

than financial well-being, and enhancing well-being entails more than enhancing financial well-being. The domains of well-being also include those of family, friends and communities, health – both physical and mental –work and other activities.

My September 2019 article draws from interviews with investors, including Divya, a 33-year-old woman, who said, “My financial status enabled us to purchase this home that is well out of reach for many individuals in my age group and place in life. I felt proud that my family could make the decision to purchase this type of home.” This home provides Divya utilitarian benefits as shelter, expressive benefits as an emblem of high social status, “well out of reach for many individuals in my age group and place in life” and emotional benefits in pride “that my family could make the decision to purchase this type of home.” Moreover, finances underlie all these benefits. Divya said, “My financial status enabled us to purchase this home.” (Statman, 2019)

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