The Influence of Behavioral Bias in Investors' Investment Decision Making in Indian Stock Market

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Abstract:

Behavioral Finance is an emerging field that has grown by leaps and bounds in recent years, which contradicts the core notion of a homo economicus, that is, that investors are rational. These investors have to make various investment decisions given the growing availability of investment options, access to information, and market size, which has caused investment decisions to become very complex. Behavioral Finance plays an essential role in investment decision-making. The current study wants to explore (a) the most common behavioral bias of the investor, which affects their investment decision-making, and how to overcome the behavioral bias. (b) Evolution, challenges and future implications in the field of behavioral Finance. However, this chapter will provide valuable insights among academicians, investors, policymakers, stockbrokers, agents, and portfolio managers and help build a compelling portfolio.

Keywords:

Behavioral Bias, Investors, Behavioral Finance, Investment Decision-making, Stock market, Bias, Heuristics.

Introduction:

Before the 1970s, homo-economicus agents dominated decision-making, with agent rationality being one of the fundamental axioms. According to Sternberg (2008), people were rational and wanted to maximize pleasure while minimizing losses. This notion served as the foundation for the principal model, the Expected Utility Theory (EUT), which was axiomatized in 1944 by Von Neumann and Morgenstern and was based on Bernoulli's

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enhanced concept of anticipated utility, which was created in late 1738 (Tversky & Kahneman, 1986). EUT assumes that people have perfect rationality, self-interest, environmental comprehension, computational math proficiency, faultless knowledge, and the ability to make complicated judgments (Simon, 1955; Pompian, 2012). After this theory was criticized for questioning its basic assumptions, investigations revealed that the EUT could not correctly capture human behavior since people do not always respond rationally in decision-making scenarios. Consequently, it is crucial to integrate human behavioral qualities with standard financial principles to understand why people behave irrationally.

Considering this, a new concept called behavioral Finance originated in the early 1970s by merging Finance, sociology, and psychology components in human decision-making. In the late 1970s and early 1980s, psychologists Daniel Kahneman and Amos Tversky and economist Robert J. Shiller pioneered Behavioral Finance. Humans have emotions that directly or indirectly impact their financial decisions. Sometimes, these decisions are illogical as they can result in a stock market disaster, which shows that people are biased and have cognitive constraints that prevent them from obtaining full rationality while making decisions. Market anomalies such as speculative bubbles, overreactions, and underreactions to new information induce investors to be more than cold, calculative rational agents in decision-making. As a result, it is necessary to comprehend such anomalies and the flaws in human judgment. Behavioral Finance seeks to understand how emotions and cognitive errors influence individual investment behavior.

Behavioural Bias:

Behavioral biases are unscientific beliefs of investors that unintentionally affect their decision-making process. An investor's Investment Decisions are affected by many biases. According to David Hirschleifer, biases may stem from the following causes:

- 1. Heuristic Driven Biases, often called Cognitive Biases, are mental evasions that result in mistakes in thinking while processing or interpreting data, e.g., Familiarity, representative, availability, anchoring, framing, story, etc.
- 2. Self-Deception is lying to oneself about one's abilities or reality—E.g., Overconfidence, confirmation, hindsight, self-attribution, etc.
- 3. Emotional/ Affect refers to the underlying experience of feeling, emotion, attachment, or mood.
- 4. Social biases involve acting based on our society, like family, friends, culture, social environment, and religious and political views. E.g., herding.
- 5. These biases often deviate from the principles of rational decision-making assumed in traditional Finance. Here are some common behavioral biases that can influence investment decision-making:

Sr. No.	Behavioral Bias	Description
1.	Bias	Investors tend to overestimate their abilities and the accuracy of their predictions. This can lead to excessive trading, failure to diversify adequately, and taking on more risk than justified by their actual skill or information.

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Sr. No.	Behavioral Bias	Description
2.	Loss Aversion	This bias refers to the tendency of individuals to prefer avoiding losses rather than acquiring equivalent gains. Investors may be more risk-averse when faced with losses, leading to suboptimal decision-making, such as holding onto losing investments for too long.
3.	Regret Aversion	Investors may make decisions based on avoiding the potential for regret rather than maximizing expected returns. This can lead to conservative investment choices or a reluctance to admit mistakes and sell losing positions.
4.	Anchoring Bias	Anchoring occurs when investors fixate on specific reference points, such as purchase prices or recent highs, and use them as benchmarks for decision-making. This can result in holding onto investments even when conditions have changed, leading to missed opportunities or increased losses.
5.	Confirmation Bias	Investors tend to seek information that confirms their existing beliefs or decisions while ignoring or downplaying information that contradicts them. This can lead to a lack of objective analysis and an overemphasis on information that supports preconceived notions.
6.	Herding Behavior	Investors may follow the crowd or popular trends rather than conducting independent analysis. This can result in asset bubbles or market inefficiencies as individuals collectively make decisions based on the actions of others rather than on fundamental analysis.
7.	Availability Bias	This bias occurs when investors rely on readily available information rather than seeking out a comprehensive range of data. Recent or emotionally charged events may disproportionately influence decision-making, leading to suboptimal choices.
8.	Hindsight Bias	Investors tend to perceive past events as having been predictable after they have occurred. This can lead to an overestimation of one's ability to predict market movements and may result in unwarranted confidence in future predictions.
9.	Self-Control Bias	Investors may struggle with self-discipline and succumb to the temptation of short-term gratification, leading to impulsive decision-making rather than adhering to a long-term investment strategy.
10.	Mental Accounting	Investors may compartmentalize their financial decisions, treating different investments or sources of money differently. This can lead to suboptimal portfolio allocation and risk management.

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Literature Review:

Behavioral biases are one of the many complicated aspects that affect the decision-making process while making investments. This literature review thoroughly summarizes the body of research about behavioral biases and investment decisions available in this context.

2.1 Background and Context:

Numerous theoretical frameworks have been developed to explain behavioral biases in investment. Prospect Theory was first presented in the foundational work of Kahneman and Tversky (1979), which established the groundwork for our knowledge of why people make irrational decisions during uncertainty. In order to clarify the psychological foundations of biased decisions in financial markets, further research has built upon this paradigm by utilizing ideas from behavioral economics.

Overconfidence Bias: Extensive research has been conducted on overconfidence, a common bias in investing decision-making. Odean (1999) examined an overconfident investor, and the researcher learned that an overconfident investor results in the worst portfolio performance. In further studies, it was also found that overconfidence bias significantly affects investment decision making and it is more prevalent in males than females (Bakara & Yi, 2016; Kumar & Goyal, 2016; Yadav & Narayanan, 2021; Gavrilakis & Floros, 2021; Adil et al., 2022)

Loss Aversion: According to Barberis and Xiong (2009), loss aversion significantly influences investing decisions, which makes people reluctant to sell losing positions and allocate assets less optimally. Gupta et al. (2021) and Laungratanamas and Nuangjamnong (2022) found that loss aversion significantly influences investment decision-making.

Regret Aversion: Loomes and Sugden (1982), Bell (1982), and Fishburn (2013)—were the first to propose this bias. People's future decisions are more significantly impacted by decisions they later regret. They either become inspired to take on more significant risks or decide not to take any risks. This is being done to avoid any regret in the near future.

Anchoring Bias: According to Shin & Park (2018), Maqsood Ahmad, Syed Zulfiqar Ali Shah (2018), and Singh (2016), anchoring is a cognitive bias that explains why people often rely heavily on the initial piece of information while making judgments. It is common for investors to base their stock purchases on the firm's most recent price. Such behavioral responses demonstrate how anchoring bias contributes to investors' decision-making processes, producing less-than-ideal choices (Krause et al., 1970).

Confirmation Bias: This bias was first described by Dickens (1978). In this, Individuals typically rely on prior notions they have about something. As a result, they modify their knowledge in the future to reflect their viewpoint. As a result, investors make illogical judgments because their decisions are biased toward their current knowledge and away from new information. Bakara and Yi (2016) found that this bias positively impacts investment decision-making.

Herding Bias: Herding is the decision-making technique individuals use at the time, typically in complicated and uncertain situations (Busenitz & Barney, 1997). Herding behavior was first conceptualized by Bikhchandani, Hirshleifer, and Welch (1992), who emphasized its significance for asset price bubbles and market dynamics.

Further, studies were done to know the impact of this bias on the decision-making of investors; it was found that this bias significantly influences investment decision-making, and females are more prone to this bias (Atlaf & Jan, 2023; Adil et al., 2022; Gupta et al., 2021; Javed et al., 2017). On the other hand, this bias has no meaningful association with investment decision-making (Ahmed et al., 2022).

Availability Bias: This bias was developed by Tversky and Kahneman (1973) and occurs when people make judgments based disproportionately on information that is easily accessible or recent occurrences. This bias was found to have a positive significant impact on investment decision-making. Bakara and Yi (2016); Javed et al. (2017)

Hindsight Bias: This bias arises when an investor thinks a specific occurrence may be reasonably foreseen (Fischhoff & Beyth, 1975). However, this view can be risky since the investor may create a causal relationship between the simultaneous occurrence of two events even though there is no relationship among them, which could lead to rash judgments.

Self-Control Bias: According to Ben-David et al. (2017), those who have trouble controlling their emotions and information that is easily accessible to them are more influenced by this bias. The seminal work on time-inconsistent preferences by O'Donoghue and Rabin (1999) provided the framework for comprehending how self-control biases might result in impulsive and less-than-ideal investing decisions. Self-control biases make it difficult for investors to stick to long-term investing plans, as recent research demonstrated by Benartzi and Thaler (2007).

Mental Accounting: This was first proposed by Thaler (1985). According to this hypothesis, investors allocate their money across different portfolios based on various mental categories. Then, they establish distinct investing strategies for every mental account to maximize returns while minimizing risk for each. This may lead to the selection of portfolios that satiate investors' emotions but are not lucrative.

2.2 Challenges:

- 1. Emotional Biases: The existence of emotional biases, including fear, greed, Overconfidence, and loss aversion, is one of the main problems in behavioral Finance. These prejudices have the potential to significantly affect financial markets by causing irrational decision-making.
- 2. Limited Rationality: Behavioral Finance questions the conventional theories in economics on the existence of perfect rationality. People frequently make decisions using heuristics and general guidelines rather than methodically reviewing all of the available information. Making poor financial judgments might result from this restricted logic.

- **3. Herd Behavior:** Investors frequently go with the flow instead of making judgments. Because people often copy the acts of others, herd behavior can cause market bubbles and collapses by generating momentum in the market that may not be founded in core principles.
- 4. Cognitive biases can affect how people see and understand information. It includes confirmation bias, anchoring, hindsight bias, etc. These biases may cause people to make poor decisions and skewed judgments.
- **5. Market Anomalies:** A variety of anomalies in the market are identified by behavioral Finance that are difficult for conventional financial theories to explain. These anomalies cast doubt on the efficient market theory and imply that markets are not always efficient.
- **6. Data Restrictions:** The validation of behavioral Finance ideas mostly depends on empirical data. Robust empirical investigations can be hampered by the difficulty of getting precise and thorough data on individual decision-making processes.
- 7. **Policy Implications:** It might be challenging to implement behavioral finance studies when changing policies. Given the possibility of unforeseen effects, policymakers must carefully assess the implications of nudges and interventions meant to affect behavior.

2.3 How to overcome Behavioural Bias?

Behavioral biases are frequent roadblocks to profitable investing. Erroneous conclusions or emotional reactions to new information can lead even the most reasonable people to make poor investing judgments.

Warren Buffett once said: "Be greedy when others are scared and fearful when others are greedy. The most prosperous investors recognize behavioral traps and take precautions to stay away of them."

- 1. Manage Emotions. Research indicates that investors experience more suffering from lost investments than from profitable ones. A legitimately increased concern about investing losses exists among investors harmed by the bust of the technological bubble in 2000 and the global financial crisis in 2008. Several significant events like the Brexit vote in June—were influenced by emotions and pain. If Investors calmly evaluate the ramifications associated with their investments, they are more likely to profit from the opportunities presented by each incident.
- 2. Seek Contrary Opinions—the propensity to look for views that support one's viewpoint is known as confirmation bias. Because too many investors reject competing viewpoints and instead look for validation from sources supporting their investing theory, they are susceptible to confirmation bias. The wisest investors look for opposing viewpoints and assess each one's merits.
- **3.** Be A "Renter," Not an Owner: It is common for investors to form an unhealthy bond with a stock. Investors may fail to realize that a "great" firm is not always a "great" stock; in other circumstances, the attachment is tied to a personal relationship with the company. Many lucrative and well-managed businesses grow excessively costly in terms of their profit potential, while in other situations, disruptive economic forces push profitable and well-managed businesses aside. Although many people think that Facebook (ticker: FB) and Netflix (NFLX) are excellent businesses, it is more

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challenging to consider them excellent equities given their current earnings multiples. Many profitable investors view their stocks as "rentals," which helps them maintain the emotional distance needed to make dispassionate judgments about whether to sell or stick to current holdings.

- 4. Do Not Chase Yesterday's Winners: Previous performance does not guarantee future performance, which investors must pay attention to. The concept of "performance chasing" is widespread when funds are directed towards recent winners and diverted from recent losers. It is a common misconception among investors that recent success will last. In the world of investing, success encourages imitation, and herders can put an end to a profitable investment plan. Following the crowd is not a good idea; investors should research before making a deal.
- **5.** Pay More Attention To Detailed Analysis Than To Stories: People enjoy telling stories and frequently fabricate a story to justify their financial choices. Falling for a story is risky, and it is crucial to research to identify flaws in the story before making a decision.

3. Relevance of The Study:

The field of behavioral Finance is beneficial for comprehending and explaining various financial markets and decision-making processes.

Behavioral Finance is relevant for the following reasons, which are highlighted in multiple ways:

- 1. It helps explain market anomalies, i.e., bubbles, crashes, and persistent mispricing, which are not explained by traditional theories.
- 2. It also provides insights into how individuals make financial decisions based on cognitive biases, emotional biases, and heuristics. It also provides reasons why people deviate from rationality.
- 3. This helps policymakers, fund managers, and investors understand these biases, develop strategies to avoid these biases, and make strategies to build effective portfolios.
- 4. It helps policymakers maintain the stability and efficiency of financial markets and helps prevent market disruptions.
- 5. Behavioral Finance is relevant in corporate Finance, influencing capital budgeting, financing, and dividend policy decisions. Understanding the behavioral aspects of decision-making within firms can improve strategic planning.
- 6. Behavioral Finance contributes to a better understanding of risk perception and risktaking behavior. This knowledge is crucial for improving risk management practices in financial institutions and for individual investors.
- 7. It provides valuable insights into personal Finance and household decision-making. It helps identify common behavioral pitfalls individuals face, leading to improved financial education and literacy programs.

In conclusion, behavioral Finance is an essential field of study in various financial fields, from influencing market dynamics and policy formation to understanding human decisionmaking. Compared to conventional finance theories that rely only on logical assumptions, it offers a more thorough and practical framework for examining financial markets and behavior. Top of Form Money Management and Indian Economy

4. Future Directions:

This field is interesting and exciting, as it provides an easy and enjoyable way to benefit from the opportunities in the market. There are vast possible areas in behavioral Finance that can be studied.

- 1. The researcher should target the market participants who are actively investing and those who invest through financial intermediaries.
- 2. The changes in investor behavior based on seasonal and demographic characteristics may be studied in great detail. An essential component to be researched is how the climate and seasonal circumstances vary by area and impact investors' decision-making ability.
- 3. The target market can be reduced based on various criteria, such as the investors' expertise, profession, and financial requirements, and studying the impact of their biases on investment decisions.
- 4. many studies have been done in developed countries like the US, the UK, and Europe to understand investors' behavior. However, studies have yet to be conducted in developing countries like India, where there is a wide possibility of studying various investment patterns, investor behavior, and how behavioral factors impact asset pricing.
- 5. Limited literature is available on certain biases, such as the endowment effect, home money effect, conservatism, recency, and self-attribution bias. A deeper study in these areas is possible and should be done.

Summary:

Behavioral Finance is an emerging area in Finance that looks at various biases an investor commits while making an investment decision. It questions conventional economic theories, which hold that people always make logical decisions, and aims to explain why people frequently make less-than-optimal financial decisions. Behavioral Finance is evolving as new biases are investigated, preexisting theories are improved, and discoveries are applied to many facets of Finance. The researcher's goal is to get a deeper comprehension of how psychological variables affect financial markets.

In a nutshell, behavioral Finance combines knowledge from economics and psychology to offer a comprehensive viewpoint on financial decision-making. It acknowledges the role of human behavior, emotions, and thought processes in influencing financial results and has applications for individual and institutional investors.

References:

Journals:

1. Adil, M., Singh, Y., & Ansari, M. S. (2022). How financial literacy moderate the association between behaviour biases and investment decision? Asian Journal of Accounting Research, 7(1), 17-30.

- 2. Ahmed, Z., Rasool, S., Saleem, Q., Khan, M. A., & Kanwal, S. (2022). Mediating role of risk perception between behavioral biases and investor's investment decisions. Sage Open, 12(2), 21582440221097394.
- 3. Altaf, H., & Jan, A. (2023). Generational theory of behavioral biases in investment behavior. Borsa Istanbul Review.
- 4. Bakar, S., & Yi, A. N. C. (2016). The impact of psychological factors on investors' decision making in Malaysian stock market: a case of Klang Valley and Pahang. Procedia Economics and Finance, 35, 319-328.
- 5. Baker, H. K., Kumar, S., Goyal, N., & Gaur, V. (2019). How financial literacy and demographic variables relate to behavioral biases. Managerial Finance, 45(1), 124-146.
- 6. Gavrilakis, N., & Floros, C. (2021). The impact of heuristic and herding biases on portfolio construction and performance: the case of Greece. Review of Behavioral Finance, 14(3), 436-462.
- 7. Gupta, S., & Shrivastava, M. (2022). Herding and loss aversion in stock markets: mediating role of fear of missing out in retail investors. International Journal of Emerging Markets, 17(7), 1720-1737.
- 8. Javed, H., Bagh, T., & Razzaq, S. (2017). Herding effects, over confidence, availability bias and representativeness as behavioral determinants of perceived investment performance: empirical evidence from Pakistan stock exchange (PSX). Journal of Global Economics, 6(1), 1-13.
- 9. Kumar, S., & Goyal, N. (2016). Evidence on rationality and behavioural biases in investment decision making. Qualitative Research in Financial Markets, 8(4), 270-287.
- 10. Laungratanamas, K., & Nuangjamnong, C. International Journal of Advanced Multidisciplinary Research and Studies.
- 11. Madaan, G., & Singh, S. (2019). An analysis of behavioral biases in investment decision-making. International Journal of Financial Research, 10(4), 55-67.
- 12. Shukla, A., Rushdi, D. N. J., & Katiyar, D. R. C. (2020). Impact of behavioral biases on investment decisions 'a systematic review'. International Journal of Management, 11(4).
- Yadav, A., & Narayanan, G. B. (2021). Do personality traits predict biasedness while making investment decisions? International Journal of Accounting & Finance Review, 6(1), 19-33.
- Zahera, S. A., & Bansal, R. (2018). Do investors exhibit behavioral biases in investment decision making? A systematic review. Qualitative Research in Financial Markets, 10(2), 210-251.

Books:

- 1. Chandra, P. (2020). Behavioral Finance (2nd Ed.). India: McGraw Hill
- 2. 2. Ackert, L.F. & Deaves, R. (2012). Understanding Behavioral Finance: Cengage

Websites:

1. https://www.linkedin.com/pulse/6-tips-investors-overcome-behavioral-bias-danielkern