



Beginner Investors Behavior in Investment Decision Making

Fiola Finomia Honesty^(✉), Erly Mulyani, and Halkadri Fitra

Padang State University, Padang, Indonesia
fiola.honesty07@gmail.com

Abstract. Investment decision making is a complex process in investment and influenced by many factors. One of them are accounting information. Accounting information has a beneficial value to investors in investment decisions. However, rather than consider accounting information, investor psychology be the underlying factors for the investor in making investment decision. This study aims to determine and analyze the psychological factor determining investment decisions by beginner investors on the Indonesia Stock Exchange (BEI) in West Sumatera. The aims of this study is to analyze and examine: 1) the effect of risk perception, problem framing and information asymmetry on investment decisions. The results shows that only risk perception had the positive correlation with investment decision in capital market, while problem framing and information asymmetry had no relation to investment decisions.

Keywords: investor behavior · risk perception · problem framing · information asymmetry · investment decision · capital market

1 Introduction

Investment is an interesting topic of discussion, especially investment in the capital market. Rapid economic growth drives the society to be consumptive and encourage people's enthusiasm in doing investment in order to obtain high return in order to fulfill their needs. In general, people invest with the aim of getting a high return accordance with what is expected.

The number of people who entered the stock market rose very high in 2021. Based on OJK data there are 7.4 million investors in stock market, mainly retail investors, many of them are young people, millennials, gen z [1]. These young investors are tended to do investment decision based on their psychological factor rather than using traditional method which are technical and fundamental analysis [2].

There are several factors determining financial decisions. One of them comes from individual psychological factors or emotions. Emotions or the power of psychological bias can make investors ignore negative things about something they already know. For example, there is a feeling that investors are very aware of a stock or are emotionally attached to a company's stock and do not make changes even though the company is experiencing difficulties. Due to the inability of traditional financial theories to explain

the persistence of many patterns in financial markets, many new theories have been developed to understand these patterns. These theories are in the form of theories concerning the biases of human psychology and in general these theories are grouped in the study of behavioral finance.

Behavioral Finance is a theory that focuses on the psychological influence of investors in making financial decisions and market investors sometimes make decisions when market conditions are full of uncertainty. The behavioral finance concept considers different types of investors in view of the risks associated with investment decisions. Bailard, Biehl & Kaiser (an investment institution in California, United States) said that there are basically five kinds of investors in the capital market, known as the Five-Way Model (Thomas & Rajendran, 2012) [3]. These groups are divided into several categories, namely risk takers consisting of adventurers and celebrities; risk averse consisting of individualists and guardians; and groups that cannot be assigned to any of the four groups (straight arrows).

While various empirical evidences have been obtained that framing can cause behavioral differences in decision making. [4] explains the framing effect phenomenon through prospect theory which states that the framing adopted by managers can influence the decisions they make. The manager processes the information he receives into a decision on a problem based on the adopted framing. (Susanto, 2011) [4] in his research has proven the ability of the framing effect in manipulating the risk tendencies of decision making. When decision alternatives are framed positively, the group will tend to avoid risk than individuals, and when decision alternatives are framed negatively, the group will tend to take risks when compared to individuals.

Companies that have presented quality financial reports can easily find out the company's performance. The low information asymmetry means that the financial statements have been presented in a quality manner so that there is no information imbalance. The smaller the difference in information means that the shareholders have carried out effective supervision of the performance carried out by the company's management. The company's management has received direct monitoring from shareholders so that the financial statements presented are of higher quality.

Therefore, the researcher sees the need to do research on the influence of psychological factors, namely risk perception, framing problems and information asymmetry on the interest of beginner investors to invest in the stock market.

1.1 Literature Review

1.1.1 Behavioral Finance

Behavioral Finance is a theory that has been studied since 1950. Basically, behavioral finance is a theory that focuses on impact psychology of investors in making financial decisions, and sometimes create uncertainty when observing market conditions. Behavioral Finance is behavior that a person manages and applies in finance. Behavioral finance is the study of how psychology affects finance. Psychology is the basis of desires, goals, and motivations human and that is also the basis for various human errors stems from a ceptual illusion, too confident, too dependent on the rules practical, and emotional [3].

In Behavioral finance, nature, emotions, and preferences are very influential in determining actions, especially temporary decisions. Personal interests have a major impact on

financial management, which in turn affects investors' investment decisions. In making investment decisions, Behavioral finance relates to psychological factors of investors, such as the anxiety and fear of investors when making decisions because a decision must be taken quickly and accurately, because if one decides, the opportunity to obtain an expected and targeted profit will be lost. Psychological factors of an investor can make investors take actions that tend to be unpredictable and irrational which results in investment decisions being taken based on emotions, nature and knowledge that make an investor overconfident.

1.1.2 Prospect Theory

Prospect theory is a theory declared by Kahneman and Tversky in 1979 [4] which explains how a human decides in a situation where the outcome cannot be predicted. In this prospect theory it is emphasized that someone often acts irrationally under risk and uncertainty, because psychological factors and uncertain behavior will affect a person in choosing rational decisions [5].

This prospect theory has something to do with the idea that a person does not always have a rational disposition. This theory asserts that there will be a bias that is always motivated by psychological factors that will influence a person's decision in an uncertain situation. The purchase decision made by an investor is not only based on rational considerations, but is also influenced by emotional factors [6].

1.1.3 Investment Decision

An investment decision is defined as a decision taken in investing to gain profits in the future [7]. Investment decisions are based on the expected rate of return, level of risk and the relationship between return and risk. Return or so-called profit is the main reason for people to invest. The desire to get a return is a natural thing expected by investors for the funds they have invested. However, there are several important things that investors must pay attention to, how much risk investors will face from the investment. In general, the higher the expected return, the greater the risk level [8]. Investment has a goal to achieve the desired expectations. In addition, investment is also able to reduce the impact of inflation which continues to occur every year [9].

1.1.4 Risk Perception

Risk perception is a vision in understanding individual objects such as events through the five senses obtained from observing objects and circumstances that can cause events and interpreting them. Anxiety is closely related to the perception of risk. Anxiety occurs when individuals feel they will be faced with a dangerous situation. The term risk refers more to the probability of a hazard occurring [10]. Risk perception can be subjective and functional, so that deviations from the perceptions of others can occur. The object of investment risk is understood, namely the deviation from the expected profit. If there is uncertainty, this means that investors will receive future returns, the value of which is not yet known. Risk is the deviation of the actual return received from the expected into investment theory where the more the risk, the higher the profit return and vice versa.

Tolerance to financial risk is something that needs to be considered when making the right to the aspects to be taken in an investor's investment.

If someone has a high level of risk perception, they will be careful in making investment decisions, while someone who has a low level of risk perception will be brave in making decisions because they already have quite a lot of experience in investing [6]. Aren & Zengin (2016) [11] argue that risk perception affects individual investment preferences. Based on this, the following hypotheses can be proposed:

H1: Risk perception influences beginner investor in investment decisions.

1.1.5 Information Asymmetry

Information asymmetry is a condition in which managers more access about company condition or prospect rather than other party including owner or investor. It's allowing conflicts that occur between principals and agents to try to take advantage of each other for their own interests. Companies should investigate the impact of information asymmetry, corporate differences in business decision making. This examination also seeks to consider suggestions for leading exploration of the current bookkeeping information capacity and advice in making investment decisions in companies.

The discretion of management in making an investment decision will have an impact on the level of profit that will be obtained by the company, because if the company's management has a narrow investment decision, there will be a lot of risk that will be obtained by the company so that the profits obtained by the company are not optimal. There are previous studies that support the effect of information asymmetry on investment decisions, are research from Hunjra (2016) [12]. The results of research show that information asymmetry has a positive influence on investment decisions. Based on this, the following hypotheses can be proposed:

H2: Information Asymmetry influences beginner investor in investment decisions.

1.1.6 Problem Framing

Problem framing are one of the reasons which affects the bias in decisions making. Information is presented (framed) on decision makers can influence the types of decisions taken. Framing affects investment decision as person who given framing treatment usually reach differently compared to others who has not given the treatment [13]. Mital & Ross (1998) [14] found that information framing had a different effect on interpretation of an issue. Research by Susanto found information framing has an influence on investment decision making [14].

Based on this, the following hypotheses can be proposed:

H3: Problem framing influences beginner investor in investment decisions.

2 Methods

This research is quantitative research, using method of causal research aims to determine the causal relationship of things. The population in this study are all people who is beginner investor in West Sumatera area.

The sampling method used in this research is nonprobability sampling, a sampling method that does not provide same or equal opportunities for everyone in the population to be selected as a sample (Syahrums and Salim, 2012: 115) [15] Meanwhile, technique the sampling used in this research is purposive sampling. The sample criteria in this study are individual stock investors who manage their own investment portfolios and has made a share sale and purchase transaction on the Indonesia Stock Exchange.

There are 4 variables that are used as variables research instrument. The variable consists of the independent variable and the dependent variable as following.

1. The independent variable is Risk Perception (X1), Information Asymmetry (X2) and Problem Framing (X3)
2. The dependent variable is Investment Decision (Y)

3 Results

3.1 Validity Test

The validity test used to test the correctness or the validity of questioners which given to respondent. The steps taken to test the validity are by adding up each question being tested. After that, it can be seen the validity if each item of questioners. Testing the validity of each item used item analysis, which correlated the score of each item with the total score which is the sum of the item scores. An instrument is said to be valid if it has a significance level of error (alpha) below 0.05.

3.2 Reliability Test

Reliability is a tool to measure a questionnaire which is an indicator of a variable or construct [16]. The reliability test on the Likert scale was carried out by processing the data in SPSS. The test results show that all items in each variable with a Likert scale on 67 respondents have a Cronbach's Alpha value > 0.70 . In accordance with Ghozali (2016:48) [16] that if the Cronbach's Alpha value > 0.70 then the variable is declared reliable.

3.3 Coefficient of Determination

In the table of determination coefficient test results above, it can be seen that R Square (R^2) is 0.240. This shows that the independent variables of risk perception, framing problems, and information asymmetry can only explain 24% of the dependent variable of investment decisions. While the remaining 76% ($100\% - 24\%$) is influenced by other variables not included in this study.

Model Summary					
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.583a	.240	.186	.38109	2.103

a. Predictors: (Constant), RiskPerc, ProbFra, InfAsy. b. Dependent Variable: InvDec

3.4 F Test

Based on processed data, the F test value is 7,851 or greater than F table 3,35. So it can be concluded that problem framing, risk perception and problem framing together influence to the investor decision making.

3.5 Spearman Test

From the results of the normality test or data distribution, it was found that the data were distributed or not normally distributed. Therefore, the hypothesis testing was carried out with non-parametric test equipment. In this case, the hypothesis will be tested non-parametric, namely spearman test.

Correlations				
			PerpRes	KepInv
Spearman's rho	RiskPerc	Correlation Coefficient	1.000	.429**
		Sig. (2-tailed)	.	.001
		N	56	56
	InvDec	Correlation Coefficient	.429**	1.000
		Sig. (2-tailed)	.001	.
		N	56	56

** . Correlation is significant at the 0.01 level (2-tailed).

The table shows that the significance value of risk perception is 0.001. The value is below 0.05 so it can be concluded that the perception of risk has a positive and significant effect on investment decisions. The constant value of 0.429 means that for every 1 increase in investment decisions, the perception of risk increases by 0.001.

Correlations				
			ProbFra	InvDec
Spearman's rho	ProbFra	Correlation Coefficient	1.000	.199
		Sig. (2-tailed)	.	.141
		N	56	56
	InvDec	Correlation Coefficient	.199	1.000

(continued)

(continued)

Correlations			ProbFra	InvDec
		Sig. (2-tailed)	.141	.
		N	56	56

The table shows that the significance value of the problem framing variable is 0.141. This value is above 0.05 so it can be concluded that the framing problem has no significant effect on investment decisions.

Correlations			AsimInf	KepInv
Spearman's rho	InfAsy	Correlation Coefficient	1.000	.178
		Sig. (2-tailed)	.	.124
		N	56	56
	InvDec	Correlation Coefficient	.178	1.000
		Sig. (2-tailed)	.124	.
		N	56	56

The table shows that the significance value of the information asymmetry variable is 0.124. This value is above 0.05 so it can be concluded that the framing problem has no significant effect on investment decisions.

4 Discussion

Related to the exposure of the spearman test. Risk perception has positive significant effect to investment decisions. While problem framing and information asymmetry has no correlation to investment decision. Perception of risk affects investment decisions. The theoretical implications of this study support the Prospect Theory which is the basis for the theory of risk perception variables. Risk perception is explained through prospect theory which underlies that one does not always act according to financial theory standards under risk and certainty, one adds psychological factors and uncertain behavior for rational choices. The practical implication of the results of this study is that related parties need to pay attention to the level of risk perception of beginner investors so that they can make good and wise investment decisions. This is because the risk perception variable has a significant positive result for beginner investment decisions in West Sumatra.

On the other hand, the problem framing and information asymmetry is not determined beginner investor in investment decision making. The results of this study are in accordance with research conducted by Erlinda Kusuma Wardhani (2014) [17]. Respondent of the research are students of the 2010 and 2011 Accounting Education Department, Yogyakarta State University. This research stated that information framing has no effect

on investment decisions. Two things that can explain the emergence of this new finding are aspects of participants who are inexperienced, or have never experienced losses in stock trading transactions.

5 Conclusion

Based on the analysis obtained, the following conclusions can be drawn:

1. Risk perception has a positive effect on investment decisions. This means that the higher the individual's risk perception, the more daring they tend to make investment decisions because they like risky conditions. Uncertain conditions involving emotions, preferences, traits, and others
2. Problem framing has no effect to investment decisions.
3. Information asymmetry has no effect to investment decisions.

Limitations in this study, then some suggestions that can be recommended by researchers for further research is better, among others, as follows. (1) The study uses a sample of beginner investors. In future research it is hoped that it can be carried out on a wider range of respondents.

Acknowledgment. The authors would like to thank Lembaga Penelitian dan Pengabdian Masyarakat Universitas Negeri Padang for funding this work with a contract number: 628/UN35.13/LT/2021.

References

1. <https://market.bisnis.com/read/20220103/7/1484659/ini-tantangan-pasar-modal-tahun-2022-versi-presiden-jokowi>
2. idx.co.id
3. Rajendran, K., Aslanzadeh, S. and Taherzadeh, M.J. (2012) Household Biogas Digesters—A Review. *Energies*, 5, 2911-2942.
4. Kahneman, D., & Tversky, A. (1990). Prospect theory: An analysis of decision under risk. In P. K. Moser (Ed.), *Rationality in action: Contemporary approaches* (pp. 140–170). Cambridge University Press. (Reprinted from “*Econometrica*” 47 (1979), 263–91)
5. Pradikasari, Ellen. Yuyun Isbanah. (2018). “Pengaruh Financial Literacy, Illusion Of Control, Overconfidence, Risk Tolerance dan Risk Perception Terhadap Keputusan Investasi Pada Mahasiswa Di Kota Surabaya”. *Jurnal Ilmu Manajemen* 424–434
6. A. Taj, Saud.2016. Application of Signaling Theory in Management Research: Addressing Major Gaps in Theory. *European Management Journal*. Glasgow Caledonian University, United Kingdom.
7. Ayu Wulandari, D., & Iramani, R. (2014). Studi Experienced Regret, Risk Tolerance, Overconfidence Dan Risk Perception Pada Pengambilan Keputusan Investasi. *Journal of Business and Banking*, 4(1), 55. <https://doi.org/10.14414/jbb.v4i1.293>
8. Eduardus Tandelilin, (2017). *Pasar Modal “Manajemen Portofolio dan Investasi”* (G. Sudibyoy (ed.)). Yogyakarta: PT. Kanisius.

9. Rahmayanti, A., Safitri, A.L., & Minata, F. (2021). Pengaruh Risiko, Return, dan Perekonomian Indonesia Terhadap Keputusan Berinvestasi Saham Saat Covid-19. *HUMANIS (Humanities, Management and Science Proceedings)*, 1 (2).
10. Denney, D. (2005). *Risk and Society*. London: Sage Publications
11. 12. Aren, S., & Zengin, A. N. (2016). Influence of Financial Literacy and Risk Perception on Choice of Investment. *Procedia - Social and Behavioral Sciences*. <https://doi.org/10.1016/j.sbspro.2016.11.047>
12. Hunjra, Ahmed Imran., Qureshi, Salman Ali., Riaz, Lubna. 2016. Psychological Factors and Investment Decision Making: A Confirmatory Factor Analysis. *Journal of Contemporary Management Sciences: Volume 2, Issue 1, Spring 2016*.
13. Suartana, I Wayan. (2010). *Akuntansi Keperilakuan Teori dan Implementasi*. Yogyakarta: Penerbit Andi
14. Andayani, N. S., Moeljadi, & Susanto, M. H. (2010). Pengaruh Variabel Internal dan Eksternal Perusahaan Terhadap Risiko Sistematis Saham Pada Kondisi Pasar yang Berbeda Wacana, 13(2), 244-259
15. Salim, Syahrums. 2012. *Metodologi Penelitian Kuantitatif*. Bandung. Cipta Pustaka.
16. Ghozali, Imam. 2016. *Aplikasi Analisis Multivariate Dengan Program IBM SPSS 23 (Edisi 8)*. Cetakan ke VIII. Semarang : Badan Penerbit Universitas Diponegoro
17. Wardani, Erlinda Kusuma dan Sukirno. (2014). "Pengaruh Framing Effect terhadap Keputusan Investasi dengan Locus of Control sebagai Variabel Pemoderasi". *Jurnal Nominal*. Vol. III No. 1 Tahun 2014. Universitas Negeri Yogyakarta.

Open Access This chapter is licensed under the terms of the Creative Commons Attribution-NonCommercial 4.0 International License (<http://creativecommons.org/licenses/by-nc/4.0/>), which permits any noncommercial use, sharing, adaptation, distribution and reproduction in any medium or format, as long as you give appropriate credit to the original author(s) and the source, provide a link to the Creative Commons license and indicate if changes were made.

The images or other third party material in this chapter are included in the chapter's Creative Commons license, unless indicated otherwise in a credit line to the material. If material is not included in the chapter's Creative Commons license and your intended use is not permitted by statutory regulation or exceeds the permitted use, you will need to obtain permission directly from the copyright holder.

