Investor Experience and Expectation towards Decision-Making Process

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Chou et al. (2010) examined the relationship between investment experience and risk propensity, risk propensity to risk perception. This study developed Chou et al. (2010) by adding testing on risk perception to return expectation and investment experience on return expectation. This research will test the effect of investment experience on risk propensity, risk propensity on risk perception, and investment experience on return expectation. This research contributes to the issues of investors' decision-making toward several factors such as risk propensity, risk perception, investor experience, and return expectation. The results showed that investment experience positively affects risk propensity, risk propensity negatively affects risk perception, and risk perception positively affects return expectation. The research found an indirect effect of risk perception to return expectation. This result is likely because individual investors trade more in the short-run than in the long-run. This trend strengthen because more individual investors prefer technical rather than fundamental analysis.

\textbf{Key words:} Investment Experience, Risk Propensity, Risk Perception, Return Expectation.

\textbf{JEL:} G11, D81

Research Background

Various factors are affecting investment. Losses and profits will provide a meaningful personal experience to investors, thus influencing their behaviour and attitudes towards the risks of financial products (Chou et al., 2010). The experience will change attitudes and behaviour, as well as making investment decisions in the future. Breckler & Wiggins (1989) explain that attitudes obtained through experience will influence subsequent behaviour. In this study, factors that show investor attitudes and behaviour are risk propensity and risk
perception. Risk propensity is a tendency towards specific risk, while risk perception is an assessment of decision-makers (investors) on the risks that exist in a particular situation (Sitkin & Pablo, 1992). Research on decision making can help investors objectively understand financial risks and able to evaluate investment instruments.

The study of behaviour finance states that investors are less likely to act rationally or consider all available information in their decision-making processes. Their irrational behaviour shows opposition to the traditional financial theory that previously considered investors as individuals who conducted investment valuations and rational decision making.

Kahneman and Tversky (1979) describe aspects of behaviour into the economy based on risk indicators. Kahneman and Tversky (1979) find that people seem irrational, and utility theory fails to explain the process of investment decision making. Prospect theory explains that a problem framing situation will determine a person's reaction to risk. Investors tend to protect the profits obtained previously in determining subsequent investment decisions. This argument shows that investors tend to be risk-averse. Staw, Sandelands and Dutton (1981) supported the argument and argued that a person with the possibility of loss would be defensive and risk-averse. Eric et al. (2015)' study shows that bank risk management decisions tend to engage in risk-taking behaviour because of limited analysis and human resource capabilities, and not just risk management techniques. Eric et al. (2015) show that the risk received by bank management increases; therefore, management tends to be risk-averse. However, Bedi and Kaur (2016) find that eagerness of the firm's top management as a decision-maker to exploit an environmental opportunity determines the risk-taking ability. The decision of risk-taking projects or opportunities will increase investor's risk propensity and accept riskier projects.

Osborn and Jackson (1988), and Thaler and Johnson (1990) oppose prospect theory arguments. They predict future risk behaviour and find that success in the past will encourage investors to take more risk. However, Bedi and Agarwal (2017) claim that the risk-taking propensity is not significantly associated with the age, size, type, and nature of a firm. Therefore, this research is crucial in determining risk propensity and investor decisions. Sitkin and Pablo (1992) also find different research results when testing the prospect theory. They developed a model based on theoretical analysis to provide other suggestions related to the contradiction. Sitkin and Pablo (1992) examine the risk propensity and risk perception issues in their role in supporting and counter-supporting arguments of prospect theory. Sitkin and Weingart (1995) examine the risk propensity and risk perception models as mediators to the influence of problem framing and outcome history on risky investment decision-making behaviour. Sitkin and Weingart (1995) conclude that mediation risk behaviour influences investment decisions. Dong et al. (2006) explain that irrational behaviour often occurs incorporate actions that involve an enormous investment value, for example, in a takeover or
acquisition of a company. Managers conducted firm acquisitions tend to be more risk-takers because of differences in their risk perception towards the target firm.

Byrne (2005) describes risk perception in investment decisions. The role of risk propensity and previous experience is also quite important. Experienced investors have a better evaluation of investment risk. Chou et al. (2010) evaluate risk attitudes towards investment instruments and estimate alternative sources of information such as the level of investor's optimism expectations. Through risk perception and risk propensity, which are mediators for attitudes, financial institutions can understand the influence of investor behaviour and return expectation.

Referring to Chou et al. (2010), investment experience in this study acts as an anchor, which is a benchmark of investor decision making. Risk propensity and risk perception show the attitude and behaviour of investors based on previous investment experience, whereas the return expectation of financial instruments reflects the decision making of investors on the selected investment. This research will test the effect of investment experience on risk propensity, risk propensity on risk perception and investment experience on return expectation.

**Literature Review**

**Risk Propensity**

According to Sitkin and Pablo (1992), risk propensity is an individual characteristic that influences risk behaviour and is conceptualised as a tendency to take risks. Furthermore, Markowitz (2010) defines risk tolerance as several risks accepted by individuals to achieve a goal. The definition indicates questions such as: "Indicate your feelings or preferences while investing in financial instruments X according to the level of risk." Possible answers to these questions are: "very dislike, rather dislike, like, or like it very much."

Wong (2005) defines risk propensity as the tendency of decision-makers to avoid or take risks. Individuals have different risk-taking behaviours. More mature decision-makers in terms of seniority and age have a lower risk propensity compared to young decision-makers, so they are risk-averse. Thus, high-risk propensity individuals are more risk-seeking, while lower risk propensity individuals are more risk-averse.

The risk behaviour determinant model proposed by Sitkin and Pablo (1992) explains that a person's risk propensity determines risk preferences, inertia, and outcome history. Furthermore, Sitkin and Weingart (1995) argue that risk propensity persists simultaneously and can change over time as a result of previous experiences. Richards et al. (1997) support
this statement by stating that risk propensity can change as a result of the learning process. Richards et al. (1997) also mention that when knowledge increases, their willingness to accept a higher level of risk also increases. This statement contradicts the traditional concept of risk, which states that risk propensity is permanent, constant, inherent, and not influenced by surrounding conditions (Richards et al., 1997). Weber, Blais and Betz (2002) state risk attitude as a construct to distinguish stable and unchanged individuals even though with different stimuli or contexts. Besides, Antony, Lin and Xu (2001) show that risk is relatively stable and unaffected by the situation or surrounding environment. Bedi and Kaur (2016) argue that managers would take higher risks to exploit business opportunities that give higher returns. Bedi and Agarwal (2017) further discuss the effect of age, size, type, and nature of business on risk propensity. Their result shows no significant effect of age, size, type, and nature of business on risk propensity. Markowitz (2010) suggests that distinguishing between risk tolerance or risk propensity and risk perception is important to understand risk. Risk is a word often heard and part of every decision-making process. The word is identified as a negative connotation, therefore usually avoided because it is an undesirable event. For example, there is a risk to collide with motorised vehicles when someone travels by motorbike.

**Risk Perception**

Perception is a process carried out by individuals in selecting, organising, and interpreting stimuli into meaningful and logical images. Risk perception is a subjective assessment possibility of an unexpected event and concern about the consequences. Peter and Ryan (1976) define perception of risk as a subjective loss assessment. Risk perceptions include evaluating the possible consequences of poor outcomes. Risk perception is a tool to assess individual tendencies towards risk. A person with the right level of perception towards risk means that he understands the risks he will experience (Sitkin & Pablo, 1992; Roszkowski & Davey, 2010).

Risk perception, according to Sitkin and Pablo (1992), is an assessment of decision-makers on the risks that exist in a situation. The previous studies such as Douglas (1985), Dutton and Jackson (1987), and Vlek and Stalen (1980) have a consistent definition of risk perception with Sitkin and Pablo (1992). An example question of risk perception is "Indicate how risky you are in seeing investment X." Possible answers are "not too risky, somewhat risky, risky, and high risk" (Markowitz, 2010).

According to Sitkin and Weingart (1995), the assessment of risk reflects the degree to which a person considers a situation as negative, as a threat, and is out of control. Weber and
Milliman (1997) state risk perception as the main factor causing changes in behaviour in betting because a person's risk preference or risk attitude is stable.

In the ideal case, one must fully understand the risks they will face before planning with probabilistic results. In most cases, extensive experimental evidence is not available. Therefore, individuals depend on their probabilistic and subjective judgment. The assessment is not always accurate and sometimes systematically biased. Proper analysis of the nature and level of bias is hampered by a lack of data, especially the data of individual probability assessment and the actual risks.

**Investment Experience**

The failure and success of investors in investing can provide personal experience and influence future decision making. Nofsinger (2006, p. 33) explains that people tend to use the results that occur in previous events as a factor in evaluating current risk decisions. Investors will want to take greater risks after making a profit and prefer less risk after receiving a loss. House-money effects occur when a person gains experience in the form of profits, so they are willing to take more risks. On the other hand, after experiencing financial losses, a person will have a lower desire to take risks, which is called a snake-bite effect or risk-aversion effect. Thus, when experiencing a loss, people often feel they will continue to experience misfortune. Therefore, they avoid risk.

Sitkinand and Weingart (1995) show that successful or unsuccessful outcomes define outcome history as the degree to which decision-makers believe that previous decisions related to risk. This variable reflects the overall mentality of the individual that represents how well he is satisfied in a situation similar to his previous experience. In this study, successful investment events are the profits obtained by investors, while investment failures are losses experienced by investors.

Osborn and Jackson (1988), Thaler and Johnson (1990), and Sitkinand and Weingart (1995) argue that success or failure of investment affects how decision-makers assess risky situations and determine their actions. Thus, the events that occurred before will affect the tendency of decision-makers to take risks. Chou et al. (2010) state that prior investment experience and investor expertise will provide awareness of risk and become important factors for risk assessment in the future. Investment experience is an important factor that influences behaviour and is an anchor effect or anchor value.
Return Expectation

The investment procedure includes a basic understanding of the decision process and how to organise investment activities. To understand the investment process, an investor must first know the basic concept as a foundation in every stage of making investment decisions. The fundamental factor in the investment decision process is to understand the relationship between the expected return and the risk of an investment. The relationship between expected return and risk is direct and linear. The higher the expected return, the higher the level of considerable risk. The relationship between risk and return will justify the argument that not all investors will invest in assets that offer the highest level of return because investors must consider the level of risk while paying attention to high returns.

In investment decision making, investors must distinguish between expected return and actual return. Return expectations are the level of return that investors anticipate in the future, while the return obtained is an actual return. The expected return and actual return may differ due to investment risks. Investors will be reluctant to uncertainty or risk-averse, which considers an assumption of rational investors. Risk-averse investors will invest if the expected return is higher than risk. However, in practice, not all investors are risk-averse. There are moderately risk seeking individuals. A moderate risk will accept the risk when return expectations are satisfactory, while the risk seeker will invest in high-risk financial instruments. These attitudes tend to lead to irrational patterns or possibilities for emotionality. According to Chou et al. (2010), traditional financial concepts stated that investors are risk-averse. Therefore, high risk must compensate with higher returns. Muradoglu (2005) explains that professional traders support a positive relationship between risk and return. However, novice traders and investors with low ability feel that the expected return is negatively related to risk. Research by Chou et al. (2010) examines decision-making behaviour proxies in return expectation and portfolio formation process. Based on Chou et al. (2010) finding, this research argues that investment decision making represents the return expectation of investors compared to the number of funds.

Investment Experience affects Risk Propensity


Byrne (2005) suggests that historical outcome is the predictor variable in which a positive outcome in previous events will lead to a higher risk tendency. Therefore, investment
experience affects future investment behaviour. Research conducted by Chou et al. (2010) also uses a research framework of Sitkin and Weingart (1995). The sample was Taiwanese investors. Investors' experience is positively related to investor risk trends.

**H1:** Investment experience positively affects risk propensity.

**Risk Propensity affects Risk Perception**

According to Sitkin and Pablo (1992), risk propensity influences perceive risk. Sitkin and Weingart (1995) find that risk propensity is negatively related to risk perception. If a person's tendency to take risks is higher, an individual's perception of risk is lower. These results are supported by Wong (2005), Byrne (2005) and Chou et al. (2010). Byrne (2005) uses Sitkin and Weingart's (1995) risk-taking model as a research framework. The study finds that risk propensity negatively affects risk perception. Chou et al. (2010) find that the tendency of risk is negatively related to risk perception.

**H2:** Risk propensity negatively affects risk perception.

**Risk Perception affects Return Expectation**

Wong (2005) states that risk perception influences the outcome expectancy because of the following reasons: (a) A person with high trust will lead to positive results. Their expectation is high, while the risk is stable; (b) Differences of personal tendencies among investors, investment style and the level of risk awareness. The argument makes investors unique.

Behaviour finance explains that investors with lower risk perception will need high return expectations. The existence of a condition in which a person suffers an overly optimistic attitude towards investment will lead to an overestimation of the expected return. Sitkin and Weingart (1995) find that risk perception is negatively related to decision making. The study also examines the mediating effects of risk propensity and risk perception. The test results show risk propensity mediates historical outcome with decision making and mediates the relationship between the historical outcome and risk perception. Besides, risk perceptions mediate the relationship between risk tendencies and decision-making. Chou et al. (2010) state that risk perception positively affects the expected rate of return. Data processing shows that investor risk perception negatively affects return expectations. The result contradicts with risk-return trade-off in traditional financial theory. Also, the results contradict Byrne (2005)'s research, which states that risk perception positively affects return.

**H3:** Risk perception positively affects return expectations.
**Investment Experience affects Return Expectation**

In practice, individuals also use psychological factors in determining the rate of return they expect, for example, using experience and ability in previous investments as a benchmark (Nofsinger, 2006). The higher level of optimism and confidence will increase the expected rate of return.

Byrne (2005) finds that individuals with investment experience will undergo a positive relationship with the assessment of returns on specific risks. Chou et al. (2010) show that previous investment experience is positively related to return expectation. The result explains the level of excessive confidence and optimism when making investment decisions, consistent with behavioural finance theory.

**H₀:** Investment experience positively affects return expectations.

**Research Methods**

The sample was obtained directly through questionnaires, which distribute to respondents (investors) who invested in several financial instruments. The population is individual investors that invest in the Indonesian Capital Market. This research used the Line group and WhatsApp group of individual investors to distribute questionnaires through on-line. This research obtained 497 filled questionnaires as a research sample.

**Research Variables**

**Investment Experience Variable**

The investment experience is a response from investors to their knowledge, abilities, and practices of their judgment. The experience of success and failure in the past will influence their judgment about their ability to invest.

Investment experience indicators were adapted from Chou et al. (2010) and Byrne (2005). Investment experience proxies were investment knowledge and experience of success or failure. Indicators for investment experience included the adequacy of knowledge about financial management, ability, and opportunity to invest, and the success story of investment. Investment experience indicators (X₁) were measured with 1 Likert scale (strongly disagree) - 5 (strongly agree).
**Risk Propensity and Risk Perception Variables**

According to Byrne (2005), risk propensity describes the possibility of interest in specific activities. Risk propensity was measured with the value of investments in specific financial products. If the amount of funds is substantial, then investors will take risks to lose a certain amount of money.

The indicators used to measure risk propensity were adapted from Byrne (2005) and Chou et al. (2010). All risk propensity indicators used Likert 1 scale (strongly dislike) - 5 (truly like). Risk propensity is investors' subjective opinions towards risk, which include:

a. Use daily wages/income to buy lottery tickets or place them on sports bets (soccer, boxing, horse-racing, etc.).
b. Lend money to friends whose amount is equal to 1 month's income.
c. Invest 10% of your annual income in highly speculative stocks.
d. Invest 10% of your annual income in government bonds.
e. Invest in high-risk businesses that have good and profitable prospects.
f. Gambling using weekly income.
g. Work to get income exclusively based on commission.

Risk perception is defined as an assessment of decision-makers from the risks contained in specific situations (Sitkin & Pablo, 1992). According to Sitkin and Weingart (1995), these assessments reflect the extent to which individuals perceive a particular situation as negative, a threat, and out of control condition. People with high-risk perceptions will be risk-averse or prefer to avoid risk. Risk perception indicators used a Likert one scale (not too risky) - 5 (very risky).

**Return Expectation Variable**

Investors will certainly expect a return that is following the amount of investment they spend and worth the risk. This study assesses return expectations of investors based on Byrne (2005) ’s and Chou et al. (2010) 's questionnaires, where investors will give an option equal to their expected return. An example of the question is the amount you expect to return in the next three years assuming you have Rp. 300,000,000 to invest. The answer choices are (a) less than two hundred million, (b) 2-3 hundred million, (c) 3-4 hundred million, (d) more than four hundred million. Options (a) has a score of 1, option (b) has a score of 2, option (c) has a score of 3, while option (d) has the highest score of 4.
Technique Analysis

Validity test was used to measure questionnaire validity, which can reveal the measurement of constructs. This research used Karl Pearson's product-moment correlation coefficient to test validity. The statement of items is valid if Pearson's r value greater than the critical value in table r-Pearson product-moment correlation (according to the degree of freedom and significance). Instrument validity determines the correlation between the scores of each item with the total score.

This study used Structural Equation Modelling (SEM) analysis techniques to determine the effect of exogenous variables on endogenous variables and endogenous variables to other endogenous. SEM can help analyse relationships and influences of variables in a complex manner with multiple variables. SEM data analysis techniques were used not to design theory, but to examine and justify a model. Therefore, SEM were used to construct a hypothetical model consisting of a measurement model and a structural model in the form of theoretical justified path diagram. CR values were used to test the hypothesis (CR value produced by each equation). If the probability of test results is > 0.05; if CR <1.96 or CR> -1.96, then the hypothesis is rejected. The hypothesis holds if the probability of test results is <0.05; if CR> 1.96 or CR <-1.96.

Result and Discussion

Respondents' Characteristics

The characteristics of respondents based on demographic factors are gender, marital status, age, final education, employment, and monthly income. Four hundred ninety-seven questionnaires are valid. Male respondents are 348 people or 70%, while female respondents are 149 (30%). Furthermore, based on marital status, there are 273 or 55% of married respondents, and 224 people are single (45%). There are no widower or widow respondents. Based on respondent age, one respondent (0.2%) was under 20 years old, 272 (55%) respondents had the age between 21-30 years, 124 (25%) respondents were between 31-40 years, 70 (14%) respondents were between 41-50 years, and 30 (6%) were above 50 years of age. Furthermore, the distribution of respondents based on the level of education showed respondents with high school or equivalent were 54 respondents (11%) and Diploma as many as 30 respondents (6%) whereas 378 and 35 respondents had taken Bachelor and Postgraduate programs, with the proportion of 76% and 7% respectively.

Based on the risk classification, the average respondent is moderate risk-taking. Classification of respondents in answering the tendency towards risk justified the result. The
average value risk propensity (tendency in risk-taking) shows a value of 2.53, which belongs to the moderate category.

**Validity and Reliability Test**

This study uses the Pearson product-moment correlation to determine the questionnaire validity index. There are four variables, including investment experience, risk perception, risk propensity, and return expectation. All questions in revealing investment experience variables declared valid because all correlation coefficients of questions have a value of more than 0.159 or can measure investment experience variables.

One question in revealing the risk propensity declared as invalid because the fourth question item correlation coefficient has a value of less than 0.159, while the other six indicators declared valid to measure risk propensity variables. The second risk perception indicator declared invalid because of the correlation coefficient with a value of less than 0.159 (unable to measure the risk perception variable). The alpha coefficient for validity and reliability test is 0.449. Therefore, it is necessary to re-validate the test. In subsequent tests, invalid indicators excluded.

The first and sixth risk perception indicators declared invalid because of the correlation coefficient with a value of less than 0.159 (unable to measure the risk perception variable). The validity test showed an alpha coefficient of 0.476; it is necessary to test the validity again, which includes only valid indicators. From the third stage validity test, there are four questions revealing the risk perception variable, which declared valid with a correlation coefficient value of more than 0.159 or can measure the risk perception variable. All indicators used in the return expectation variables have a correlation coefficient with values above 0.159. Thus, all indicators in this variable are valid and able to measure return expectations.

Reliability tests show the ability of instruments to measure consistently. Cronbach's alpha is used to measure consistency. According to Malhotra (1999), the measurement item is reliable if an alpha coefficient is greater than 0.6. The measurement items on each indicator are reliable.

**The Goodness of Fit, Validity and Reliability Construct**

The estimation results of the Maximum Likelihood with GFI gives a perfect fit suitability index, but the probability shows low value. Based on the principle of parsimony, if there are one or two fit criteria for the model, the model declared as fit. Based on the suitability index,
it is concluded that the measurement model in the proposed exogenous construct fits, and there is no need to eliminate indicators from latent variables.

The GFI, NFI, and CFI criteria provide a suitability index that matches the cut-off standard, but the probability, CMINDF, AGFI, RMSEA, RMR, and TLI show values less than 0.90. Thus, the measurement model in the proposed endogenous construct is fit and there is unnecessary to eliminate indicators from latent variables. None of the criteria provides a suitability index above the cut-off standard. The conformity index shows that measurement model on the endogenous construct proposed is unfit, and it is necessary to eliminate the indicator from the latent variable. The elimination of indicators that have a low standardised regression estimation value consists of the first, second and fourth return expectation latent variables. The criteria for GFI, AGFI, TLI, NFI and CFI provide a suitability index that matches the cut-off standard, but the probability of CMINDF, RMSEA, and RMR shows low value. The results of the suitability index indicate that the measurement model on the proposed endogenous construct is fit.

Validity testing with SEM has two tests, namely convergent validity and discriminant validity. Convergent validity test uses CR> 2 (Standard Error) cut off. If the CR (critical ratio) value is greater than twice S.E., then the indicator is valid. The construct validity test concludes that all indicators fulfil convergent validity requirements. Thus, all indicators are part of the construct and able to use for structural model tests. Discriminant validity implemented to justify that the scale used does not have two constructs that measure the same phenomenon. Discriminant validity measures through the correlation between constructs, which must be more than 0.90. If the correlation between constructs reaches 0.90 or more, there is multicollinearity between constructs. The test results show that all latent constructs have high-reliability values and above the cut-off value of 0.70. Thus, all latent constructs have good reliability.

This research uses confirmatory factor analysis, which allows the researcher to test the hypothesis that a relationship between the observed variables and their underlying latent factor(s)/ construct(s) exists, whereas Exploratory Factor Analysis requires researchers to decide how to conduct the analysis. In addition to calculating construct reliability, variance extracted is also considered because, in confirmatory factor analysis, the average percentage of extracted variance values between indicators (a set of latent constructs) is a summary of convergent indicators. The calculation results show that the latent risk propensity and risk perception construct does not meet the criteria of AVE> 0.50 while investment experience and return expectation have a value of AVE> 0.50. Thus, investment experience and return expectations have valid extracted variance values.
Structural Model

Figure 1. Modified structural model

The first stage in the structural stage is the suitability evaluation of the model. Suitability of the model is the degree of conformity of estimation results with matrix input from research data. If the conformity testing of the model does not meet the requirements, then modifications are made.

The calculation results show that only CMINDF, RMSEA and CFI have model suitability criteria of recommended limits or cut-offs. Thus, it is necessary to modify the model to improve the goodness of fit, for example correlating e6 and e7 (in the construct of risk propensity), e14 and e15 (in the construct of return expectation).
Table 1: Path coefficient value between Variables
This table shows the relationship between variables in the SEM model using standardised coefficient values

<table>
<thead>
<tr>
<th>Variables</th>
<th>Standardised Coefficient</th>
</tr>
</thead>
<tbody>
<tr>
<td>Investment Experience</td>
<td>Risk Propensity</td>
</tr>
<tr>
<td>Risk Propensity</td>
<td>Risk Perception</td>
</tr>
<tr>
<td>Risk Perception</td>
<td>Return Expectation</td>
</tr>
<tr>
<td>Investment Experience</td>
<td>Return Expectation</td>
</tr>
</tbody>
</table>

The results show that there are 4 model conformity index criteria that have a standard cut-off value, namely CMINDF index, RMSEA, CFI, and TLI. Whereas those who do not fulfil the assumption of model fit and have a value of less than 0.90 are chi-square index, probability level, RMR, and NFI. GFI and AGFI are in the marginal category because the value is close to 0.90. According to parsimony rules, if there are one or two fit criteria for the model, the model will declare fit.

The value of the path coefficient on the investment experience to risk propensity is 0.373. The result indicates that there is a positive relationship between investment experience and risk propensity. A positive sign indicates a unidirectional change. That is, if the investment experience is high, the level of risk propensity is high; otherwise, if the investment experience is low, the risk propensity level is low. The value of path coefficient from risk propensity to risk perception is -0.221, indicating that there is a negative relationship between risk propensity and risk perception. A negative sign indicates a change in the opposite direction where if the risk propensity is high, then the risk perception is low; otherwise, if risk propensity is low, then risk perception is high.

The path coefficient value at risk perception towards return expectation is 0.326, indicating that there is a positive relationship between risk Perception and Return Expectation. A positive sign indicates a unidirectional change. That is, if the Risk Perception is low, the Return Expectation of the investor is also low. In contrast, if the Risk Perception is high, the expected return on the investor for investment is also high.

The value of the path coefficient between investment experience and return expectation is -0.031. The result indicates that there is a negative relationship between investment experience and return expectation. Negative signs indicate changes in opposite directions, i.e., if the investment experience is high, the return expectation of investors is low, otherwise, if the investment experience is low, the return expectation of investors is high.
**Proved of Direct Hypothesis**

The next step is to test the hypothesis using the CR / -CR value and its probability. The parameter of the presence or absence of direct influence can be known based on the CR (critical ratio) value, which is to compare CR count with the standard CR 1.96. If the CR count > 1.96 or -CR counts < -1.96, there is a direct effect of exogenous variables on endogenous or endogenous to endogenous. Besides, to determine whether or not there is an influence of exogenous variables on endogenous and endogenous to endogenous, the provisions are used to compare the probability value with a level of significance $\alpha = 0.05$.

**Table 2:** Testing of direct effect hypothesis

This table shows the direct influence between research variables, according to the CR of each variable.

<table>
<thead>
<tr>
<th>Variable</th>
<th>CR table</th>
<th>Sig.</th>
<th>Note</th>
</tr>
</thead>
<tbody>
<tr>
<td>Investment Experience $\Rightarrow$ Risk Propensity</td>
<td>2.587</td>
<td>0.004</td>
<td>Significant</td>
</tr>
<tr>
<td>Risk Propensity   $\Rightarrow$ Risk Perception</td>
<td>-2.794</td>
<td>0.008</td>
<td>Significant</td>
</tr>
<tr>
<td>Risk Perception $\Rightarrow$ Return Expectation</td>
<td>2.235</td>
<td>0.018</td>
<td>Significant</td>
</tr>
<tr>
<td>Investment Experience   $\Rightarrow$ Return Expectation</td>
<td>-0.254</td>
<td>0.882</td>
<td>Insignificant</td>
</tr>
</tbody>
</table>

If the significance value is <0.05, then there is an effect of exogenous variables on endogenous and endogenous to endogenous. The parameter used as a reference is to compare the significance value calculated with the standard significance of 0.05 and to compare the calculated CR with the standard CR of 1.96. Table 2 shows results of hypothesis testing.

The CR value calculated for investment experience on risk propensity is 2.587, which has a value greater than 1.96. The significance level obtained is 0.004, which has a value smaller than 0.05. There is a significant direct influence of investment experience on risk propensity. Thus, the first hypothesis holds, which states that investment experience has a positive effect on risk propensity.

The value of CR for investment experience on risk propensity is -2.794 with significance level obtained is 0.008, which has a value smaller than 0.05. There is a significant direct effect of risk propensity on risk perception. Thus, the first hypothesis holds, which states that risk propensity harms risk perception.

The CR value for risk perception of the return expectation is 2.235, and the significance level obtained is 0.018. There is a significant direct effect of risk perception on return expectation. Thus, the first hypothesis holds, which states that risk perception has a positive effect on return expectation.
The CR value for investment experience on risk propensity is -0.278, and the significance level is 0.781. There is no significant indirect effect of investment experience on return expectation. Thus, the first hypothesis is rejected, which states that investment experience has a positive effect on return expectation. There is no direct influence, so investment experience has an indirect influence on return expectation through risk propensity and risk perception.

The first hypothesis holds, which states that investment experience has a positive influence on risk propensity on investors. Hypothesis testing with path analysis produces a path coefficient of 0.373, and the higher the investment experience, the higher the risk propensity of investors. Based on the findings, traders and investors have great experience in investing. The experience is obtained from the financial sciences, and investment methods studied. The results obtained from investments affect the level of preferences for risk. The result indicates that investors who have quite high experience in investing tend to like risk. Chou et al. (2010) suggested that investment experience is an important factor that influences behaviour, in addition to the failure or success of previous investment experiences, which can affect investor tendencies to risk.

Experience can certainly influence how someone behaves in his life, especially in investing. Experience in the area of finance, investment, and success in investing will increase investor confidence. This confidence gives investors optimism, so optimistic investors will prefer risk and be more willing to take risks. This study states that investment experience has a significant positive effect on investors' tendency to risk. This finding supports the research conducted by Chou et al., (2010), showing that investors who have high investment experience have a high-risk propensity and tend to have characters who like risk.

The second hypothesis holds, which states that risk propensity has a significant negative influence on risk perception. Hypothesis testing through path analysis produces a path coefficient value of -0.221, that the higher the risk propensity, the lower the investor's risk perception. These findings support the research of Sitkinand and Weingart (1995) on risk decision-making behaviour, which states that someone who tends to like the risk is someone who likes challenges and wants to take high risks and expect a high return on investment so that their perception of risk is low. Research findings also support previous research by Byrne (2005) and Chou et al. (2010) which states that risk propensity has a negative influence on investors' risk perception.

The third hypothesis holds, which states that risk perception has a significant positive effect on investor return expectations. The value of path coefficient is 0.326, and risk perception has a positive influence on return expectation. These results are contrary to Chou et al. (2010) and Sitkinand and Weingart (1995), which show that risk perception harms return expectation. This is due to investor perceptions of risk, based on the view of the traditional finance Capital Asset Pricing Model, where investors are rational. Rational investors assume
that high risk will give a high return, while less risky investment will provide a low rate of return. They tend not to use their psychological aspects in determining the return expectation of an investment instrument.

The fourth hypothesis, which states that investment experience has a significant positive influence on investor return expectation, is rejected. The path coefficient value is -0.031, and investment experience has an insignificant negative influence on return expectation. The findings of this study contradict the research by Chou et al., (2010), Sitkinand and Weingart (1995) and Byrne (2005).

The limitation of this research is that investment experience is less likely to be used as an investor benchmark in determining the expected rate of return in the future, maybe because the experience of individual investors (as sample) is less supportive of the behaviour of investor towards risk propensity, risk perception, and return expectation. Whereas, in previous research, investors use their psychological aspects so that the investment experience influences return expectations. Thus, investors use their investment experience as a benchmark for future decision making. Future research should classify investors based on their experience and knowledge of investment to better understand the investment decision process. Nguyen et al. (2017) suggest that risk tolerance also plays an important role in risk perception. Future research should include risk tolerance as a variable affecting risk perception.

Conclusions

The practical implication of this research is that investment experience is important to encourage investors to be more aware of investment risks and determine investors' courage in bearing investment risks. Regulators and capital market players should develop regulations that support increased investment experience of investors so that investors can become smart investors.

Investment experience on risk propensity shows that the improvement of investor's ability will cause investors to prefer risk. The practical implication is that experienced investors who have high-risk investment, while novice investors are less willing to take high risks; this is following government advice that novice investors should invest in financial assets that are more predictable and have small investment value, and spread over several financial assets. The implication for management is experienced investors tend to prefer high-risk propensity for the sake of high return. Therefore, management should better classify investors based on their experience of investment and risk propensity towards higher returns. An investor with better experience will tend to invest in high-risk assets to achieve higher returns. Meanwhile,
management should be careful with novice investors and better guide them to form a stable portfolio of assets.

The academic implication is that future research should discuss the detail of investors’ classification and their investment decision concerning their risk propensity, risk perception, and return expectation. The risk experience of investors also should be divided into several categories because there is an insignificant effect of investor experience on return expectation. This result also suggests researchers should focus on the acceptable risk level within investors.
REFERENCES


