

## Financial Literacy as a Strategy for Mitigating Investment Risks Among Students at Kahuripan Kediri University

Rini Ratna Nafita Sari<sup>1\*</sup>, Tuwis Hariyani<sup>2</sup>, Chanda Nasifa Sari<sup>3</sup>

<sup>1,2,3</sup>Universitas Kahuripan Kediri

\*Email: riniratna@kahuripan.ac.id

### ABSTRACT

The low level of financial literacy in Indonesian society can endanger society, especially the millennial generation, because it makes it easy for the millennial generation to participate and become victims of fraudulent investments made by irresponsible individuals. The purpose of this study is to utilize and use an investment application based on digital investment for students so that it can make it easier for students to invest in financial instruments and also to know the level of risk that will be faced when starting to invest. The population of this study was all students of the S1 Study Program majoring in Management who took Investment Management and Portfolio courses in Kediri Regency. The sampling technique in this study used purposive sampling. In this study, a research sample of 39 students who were taking Investment Management courses was used. The data analysis method used in this study was descriptive qualitative, namely by creating a model of the use of digital investment (digital investment) from various investment instruments that provide an overview of the benefits that can be obtained and the risks faced. The results of the study showed that financial literacy through the use of applications greatly helped students in making digital investments because they could understand the use of the application and understand the level of risk of loss and the opportunity for profit that could be obtained in digital investment. In addition, students as investors are very interested in using investment models through digital investment applications because the method of use is very simple and easy to understand.

### INTRODUCTION

This research is motivated by the results of the National Survey on Financial Literacy and Inclusion (SNLIK) in 2022 which showed a financial literacy index of 49.68% and a financial inclusion index of 85.10% (ojk, 2022). Referring to Presidential Regulation Number 114 of 2020 concerning the National Financial Inclusion Strategy (SNKI), it is stipulated that Indonesia's financial inclusion target must reach 90 percent by 2024 (ojk, 2024). This means that there is still a gap of 40.32% from the supposed target. This shows that the Indonesian people in general still lack a good understanding of the characteristics of various financial products and services offered by formal financial services institutions (Dasra Viana et al., 2021). Whereas financial literacy is an important skill in the context of community empowerment, individual welfare, consumer protection, and increasing financial inclusion (OJK, 2021). Highlighted the dynamics of financial literacy among Generation Z and concluded that financial literacy affect the self-efficacy among GenZ. They must manage their finances and participate in the nation's development (Khan et al., 2024). The knowledge and skills students acquire while attending university last a lifetime and aid them in making sensible decisions Otoritas Jasa Keuangan continues to improve the digital literacy of the Indonesian

people, especially to students as a digital native generation who have the advantage of understanding and adopting new technology quickly so as to increase the financial inclusion of the Indonesian people while still being able to mitigate the risks of digital financial implementation. In order to understand the risks and benefits associated with financial products, one of which is investment products, a minimum level of financial literacy is a must. Research reveals that the Financial Literacy variable has a positive and significant influence on the Investment Decision variable (Putri, Emilya Manik; Pradana, 2022). This is supported by findings which reveal that investment digital education and literacy programs play a role in increasing the number of investors so that it has a positive impact on Indonesia's national economy (Fathullaili Putri, 2023). Having a strong understanding of personal finance has a large and favorable impact on investment choices (Upayana Wiguna Eka Saputra dkk, 2023). A number of literature studies show that the digital economy has the potential to increase the number of jobs, increase productivity through various efficiencies created, have a direct or indirect impact on economic growth, bring disinflationary effects, reduce income and wealth gaps, drive the need for new taxation models, and increase cross-border trade and investment (Harahap et al., 2018).

The low level of financial literacy in Indonesian society can endanger the community, especially the millennial generation, because it makes it easy for the millennial generation to participate and become victims of fraudulent investments made by irresponsible individuals (Chairani, 2021). Other research show that how financial literacy can be used to teach university students about the effects of financial scams (Abdul Karim et al., 2023). So it is necessary to conduct further research to determine the risk management capabilities of investment students who need to have knowledge and understanding related to digital investment. Because the digital era is a condition of life or an era where all activities that support life have been facilitated by technology (Mujektahit et al., n.d.). **State of the art and novelty** in this research is that this research uses a different problem-solving approach from previous studies, namely in this study not only collecting data from secondary data or student opinions based on questionnaires but by conducting direct investment simulations based on Digital investment to be analyzed. Thus students will gain comprehensive knowledge and experience because they are directly involved in the Digital investment process, so that investment risk mitigation can be done based on the knowledge and experience gained. This perspective is in line with the implementation of development with the Digital Economy concept which needs to be supported by all parties. One of the knowledge about financial literacy is in the field of investment. In investment, investors will go through several steps to finally reach an investment decision. The first step, investors must have knowledge about the risks and benefits of the investment media that will be chosen. Investment risk itself is a deviation from the expected profit and investment risk is also a potential loss caused by the deviation of the expected rate of return.

losses caused by the deviation of the expected rate of return with the actual rate of return. Therefore it is important for someone before investment decision, especially in digital investment, needs to have broad financial literacy (Runis Makkulau, 2022). So based on this background, the problems to be studied can be formulated, namely:

1. What benefits do students (investors) get when they understand financial literacy based on digital investment?

2. Is the Digital Investment-based approach able to mitigate the investment risk of students as investors?

## **LITERATURE REVIEW AND HYPOTHESIS DEVELOPMENT**

### **Financial Literacy and Investment risk**

Financial literacy is an important issue that is considered by society in recent years. Day by day the global marketplace is increasingly risky and is becoming more vulnerable (D.A.T, 2020). On one hand, public and private sectors make efforts to raise the awareness of society on financial issues; on the other hand, researchers investigate the relationship between financial literacy and financial decision making. Financial literacy is different from education level. Various objective and subjective measures are utilized on measurement of financial literacy (Canikli & Aren, 2019). Financial literacy encompasses a comprehensive understanding of financial concepts and risks, as well as the acquisition of skills, motivation, and confidence necessary to apply this knowledge in making sound decisions across various financial scenarios (Azidzul et al., 2023). Financial literacy as measuring how individuals understand and use personal finance-related information (Huston, 2010). Financial literacy decreases cognitive biases and heuristics, significantly influencing investors' behavior in financial markets. Thus, there is a relationship between financial literacy and investment decisions. It further infers that bad investment selections/decisions are due to a lack of financial expertise (Kasoga, 2021). Various objective and subjective measures are utilized on measurement of financial literacy. Previous research showed that undergraduates' investment decisions were favorably and significantly impacted by knowledge with financial products. Financial abilities were the most important component when it came to the many aspects of financial literacy (Timalsina, 2021). Another important research about Influence of Financial Literacy and Risk Perception found that risk perception is also affected by financial literacy and gender (Aren & Zengin, 2016). When the individuals are more risk averse they are more likely to choose retirement plans relative to savings in order to attract more investments for capital market it needs to improve the financial literacy of individuals (Lasantha et al., 2019). Risk perception and level of financial literacy affect individuals' investment preferences (Aren & Zengin, 2016). Higher investment experiences and financial literacy will lead to greater risk tolerance and investors then have to choose risk investment securities to match with their high level of risk

tolerance experienced investors have a portfolio of good and bad experience. A wise investor learns from past experience to tackle risky situations and handle it properly. By the increased level of knowledge about financial information and the increased ability of analyzing that information, investors can improve the capacity to jump into risky investments for earning high returns by managing investment efficiently (Awais et al., 2016). According to Lusardi (2019) Students need financial skills perhaps more now than ever before. The reason being that the current developments in the financial market have focused renewed attention on the importance of people being both well informed about their financial options and discerning financial consumers—in short, being financially literate. Also, financial literacy can help to prepare consumers for tough financial times, by promoting strategies that mitigate risk such as accumulated savings, differentiating assets, and purchasing insurance. Financial literacy has typically related individuals' knowledge of economics and finance with their financial decisions related to savings, retirement planning, or portfolio choice (Lusardi, 2019).

Financial literacy and demographic characteristics of age, gender, education, and income levels are significant determinants of financial risk tolerance. In this regard, the improvements in the financial literacy of the individuals through various education programs will probably raise the demand of financial products with different risk (Bayar et al., 2020). In short that financial literacy can decrease the investment risk.

Financial literacy is divided into four aspects (Chen & Volpe, 1998), namely:

1. General personal finance knowledge
2. Saving and borrowing
3. Insurance
4. Investment

## **METHODS**

This research uses descriptive research data analysis techniques with a qualitative approach that is to model the use of digital investment in detail so that students can understand the use of the investment model and can increase students' real knowledge and experience in investing digital models that are ultimately able to mitigate investment risk. The research location was carried out at Kahuripan Kediri University. The sampling technique in this research is purposive sampling. Informants in this study were 39 students who took the Investment & Portfolio Management course. This study used the following data collection techniques:

- a. Analysis of digital investment by using various uses of digital investment instruments by analyzing the profit opportunities and risks faced.
- b. In-depth interviews, namely data collection by conducting questions and answers directly with informants to get reinforcement of information about how students understand investment after using the digital investment model. So that the data collection session is not only done once but 2 to 4 sessions.
- c. Observation  
Observation in qualitative research is an observation in which the researcher goes directly to the field to observe the behavior and activities of students as investors in making digital investment. In this case, it is in line with point b, namely observation carried out during data collection.
- d. Documentation  
In this study, document collection was carried out to check the truth or accuracy of information obtained through interviews and observations.

In fulfilling the validity of the data, triangulation is carried out both with sources and methods. Triangulation between sources is a method carried out by comparing data obtained from interviews from several research subjects. In addition to juxtaposing with theory, triangulation of sources.

## **RESULTS**

- a. Create of a Digital Investment Account

At this stage, students create digital investment accounts using the "profits anywhere" application. This application is a digital investment platform in the Indonesian capital market, with stocks as its investment instrument. It was developed by one of the securities

companies in the capital market, namely Sukor Securities. For students who have successfully created an account, they will log in to their account and start using the application. The next step after students create an account is to log in using their respective usernames and passwords that were created earlier. Once students log in, they will be directed to the dashboard menu, which consists of a collection of menus or tools, each with its own function. At this stage, students will choose a menu according to the objectives and functions in seeking information about the digital investment account that has been created. This menu has been created to cater to the needs of account users, making it easier to invest through the application anytime and anywhere as long as the investment trading hours are still open and there is internet connectivity available.

**b. Buying and Selling Investment Instruments**

At this stage, students begin to practice investing on digital applications by buying and selling investment instruments. The types of investment instruments refer to the types of stocks traded on the Indonesia Stock Exchange. (BEI). The activity of buying and selling investment instruments aims for students, as new investors, to understand how to transact investment instruments through digital applications. Based on the buy and sell menu for investment instruments in the digital application, students can directly carry out transactions for the purchase and sale of various traded investment instruments. For example, in the purchasing menu, a student as an investor can enter the type of company stock they wish to buy by inputting the number of shares and the price at which the shares will be purchased. In this menu, the amount of funds that will be spent will automatically be calculated based on the number of shares to be bought. Then, in the selling menu, its function is almost the same as the purchasing menu. In the sales menu, the stocks that the students will sell as investors will be displayed, specifically the stocks that have been purchased previously. In the sales menu, students can also input the price and the number of shares they wish to sell, and it will also show the amount of funds they will receive if the instrument is sold.

**c. Digital Investment Account Portfolio**

The student investment portfolio account menu shows the position of funds and investment instrument assets owned by the account holder. Additionally, the portfolio menu will display the level of profit or loss obtained from the purchase of investment instruments. Thus, the account holder will always be able to see account information related to funds and the amount of asset ownership. Based on the portfolio menu in the student digital investment account, information can be obtained regarding the amount of capital each account holder has to conduct transactions. In addition, this menu also displays the positions of the investment assets that have been owned, along with the level of profit or loss that has occurred based on market mechanisms. Assets owned by the account holder can be monitored at any time and can be traded as long as trading hours are still open.

**d. Deposit and Withdrawal of Funds**

At this stage, every digital investment account owner can either deposit funds or withdraw the available balance in their account. To make a deposit, the account owner must first transfer the desired amount of funds through the account number obtained when creating the account. After transferring the funds to the account, the account owner needs to log in to the application to confirm that they have made the transfer or deposit. If the transfer

is correct and confirmed, the funds will be credited to the digital investment account within a maximum of 2 hours after the deposit confirmation. After the deposit funds are credited, the account owner can also view the history of the deposit amounts that have been made. In addition to the process of depositing funds, account owners can also make withdrawals, specifying the amount to be withdrawn and the available balance in the account. Withdrawals can be made at any time as long as trading hours are still open. The balance that is withdrawn automatically will be credited to the personal account of the account owner no later than 2 hours after the account owner has confirmed the withdrawal of funds. In the fund withdrawal menu, account owners can also view the history of fund withdrawals from their investment accounts. The account balance that can be withdrawn is the balance that has been available for at least 2 days in the form of cash balance and not funds that have been or are being spent on investment instruments. If the account owner has funds from the sale of investment instruments, those funds can be withdrawn after 2 days (T+2).

e. Stop loss

This menu serves as a safety feature against the level of losses incurred as well as the level of profits obtained from a digital investment instrument. The Stop Loss menu functions to prevent account holders from incurring excessive capital losses. This occurs when the price of an investment instrument that has been purchased experiences a significant decline, necessitating a limit to prevent substantial losses in capital or balance. A feature set by investors to determine the lowest price limit for selling a stock with the aim of limiting losses, so that if the stock price movement touches the predetermined lowest price set by the investor, the system will automatically execute the order. (Execute Order)

f. Order Book

This menu provides information about one type of investment instrument stock that is traded. Account owners can choose one type of book or stock to buy or sell in order to view information about that stock. This menu displays the prices of the instrument, both the buying price and the selling price. In addition, this menu displays information about the transaction values that occur during the trading process in one day.

## DISCUSSION

From the results of observations and in-depth interviews, it was found that 30 out of 39 students who were informants felt that the financial literacy they gained through digital applications greatly assisted them in making investments and mitigating investment risks. This result is supported by findings that state that risk perception can be explained by personality and advanced financial literacy. Students not only learn to mitigate risks but also make them dare to take risks according to their abilities, this is in line with research results which show that financial knowledge and financial behavior directly and positively affect risk-taking propensity (Molina-García et al., 2023). By using digital applications, they can understand the level of risk as well as the potential gains that can be obtained from investing. Those who initially felt confused about investing due to a lack of literacy have shown a strong interest in becoming investors after understanding the rules of the game. In the investment application we used for this simulation, students can invest with a very affordable capital, which increases their interest in investing, especially in the capital market. This finding is supported by research results which show that financial literacy plays a remarkable role. Financial literacy

has an indirectly positive influence on participation in the financial market. The higher the financial literacy, the lower is the risk aversion. The lower the risk aversion, the higher is the participation in the financial market (Oehler et al., 2024). Students also expressed that investing through digital applications is very easy to understand, with comprehensive features that they can use to learn about investing in the capital market. This is in line with research findings that state that higher level of financial literacy leads to higher risk tolerance. Which can helps the investors to make diversified portfolio. A diversified portfolio can generate higher return to investors in comparison to undiversified portfolio. With the deep knowledge of financial products investor can take relevant and correct decision on time. Also the investor can handle the risky situation easily (Sharma, 2020). Other research also reveals show that financial literacy significantly influenced risk and time preferences of university students with low financial literacy. The study also found significant risk aversion and impatience on homogenous preference choices of students. Structural behavioural errors were significant for the risk preference and time preference tasks choices. An increase in financial literacy is associated with riskseeking and patient attitudes among university students (Mudzingiri, 2021). Financial interest has its greatest association at the medium-to-high range of risk tolerance, whereas financial literacy shows its greatest association at the lower range of risk tolerance (Hermansson & Jonsson, 2021).

## CONCLUSION

Based on the results of the research discussed earlier, the conclusions drawn include the following:

1. Financial literacy through the use of applications greatly assists students in making digital investments. Students, as account holders, can understand the use of these applications and can comprehend the level of risk of loss as well as the potential gains that can be obtained in digital investment.
2. Students, as investors, are very interested in using investment models through digital investment applications because the usage is very simple and easy to understand, and can be accessed anytime as long as there is internet connectivity and the transaction hours are still open. This can reduce investment risk. By improving student literacy, students will also understand investment risks, which ultimately enables them to comprehend what actions to take or avoid.

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