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The Influence of Financial Literacy, Risk Perception, and Digital Trading Platforms on Generation Z Investment Decisions in Surabaya

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A B S T R A C T
This study aims to analyze the influence of financial literacy, risk perception, and digital trading platforms on investment decisions of Generation Z. The research method used is a quantitative approach with multiple linear regression analysis based on data from 50 respondents. The results show that financial literacy has a positive and significant effect on investment decisions with a coefficient value of 1.518 and a significance of <0.001, which means that the higher a person's level of financial literacy, the better their investment decisions. Risk perception has a negative and significant effect with a coefficient of -0.522 and a significance of <0.001, indicating that the higher the risk perception, the lower a person's tendency to invest. Meanwhile, digital trading platforms have a positive and significant effect with a coefficient of 0.254 and a significance of <0.001, which means that the better the convenience and features of the digital platform, the more investment decisions are increased. Overall, this regression model shows that the combination of these three independent variables plays an important role in shaping Generation Z's investment decisions in the digital era

INTRODUCTION

Ideally, the younger generation is expected to possess adequate financial capabilities to make rational investment decisions and optimally utilize advances in digital technology. Generation Z, born between 1997 and 2012, represents a productive age group with substantial potential to contribute to national economic growth. According to data from Statistics Indonesia (Badan Pusat Statistik/BPS, 2023), this group comprises approximately 75 million people and constitutes the largest demographic segment in Indonesia. In Surabaya, this generation accounts for around 30% of the city's total population of approximately 3 million people (BPS, 2022). These conditions illustrate significant economic potential, particularly in the context of digital investment. However, for this potential to be realized, a strong understanding of financial literacy, risk perception, and the effective use of investment technology is required as a foundation for sound investment decision-making.

In reality, the level of investment participation among Generation Z remains relatively low and is not yet accompanied by adequate financial literacy. Based on a survey conducted by the Financial Services Authority (Otoritas Jasa Keuangan/OJK, 2023), the national financial literacy index has only reached 49.68%, still far below the target of 75%. In Surabaya, investment participation among young people reaches only 15% of the total youth population (Bank Indonesia, 2024), and their average financial literacy score is merely 38.5 out of 100 (OJK, 2023). A survey by Airlangga University (2024) also indicates that only 40% of Generation Z understand the basic concepts of investment risk and return. As a result, many novice investors experience losses, with 60% recording a decline in portfolio value within the first six months (Indonesia Central Securities Depository/KSEI, 2023). On the other hand, high risk perception also acts as a barrier to investment decision-making. Approximately 70% of young investors perceive the stock market as high-risk (OJK, 2023), and 55% of Generation Z in Surabaya avoid investing due to their experience with market fluctuations during the COVID-19 pandemic (Bank Indonesia, 2024). This condition highlights the gap between the economic potential of Generation Z and their readiness to face the dynamics of the digital financial market.

Various previous studies indicate that financial literacy, risk perception, and the use of digital platforms significantly influence investment decisions among the younger generation. Sari and Wulandari (2022) found that high financial literacy is positively correlated with rational investment decision-making. Nugroho and Suryanto (2023) emphasized that lower risk perception increases investment participation. Furthermore, technological advancements through digital trading platforms have been proven to expand investment access for young investors (Rahayu & Santoso, 2024; Aljanabi, 2025). However, most existing studies still focus on national-scale data or student populations rather than specific geographical contexts such as Surabaya. Therefore, there is a research gap in understanding how the interaction between financial literacy, risk perception, and digital platforms simultaneously affects the investment decisions of Generation Z in Surabaya.

This research is important because Generation Z serves as the backbone of Indonesia's digital economy and holds substantial future investment potential. Surabaya, as a metropolitan city with high economic dynamism, represents an ideal setting to examine the investment behavior of young people in the digital era. Based on BPS projections (2025), the economic investment potential of this group could reach IDR 50 trillion per year. A study by Tjahjono and Sari (2022) also shows that the synergy between financial literacy, risk perception, and the utilization of digital platforms can significantly increase investment participation among the younger generation. Therefore, this study aims to analyze the influence of these three factors on the investment decisions of Generation Z in Surabaya and to provide data-driven recommendations to support effective investment education and regulatory policies.

LITERATURE REVIEW

Financial Literacy

Financial literacy is an essential competency that determines an individual's ability to understand basic financial concepts and apply them to achieve long-term financial well-being. Lusardi and Mitchell (2014) emphasize that financial literacy not only includes understanding financial products but also encompasses the ability to manage financial resources effectively to support rational economic decision-making. In the context of the younger generation, this ability becomes increasingly relevant as it directly influences investment behavior and future financial planning.

Akims, Singh, and Nadeem (2023) explain that an adequate level of financial literacy enables individuals to conduct fundamental and technical analyses of investment instruments, leading to more logical and measurable decisions. Empirical research in Indonesia by Ulfah (2023) shows that financial literacy has a significant influence on students' investment decisions. These findings are reinforced by the study of Mutawally and Haryono (2021), which proves that the higher a person's financial literacy, the greater their tendency to invest intelligently and in a planned manner. Thus, financial literacy can be regarded as a key factor determining the quality of investment decisions, including among Generation Z, who are highly active in the digital sector.

Risk Perception

Risk perception represents the way individuals assess uncertainty or potential losses that may arise from investment decisions. Slovic (2010) asserts that risk perception is subjective, as it is influenced by experience, emotions, and an individual's level of knowledge. Aini and Lutfi (2019) state that risk perception is an important psychological factor that determines the extent to which a person is willing to make investment decisions.

Empirical evidence shows a significant relationship between risk perception and investment decisions. Aini and Lutfi (2019) found that individuals with high risk perception tend to avoid risky instruments, while research by Saputro and Lestari (2019) demonstrates that risk perception encourages caution among young investors. Meanwhile, Khairunnisa, Rini, and Wahyudi (2023) explain that although risk perception does not always function

as a strong moderating variable, it still plays an important role in shaping the investment behavior of young people, who tend to be impulsive toward digital trends. Overall, risk perception contributes significantly to investment decision-making patterns, where individuals with higher risk tolerance are more willing to make investment decisions that offer the potential for greater returns.

Digital Trading Platforms

Digital trading platforms are information technology–based systems that facilitate investors in conducting investment transactions online through digital devices. These systems offer various features such as ease of access, real-time market information, low transaction costs, and time efficiency. According to Aljanabi (2025), the development of digital technology has expanded the participation of retail investors, especially the younger generation, by enabling fast stock and mutual fund transactions without the involvement of conventional intermediaries.

Tahir and Danarsari (2023) found that the use of digital trading applications plays a role in moderating the relationship between behavioral bias and investment decisions. Meanwhile, Fitriyah and Rahmawati (2025) emphasize that digital platforms have a significant influence on the investment decisions of Generation Z through ease of access and the educational features provided. In Indonesia, the emergence of applications such as Bibit, Ajaib, and Bareksa has transformed the way people invest, with Generation Z being the most dominant users. Based on these findings, digital trading platforms can be viewed as external factors that strengthen the relationship between financial literacy and investment decisions. Ease of use, transaction speed, and the availability of investment information on digital platforms are key elements in shaping the investment behavior of the younger generation in Surabaya.

Investment Decision

An investment decision is the process of determining the allocation of funds across various financial instruments by considering potential returns and future risks. Horne and Wachowicz (2016) explain that investment decisions include the selection of investment instruments, the determination of the amount of funds to be invested, and the timing of investments in accordance with an individual's risk profile. Internal factors such as financial literacy and risk perception, as well as external factors such as technological advancement, also influence these decisions.

Azaria, Wulandari, and Susanti (2024) show that the investment decisions of Generation Z are strongly influenced by psychological factors and the ease of access to technology. This generation tends to choose investment instruments that are easily accessible, transparent, and capable of providing quick returns. Research by Malini (2024) also emphasizes that trust in digital platforms and the quality of information from social media play a major role in shaping the investment decisions of the younger generation. Therefore, investment decisions among Generation Z in the digital era can be understood as the result of the interaction between financial literacy, risk perception, and the utilization of technology through continuously evolving digital trading platforms.

RESEARCH METHODOLOGY

This study employs a quantitative approach with a causal associative design, aimed at analyzing the influence of financial literacy, risk perception, and digital trading platforms on investment decisions among Generation Z in Surabaya. The quantitative approach is chosen because it allows for the examination of relationships among variables through numerical data processed statistically. The causal associative design is used to identify the direction and magnitude of the influence of independent variables on the dependent variable, both simultaneously and partially.

The population of this study consists of individuals from Generation Z aged 18 to 27 years who reside in Surabaya and have invested through digital platforms. The sample is determined using a purposive sampling technique, which involves selecting respondents based on specific criteria relevant to the research objectives. The sample size ranges from 30 to 50 respondents, as recommended by Hair, Black, Babin, and Anderson (2010) for studies employing multivariate regression analysis.

Research data are collected through a structured questionnaire developed based on the indicators of each research variable. The data are then analyzed using multiple linear regression with the assistance of SPSS software to examine the effect of financial literacy (X_1), risk perception (X_2), and digital trading platforms (X_3) on investment decisions (Y). Prior to the main analysis, the data are tested for validity and reliability to ensure the robustness of the measurement instruments. In addition, a series of classical assumption tests—including normality, multicollinearity, and heteroscedasticity tests—are conducted to ensure that the regression model satisfies the BLUE (Best Linear Unbiased Estimator) criteria. A model that meets these criteria is considered to produce linear, unbiased, and efficient estimates, allowing the results of the analysis to be interpreted validly.

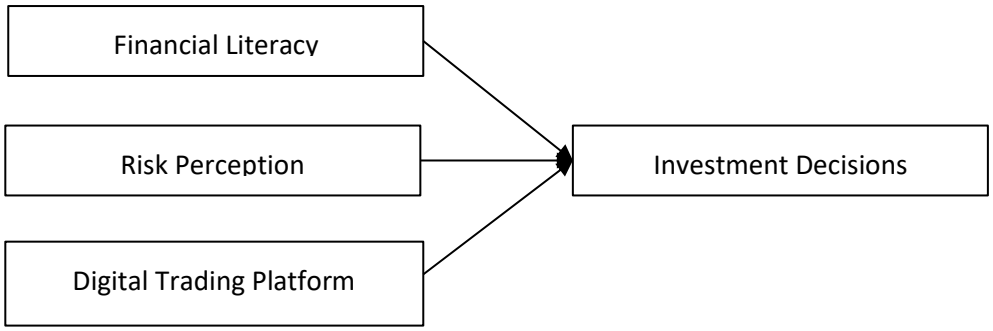
Operational Definition of Variables

The operational definitions of the variables used in this study are summarized in the following table:

Variable	Type	Brief Definition	Source
Financial Literacy	Independent (X_1)	An individual's ability to understand and manage finances as a basis for making investment decisions.	Lusardi & Mitchell (2014)
Risk Perception	Independent (X_2)	An individual's subjective assessment of the level of risk in investment activities.	Slovic (2010)
Digital Trading Platform	Independent (X_3)	Digital media that facilitate online investment transactions with features such as ease of access and real-time market information.	Aljanabi (2025)
Investment Decision	Dependent (Y)	The process of selecting, allocating, and executing investments based on financial objectives and the investor's risk profile.	Horne & Wachowicz (2016)

Conceptual Framework

The conceptual framework based on the operational definitions of the research variables is as follows:



RESULTS AND DISCUSSION

The questionnaire was developed based on indicators derived from previous studies, as outlined below:

Variable	**Indicators**
Financial Literacy	Understanding of basic investment concepts (risk, return, diversification)
	Ability to calculate compound interest on investments
	Understanding of short-term and long-term investments
	Understanding the impact of inflation on investment value
	Confidence and self-efficacy in managing personal finances for investment purposes
Risk Perception	Perception that investment activities are always high-risk
	Preference for safe investment instruments
	Concern about market fluctuations
	Influence of risk perception on investment decisions
	Belief that knowledge can reduce investment risk
Digital Trading Platform	Ease of access to investments through digital platforms
	Sense of security when using digital platforms
	Frequency of mobile application usage
	Efficiency and acceleration of investment processes through digital platforms
Investment Decision	Financial literacy encourages investment activities
	Risk perception influences the willingness to make investment decisions

Variable	Indicators
	Use of digital platforms affects the frequency of investment
	Ease of digital access encourages the selection of certain investment instruments
	Overall confidence in making investment decisions

The questionnaire was distributed online and screened according to the purposive sampling technique. Of the 58 responses received, 50 datasets met the established criteria and were deemed suitable for analysis.

Validity Test

Table 1 Validity Test

Variabel	Item	r hitung	Sig. (2-tailed)	r tabel (n=50; α=0,05)	α	Keterangan
X1	X1.1	0,696	<0,001	0,279	0,05	Valid
	X1.2	0,724	<0,001	0,279	0,05	Valid
	X1.3	0,321	0,023	0,279	0,05	Valid
	X1.4	0,912	<0,001	0,279	0,05	Valid
	X1.5	0,728	<0,001	0,279	0,05	Valid
X2	X2.1	0,68	<0,001	0,279	0,05	Valid
	X2.2	0,496	<0,001	0,279	0,05	Valid
	X2.3	0,865	<0,001	0,279	0,05	Valid
	X2.4	0,909	<0,001	0,279	0,05	Valid
	X2.5	0,613	<0,001	0,279	0,05	Valid
X3	X3.1	0,852	<0,001	0,279	0,05	Valid
	X3.2	0,628	<0,001	0,279	0,05	Valid
	X3.3	0,352	0,012	0,279	0,05	Valid
	X3.4	0,791	<0,001	0,279	0,05	Valid
Y	Y.1	0,667	<0,001	0,279	0,05	Valid
	Y.2	0,718	<0,001	0,279	0,05	Valid
	Y.3	0,936	<0,001	0,279	0,05	Valid
	Y.4	0,518	<0,001	0,279	0,05	Valid
	Y.5	0,871	<0,001	0,279	0,05	Valid

The validity test results show that all statement items have a calculated r value > r table or a significance value < 0.05, thus concluding that all statement items are valid.

Reliability Test

Table 2. Reliability Test Results

Variabel	*Cronbach Alpha*	Standar	Information
Financial Literacy	0,719	0,60	Reliabel
Risk Perception	0,770	0,60	Reliabel
Digital Trading Platform	0,650	0,60	Reliabel
Investment Decision	0,817	0,60	Reliabel

The reliability test results show that all variables have a Cronbach's alpha value >0.06, thus concluding that all variables are reliable.

Classical Normality Test

Normality Test

Table 3 Normality Test Results

One-Sample Kolmogorov-Smirnov Test

			Unstandardized Residual
N			50
Normal Parameters[a,b]	Mean		,0000000
	Std. Deviation		,23844760
Most Extreme Differences	Absolute		,302
	Positive		,302
	Negative		-,284
Test Statistic			,302
Asymp. Sig. (2-tailed)[c]			<,001
Monte Carlo Sig. (2-tailed)[d]	Sig.		<,001
	99% Confidence Interval	Lower Bound	,000
		Upper Bound	,000

a. Test distribution is Normal.

b. Calculated from data.

c. Lilliefors Significance Correction.

d. Lilliefors' method based on 10000 Monte Carlo samples with starting seed 2000000.

Based on the table above, the Asymp. Sig. (2-tailed) value is <0.001, which is less than the 0.05 significance level. This indicates that the residual data is not normally distributed, so H_0 is rejected and H_1 is accepted.

However, according to Ghozali (2018), if the sample size is relatively large (n > 30), violation of the normality assumption does not significantly affect the regression estimates because parameter estimation using the Ordinary Least Squares (OLS) method still produces unbiased, efficient, and consistent (BLUE) estimates.

Therefore, even though the test results indicate a non-normal residual distribution, the regression model can still be used for further analysis because the sample size of this study is 50 respondents, which is considered large enough to empirically meet the normality assumption.

Multicollinearity Test

Table 4 Multicollinearity Test Results

Coefficients[a]

Model		Collinearity Statistics	
		Tolerance	VIF
1	X1	,060	16,611
	X2	,054	18,498
	X3	,220	4,535

a. Dependent Variable: Y

The results of the multicollinearity test show that all variables have a tolerance value > 0.10 or VIF < 10, so it can be concluded that there are no symptoms of multicollinearity or multicollinearity test.

Uji Heteroskedastisitas

Table 5 Heteroscedasticity Test Results

Coefficients[a]

Model		Unstandardized Coefficients		Standardized Coefficients		
		B	Std. Error	Beta	t	Sig.
1	(Constant)	-2,720	,929		-2,929	,005
	X1	,197	,066	1,641	3,012	,004
	X2	-,171	,063	-1,572	-2,734	,009
	X3	,100	,036	,786	2,760	,008

a. Dependent Variable: ABS_RES

The results of the heteroscedasticity test indicate that all variables have a sig value >0.05, thus concluding that there are no symptoms of heteroscedasticity and that the test passes.

Multiple Linear Regression Equation

$$Y = a + b1X1 + b2X2 + b3X3 + e$$

Information
Y = variabel dependen
a = konstanta
b_1, b_2, b_3 = koefisien regresi
X_1, X_2, X_3 = variabel independen
e = error term

Coefficients[a]

Model		Unstandardized Coefficients		Standardized Coefficients		
		B	Std. Error	Beta	t	Sig.
1	(Constant)	-7,020	1,343		-5,226	<,001
	X1	1,518	,095	1,501	16,014	<,001
	X2	-,522	,091	-,570	-5,763	<,001
	X3	,254	,052	,239	4,872	<,001

a. Dependent Variable: Y

Multiple linear regression analysis was conducted to determine the effect of financial literacy (X_1), risk perception (X_2), and digital trading platforms (X_3) on investment decisions (Y). The test results showed the following regression equation:

$$Y = -7{,}020 + 1{,}518X1 - 0{,}522X2 + 0{,}254X3$$

Based on the above equation, the results can be explained as follows:

1. The constant value (a) of −7.020 indicates that if the variables of financial literacy, risk perception, and digital trading platforms are equal to zero, then the investment decision (Y) will be −7.020. This implies that in the absence of these three factors, investment decisions tend to be very low or may not occur at all.

2. The regression coefficient of X_1 (financial literacy) is 1.518 with a significance value of < 0.001, indicating that financial literacy has a positive and significant effect on investment decisions. This means that every one-unit increase in financial literacy will increase investment decisions by 1.518 units. Thus, the higher an individual's level of financial understanding and knowledge, the better the investment decisions they make.
3. The regression coefficient of X_2 (risk perception) is −0.522 with a significance value of < 0.001, indicating that risk perception has a negative and significant effect on investment decisions. This means that every one-unit increase in risk perception will decrease investment decisions by 0.522 units. In other words, the higher an individual's level of concern or perceived risk toward investment, the lower their tendency to invest.
4. The regression coefficient of X_3 (digital trading platforms) is 0.254 with a significance value of < 0.001, indicating that digital trading platforms have a positive and significant effect on investment decisions. This means that every one-unit improvement in the quality and ease of use of digital platforms will increase investment decisions by 0.254 units. The better the accessibility, features, and convenience offered by digital platforms, the greater the individual's interest and decision to invest.

CONCLUSION

Based on the results of data analysis and discussion, the following conclusions can be drawn:

1. Financial literacy has a positive and significant effect on the investment decisions of Generation Z in Surabaya. This implies that the higher an individual's level of financial literacy, the better their ability to make rational and well-planned investment decisions.
2. Risk perception has a negative and significant effect on investment decisions. High risk perception reduces the willingness of Generation Z to invest; therefore, improving understanding of investment risk management is necessary to make such perceptions more realistic and measurable.
3. Digital trading platforms have a positive and significant effect on investment decisions. Features such as ease of access, security, and real-time information on digital platforms have been proven to encourage investment participation among the younger generation.
4. Simultaneously, the three independent variables—financial literacy, risk perception, and digital trading platforms—have a significant effect on the investment decisions of Generation Z in Surabaya.

Thus, enhancing financial literacy and optimizing the use of digital platforms are key factors in strengthening the investment behavior of the younger generation. The government, financial authorities, and digital investment service providers are expected to collaborate in expanding financial education and creating a digital investment ecosystem that is safe, easily accessible, and supportive of rational decision-making.

REFERENCES

Aini, N., & Lutfi, L. (2019). The influence of risk perception and financial literacy on investment decision-making. *Journal of Economics, Business, and Accountancy Ventura, 22*(3), 323–331. https://doi.org/10.14414/jebav.v22i3.1750

Akims, M., Singh, G., & Nadeem, M. (2023). Financial literacy and investment decisions among youth investors: Evidence from developing economies. *International Journal of Financial Studies, 11*(1), 12–27. https://doi.org/10.3390/ijfs11010012

Aljanabi, A. R. (2025). Digital trading platforms and investor behavior: The moderating role of technological trust. *International Journal of Innovation and Economic Development, 11*(2), 45–56. https://doi.org/10.18775/ijied.1849-7551-7020.2015.82.2003

Azaria, A., Wulandari, D., & Susanti, L. (2024). Behavioral factors affecting investment decisions among Generation Z investors in Indonesia. *Journal of Behavioral Economics and Finance, 9*(1), 21–34. https://doi.org/10.5296/jbef.v9i1.21573

Bank Indonesia. (2024). *Laporan perkembangan investasi digital di kalangan generasi muda Surabaya*. Jakarta: Bank Indonesia.

Badan Pusat Statistik. (2022). *Survei Sosial Ekonomi Nasional (Susenas) 2022*. Jakarta: BPS.

Badan Pusat Statistik. (2023). *Statistik penduduk Indonesia berdasarkan kelompok umur 2023*. Jakarta: BPS.

Badan Pusat Statistik. (2025). *Proyeksi ekonomi regional Surabaya 2025*. Jakarta: BPS.

Fitriyah, N., & Rahmawati, D. (2025). Peran platform investasi digital terhadap keputusan investasi generasi muda di Indonesia. *Jurnal Ekonomi dan Bisnis Digital Indonesia, 4*(2), 101–112.

Hair, J. F., Black, W. C., Babin, B. J., & Anderson, R. E. (2010). *Multivariate Data Analysis* (7th ed.). Pearson Education.

Horne, J. C. V., & Wachowicz, J. M. (2016). *Fundamentals of Financial Management* (14th ed.). Pearson Education.

Kustodian Sentral Efek Indonesia. (2023). *Laporan tahunan pasar modal Indonesia 2023*. Jakarta: KSEI.

Khairunnisa, M., Rini, A., & Wahyudi, S. (2023). The mediating role of risk perception in financial behavior and investment decision among young investors. *Asian Journal of Economics and Finance, 5*(2), 87–98.

Lusardi, A., & Mitchell, O. S. (2014). The economic importance of financial literacy: Theory and evidence. *Journal of Economic Literature, 52*(1), 5–44. https://doi.org/10.1257/jel.52.1.5

Malini, A. D. (2024). Pengaruh literasi keuangan dan kepercayaan terhadap platform digital terhadap keputusan investasi generasi muda. *Jurnal Manajemen dan Keuangan, 13*(1), 15–28.

Mutawally, M. A., & Haryono, S. (2021). The effect of financial literacy, risk perception, and behavioral biases on investment decisions of millennials. *International Journal of Economics, Business and Accounting Research (IJEBAR), 5*(2), 124–137. https://doi.org/10.29040/ijebar.v5i2.2521

Nugroho, D., & Suryanto, E. (2023). Analisis persepsi risiko dalam keputusan investasi Generasi Z di era digital. *Jurnal Ekonomi dan Bisnis, 15*(1), 78–92. https://sinta.kemdikbud.go.id/journals/detail?id=200015

Otoritas Jasa Keuangan. (2023). *Survei Nasional Literasi dan Inklusi Keuangan 2023*. Jakarta: OJK.

Rahayu, L., & Santoso, P. (2024). Peran platform digital dalam meningkatkan literasi investasi. *Jurnal Akuntansi dan Keuangan, 18*(2), 112–128. https://sinta.kemdikbud.go.id/journals/detail?id=200012

Saputro, D., & Lestari, N. (2019). The effect of risk perception and overconfidence on investment decisions of young investors. *Jurnal Ilmiah Akuntansi dan Bisnis, 14*(2), 178–188. https://doi.org/10.24843/jiab.2019.v14.i02.p07

Sari, M., & Wulandari, T. (2022). Financial literacy sebagai prediktor keputusan investasi di kalangan muda. *Jurnal Manajemen Bisnis, 14*(1), 45–60. https://sinta.kemdikbud.go.id/journals/detail?id=200014

Slovic, P. (2010). *The Feeling of Risk: New Perspectives on Risk Perception.* Earthscan.

Tahir, M., & Danarsari, D. (2023). The influence of digital trading platforms on investment decision-making among Generation Z. *International Journal of Digital Economics and Finance, 2*(1), 35–49.

Tjahjono, H., & Sari, D. (2022). Pengaruh teknologi digital terhadap perilaku investasi Generasi Z. *Jurnal Ekonomi Terapan, 11*(2), 89–104. https://sinta.kemdikbud.go.id/journals/detail?id=200016

Ulfah, M. (2023). Pengaruh literasi keuangan dan persepsi risiko terhadap keputusan investasi mahasiswa di Indonesia. *Jurnal Ekonomi dan Bisnis Indonesia, 38*(1), 75–89.