

Transaction Convenience and Security as Predictors of Online Purchase Decisions on Shopee

Nazwa Nur Salsabilla¹, Suwarlan², Indria Sukma Sektiyaningsih³

Institut Bisnis dan Multimedia ASMI

Corresponding Author: Nazwa Nur Salsabilla nzasblla@gmail.com

ARTICLE INFO

Keywords: Transaction Convenience, Transaction Security, Purchase Decision, Shopee, E-Commerce

Received: 3 July

Revised: 25 August

Accepted: 26 September

©2026 Salsabila, Suwarlan, Sektiyaningsih: This is an open-access article distributed under the terms of the [Creative Commons Atribusi 4.0 Internasional](https://creativecommons.org/licenses/by/4.0/).



ABSTRACT

The rapid development of digital commerce has transformed consumer purchasing behavior and increased the importance of convenience and security in online transactions. This study examines the effects of transaction convenience and transaction security on online purchase decisions on Shopee among students of the Business Administration Program at Institut Bisnis dan Multimedia ASMI Jakarta. A quantitative causal-associative research design was employed. Data were collected through a structured questionnaire using a five-point Likert scale. The population consisted of 91 active students, and a saturated sampling technique was applied, resulting in 80 valid respondents. Data were analyzed using descriptive statistics, Pearson correlation, multiple linear regression, and t- and F-tests using SPSS. The results indicate that transaction convenience has a positive and significant partial effect on online purchase decisions ($t = 4.614$, $p < .001$; $\beta = .463$). Transaction security also has a positive and significant partial effect ($t = 3.472$, $p < .001$; $\beta = .349$). Simultaneously, transaction convenience and security significantly predict purchase decisions ($F = 45.782$, $p < .001$), with an R^2 of .543. Thus, the two predictors jointly explain 54.3% of the variance in online purchase decisions

INTRODUCTION

The rapid development of information and communication technology has substantially transformed the way consumers search for information, evaluate products, and complete purchases. In Indonesia, this transformation is reflected in the increasing adoption of electronic commerce as an alternative to conventional shopping. Consumers can now compare products, communicate with sellers, select payment methods, and complete transactions through digital platforms without being physically present at a store.

The development of Indonesia's e-commerce ecosystem has also intensified competition among digital marketplace platforms. According to the 2025 survey of the Indonesian Internet Service Providers Association (APJII), Shopee was the most frequently accessed e-commerce platform in Indonesia, reported by 53.22% of respondents. It was followed by TikTok Shop at 27.37%, Tokopedia at 9.57%, and Lazada at 9.09%. These figures demonstrate the prominent position of Shopee within the Indonesian digital commerce environment.

The increasing use of e-commerce, however, does not automatically guarantee that consumers will complete a purchase. Consumers evaluate different characteristics of a digital platform before deciding to transact. Two factors that are particularly relevant are the convenience of completing transactions and the perceived security of the transaction process. A convenient platform may reduce the effort required to search for products, select payment methods, and complete purchases. Conversely, concerns regarding personal data, payment information, authentication, and fraudulent activities may discourage consumers from completing a transaction.

The importance of convenience can be explained through the Technology Acceptance Model (TAM). Davis (1989) proposed perceived ease of use as one of the fundamental determinants of technology acceptance. In an e-commerce context, the underlying principle suggests that users are more likely to accept and use a digital system when interacting with the system requires relatively little effort. Transaction convenience therefore becomes particularly relevant because consumers interact directly with digital interfaces throughout the purchasing process.

Shopee provides various features designed to simplify online transactions, including product search functions, integrated payment options, digital wallets, bank transfers, and cash-on-delivery services. These features can potentially reduce the cognitive and operational effort required from consumers. Nevertheless, convenience alone may not be sufficient to generate purchase decisions. Consumers also need confidence that their personal and financial information will be protected.

Transaction security refers to the extent to which consumers perceive that their personal information, payment details, and transaction processes are adequately protected against unauthorized access, manipulation, fraud, and data leakage. Security is particularly important in e-commerce because consumers conduct transactions in an environment characterized by physical distance

between buyers and sellers. Consequently, consumers must rely on the platform's technological and procedural safeguards.

Previous studies have demonstrated the relevance of convenience and security in online purchasing. Adhitya and Fauziah (2023), for example, found that transaction convenience and transaction security were associated with online purchasing decisions on Shopee. More recent evidence from Ariskho and Herawati (2026) also indicates that ease of use and security significantly contribute to purchase decisions among ShopeePay users. Tiurmaida and Suhardi (2025) similarly reported significant effects of security and convenience on purchasing decisions among Shopee users in Batam.

Despite these findings, the present study focuses on a specific group of consumers, namely students enrolled in the Business Administration Program at Institut Bisnis dan Multimedia ASMI Jakarta. Students represent an important segment of digital consumers because they routinely interact with digital platforms and are generally familiar with technology-mediated transactions. However, familiarity with digital technology does not necessarily eliminate concerns regarding transaction convenience and security.

The contribution of this study lies in examining these two factors simultaneously within a specific student population in the context of Shopee transactions. Rather than examining general e-commerce consumers, the study focuses on students with an academic background in business administration, providing an empirical perspective on how users with business-related knowledge evaluate digital transactions.

Accordingly, this study aims to examine whether transaction convenience and transaction security individually and simultaneously influence online purchase decisions on Shopee among students of the Business Administration Program at Institut Bisnis dan Multimedia ASMI Jakarta.

LITERATURE REVIEW

Transaction Convenience

Transaction convenience refers to the degree to which consumers perceive that completing a transaction through a digital platform requires relatively little effort. The concept is closely related to the perceived ease-of-use dimension of the Technology Acceptance Model developed by Davis (1989). When consumers perceive that a technology is easy to understand and operate, they are more likely to accept and use the system.

In an e-commerce environment, transaction convenience involves several aspects of the purchasing process, including learning how to use the platform, understanding instructions, navigating menus, selecting products, choosing payment methods, and completing payment procedures.

In this study, transaction convenience is represented by five dimensions: ease of learning, clarity of instructions, operational efficiency, system flexibility, and ease of navigation. These dimensions reflect the extent to which users perceive the transaction process on Shopee as simple, understandable, flexible, and efficient.

Previous research supports the relevance of convenience in online purchasing. Adhitya and Fauziah (2023) found that transaction convenience

significantly influenced online purchase decisions on Shopee. Ariskho and Herawati (2026) also reported that ease of use significantly influenced purchasing decisions among ShopeePay users.

Therefore, the first hypothesis is formulated as follows:

H1: Transaction convenience has a positive and significant effect on online purchase decisions on Shopee.

Transaction Security

Transaction security refers to the perceived protection of consumer information and financial transactions from unauthorized access, manipulation, fraud, and other forms of digital risk. Security is an essential consideration in e-commerce because online transactions require consumers to provide personal and financial information through digital systems.

A secure transaction environment can reduce perceived risk and strengthen consumers' confidence in completing purchases. Conversely, concerns about data leakage, unauthorized access, fraudulent transactions, or weaknesses in authentication systems may reduce consumers' willingness to transact.

In this study, transaction security is reflected through five indicators: confidentiality of personal information, integrity of transaction amounts, reliability of authentication mechanisms, system trustworthiness, and consumer protection assurance.

Recent empirical evidence supports the importance of transaction security. Ariskho and Herawati (2026) found that security significantly affected purchasing decisions through ShopeePay. Tiurmaida and Suhardi (2025) similarly found that security had a positive and significant effect on purchasing decisions among Shopee users.

Therefore, the second hypothesis is formulated as follows:

H2: Transaction security has a positive and significant effect on online purchase decisions on Shopee.

Purchase Decision

Purchase decision refers to the consumer's process of evaluating alternatives and selecting whether, when, how much, and through which payment method a purchase will be completed. In an e-commerce environment, the decision is influenced by consumers' evaluations of the platform, product, transaction process, and perceived risks.

The purchasing decision construct in this study consists of five indicators: product selection, channel selection, purchase timing, purchase quantity, and payment-method selection. These indicators capture the behavioral decision taken by consumers after evaluating the available alternatives.

The decision to purchase through an e-commerce platform may therefore be influenced by both functional and risk-related considerations. A convenient transaction process can reduce the effort associated with purchasing, whereas a secure system can reduce uncertainty and perceived risk.

Hypothesis Development

The theoretical framework of this study proposes that transaction convenience and transaction security are independent variables that influence online purchase decisions.

Transaction convenience is expected to facilitate purchasing because consumers can complete transactions more efficiently when the platform is easy to understand and navigate. Transaction security is expected to influence purchasing because consumers are more willing to provide personal and financial information when they perceive the transaction environment as secure. Based on the theoretical arguments and previous empirical findings, the third hypothesis is formulated as follows:

H3: Transaction convenience and transaction security simultaneously have a significant effect on online purchase decisions on Shopee.

Conceptual Framework

The conceptual framework of this study can be presented as follows:

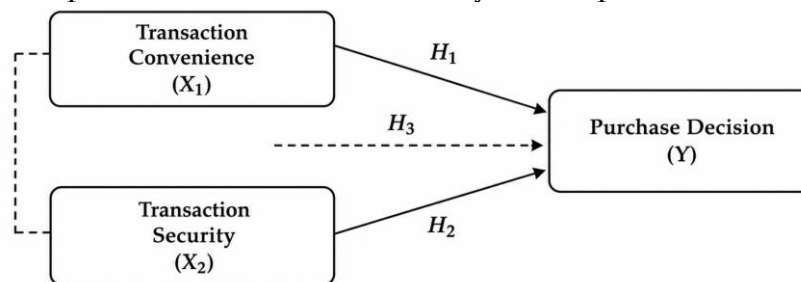


Figure 1. Conceptual Framework

METHODOLOGY

Research Design

This study employed a quantitative approach with a causal-associative research design. The design was selected because the study aims to examine the effects of transaction convenience and transaction security on online purchase decisions.

The research was conducted among students of the Business Administration Program at Institut Bisnis dan Multimedia ASMI Jakarta.

Population and Sample

The research population consisted of 91 active students in the Business Administration Program. Because the population was relatively limited, the study employed saturated sampling (census sampling), in which all members of the population were considered potential respondents.

A total of 80 completed questionnaires met the requirements for analysis and were therefore included as effective respondents.

Data Collection

Primary data were collected using a structured questionnaire. All research variables were measured using a five-point Likert scale ranging from 1 (strongly disagree) to 5 (strongly agree).

The questionnaire measured three constructs: transaction convenience (X_1), transaction security (X_2), and purchase decision (Y).

Transaction convenience was measured using indicators related to ease of learning, clarity of instructions, operational efficiency, system flexibility, and navigation.

Transaction security was measured through confidentiality, transaction integrity, authentication reliability, system trustworthiness, and consumer protection.

Purchase decision was measured through product selection, channel selection, purchase timing, purchase quantity, and payment-method selection.

Data Analysis

The data were processed using SPSS. The analysis consisted of validity testing, reliability testing, classical assumption testing, multiple linear regression, partial hypothesis testing using the t-test, simultaneous hypothesis testing using the F-test, and coefficient of determination analysis.

The multiple linear regression model was formulated as:

$$Y = \alpha + \beta_1 X_1 + \beta_2 X_2 + \varepsilon \dots\dots\dots (1)$$

where Y represents purchase decision, α represents the regression constant, β_1 represents the regression coefficient of transaction convenience, β_2 represents the regression coefficient of transaction security, X_1 represents transaction convenience, X_2 represents transaction security, and ε represents the error term.

RESULTS

Respondent Characteristics

The analysis involved 80 valid respondents. Female students represented 74% of the sample (59 respondents), while male students represented 26% (21 respondents).

Regarding age, 75% of respondents were below 22 years old. In terms of academic level, 59% were students in semesters 4–6. The respondent profile indicates that the sample was predominantly composed of young adult students who routinely interact with digital technology and online shopping platforms.

Validity and Reliability Testing

The validity of the questionnaire items was assessed using the Pearson Product-Moment correlation. With 80 respondents, the degrees of freedom were 78, resulting in a critical correlation value of 0.220.

All questionnaire items for transaction convenience, transaction security, and purchase decision produced correlation coefficients greater than 0.220 with $p < .001$. Therefore, all items were considered valid.

Reliability was assessed using Cronbach's Alpha. The results were 0.769 for transaction convenience, 0.759 for transaction security, and 0.768 for purchase decision. All coefficients exceeded the commonly applied minimum criterion of 0.70, indicating satisfactory internal consistency.

Table 1. Reliability Test Results

Variable	Cronbach's Alpha	Decision
Transaction Convenience (X_1)	0.769	Reliable
Transaction Security (X_2)	0.759	Reliable
Purchase Decision (Y)	0.768	Reliable

Classical Assumption Testing

Normality Test

The normality of the regression residuals was assessed using the One-Sample Kolmogorov-Smirnov test. The result produced an Asymp. Sig. value of 0.053.

Because the value was greater than 0.05, the residuals were considered normally distributed.

Heteroscedasticity Test

The Glejser test was employed to assess potential heteroscedasticity. The significance value for transaction convenience was 0.160, while the significance value for transaction security was 0.865.

Both values exceeded 0.05, indicating that the regression model did not exhibit evidence of heteroscedasticity.

Multiple Linear Regression

Multiple linear regression analysis produced the following equation:

$$Y = 3.006 + 0.475X_1 + 0.355X_2 \dots\dots\dots (2)$$

The positive coefficient for transaction convenience indicates that higher perceived convenience tends to be associated with higher purchase decision scores. Likewise, the positive coefficient for transaction security indicates that stronger perceptions of transaction security tend to be associated with stronger purchase decisions.

Table 2. Multiple Linear Regression Results

Predictor	B	Std. Error	t	Sig.
Constant	3.006	1.682	1.787	0.078
Transaction Convenience (X_1)	0.475	0.103	4.614	<0.001
Transaction Security (X_2)	0.355	0.102	3.472	<0.001

Partial Hypothesis Testing

Effect of Transaction Convenience on Purchase Decision

The regression coefficient for transaction convenience was 0.475, with a t-value of 4.614 and a significance level below 0.001.

The calculated t-value was greater than the critical t-value of 1.991. Therefore, transaction convenience had a positive and statistically significant effect on online purchase decisions.

Accordingly, H1 was supported.

The standardized regression coefficient reported in the analysis was $\beta = 0.463$, indicating a positive contribution of transaction convenience to purchase decisions after accounting for the other predictor in the model.

Effect of Transaction Security on Purchase Decision

Transaction security produced a regression coefficient of 0.355, with a t-value of 3.472 and a significance level below 0.001.

The calculated t-value exceeded the critical t-value of 1.991. Therefore, transaction security had a positive and statistically significant effect on online purchase decisions.

Accordingly, H2 was supported.

The standardized regression coefficient was $\beta = 0.349$, demonstrating a positive contribution of transaction security to purchase decisions.

Simultaneous Hypothesis Testing

The ANOVA results produced an F-value of 45.782 with a significance level below 0.001.

Because the calculated F-value was substantially greater than the critical F-value of approximately 3.12, transaction convenience and transaction security jointly had a statistically significant effect on online purchase decisions. Therefore, H3 was supported.

Table 3. Model Summary

R	R Square	Adjusted R Square	Std. Error of the Estimate
0.737	0.543	0.531	2.19238

The R value of 0.737 indicates a strong multiple correlation between transaction convenience, transaction security, and purchase decision.

The R² value of 0.543 indicates that 54.3% of the variance in online purchase decisions can be explained jointly by transaction convenience and transaction security. The remaining 45.7% is associated with other factors outside the model.

DISCUSSION

The Effect of Transaction Convenience on Online Purchase Decisions

The results demonstrate that transaction convenience has a positive and significant effect on online purchase decisions. This finding indicates that students are more likely to make purchasing decisions through Shopee when the transaction process is perceived as simple, clear, flexible, and efficient.

The finding is consistent with the Technology Acceptance Model proposed by Davis (1989), particularly the role of perceived ease of use in technology acceptance. When users perceive that a digital system can be operated without excessive effort, barriers to usage are reduced. In the context of online shopping, a simple navigation structure, understandable instructions, and efficient payment procedures can make the purchasing process more attractive to consumers.

The result is also consistent with Adhitya and Fauziah (2023), who found that transaction convenience significantly affected online purchase decisions on Shopee. Similar evidence was reported by Ariskho and Herawati (2026), who found that ease of use significantly influenced purchasing decisions among ShopeePay users.

From a practical perspective, the finding suggests that the purchasing interface is not merely a technical feature but also an important component of the consumer decision process. The easier consumers perceive the transaction process to be, the lower the effort associated with completing a purchase.

The Effect of Transaction Security on Online Purchase Decisions

Transaction security also demonstrated a positive and significant effect on online purchase decisions. This result indicates that consumers consider protection of personal information, transaction amounts, authentication procedures, and the overall reliability of the platform when deciding whether to complete an online purchase.

The finding is consistent with previous research by Ariskho and Herawati (2026), which demonstrated that security significantly influenced purchase decisions among ShopeePay users. Tiurmaida and Suhardi (2025) similarly found that transaction security had a significant effect on purchasing decisions among Shopee users in Batam.

The finding can be understood from the nature of online transactions. Unlike conventional purchases, consumers in e-commerce cannot directly observe or control every stage of the transaction. They must therefore rely on the platform's security mechanisms. Authentication systems, transaction verification, data protection, and consumer protection mechanisms can reduce perceived uncertainty and strengthen confidence.

For Shopee users, security therefore represents more than a technical characteristic. It functions as an important psychological condition that supports consumers' willingness to proceed from product evaluation to actual purchase.

The Simultaneous Effect of Transaction Convenience and Security

The simultaneous test indicates that transaction convenience and transaction security jointly have a significant effect on online purchase decisions. The model explains 54.3% of the variance in purchase decisions.

This result suggests that convenience and security should not be viewed as completely separate considerations. Consumers may expect a digital platform to provide both an efficient transaction process and adequate protection.

A transaction system that is extremely convenient but perceived as insecure may still generate hesitation. Conversely, a highly secure system that is difficult to navigate may discourage consumers because of the effort required to complete a purchase.

The combination of convenience and security can therefore create a more favorable digital purchasing environment. For e-commerce platforms, the implication is that improving user experience should occur alongside strengthening data protection and transaction security.

The findings also extend previous research by demonstrating the simultaneous contribution of these two factors within a specific population of Business Administration students. The R^2 value of 0.543 further indicates that although convenience and security are important predictors, other factors remain relevant to consumers' purchasing decisions.

These factors may include price perception, promotional incentives, product quality, electronic word-of-mouth, trust, service quality, brand image,

and perceived usefulness. Future studies can therefore extend the present model by incorporating additional behavioral and platform-related variables.

CONCLUSIONS AND RECOMMENDATIONS

Conclusion

This study examined the effects of transaction convenience and transaction security on online purchase decisions on Shopee among students of the Business Administration Program at Institut Bisnis dan Multimedia ASMI Jakarta.

The results demonstrate that transaction convenience has a positive and significant effect on online purchase decisions. This indicates that an easy-to-understand, efficient, flexible, and easy-to-navigate transaction process encourages consumers to make purchasing decisions.

Transaction security also has a positive and significant effect on online purchase decisions. Consumers are more likely to proceed with online transactions when they perceive that their personal information, financial information, authentication process, and transactions are adequately protected.

Furthermore, transaction convenience and transaction security simultaneously have a significant effect on online purchase decisions. The two predictors jointly explain 54.3% of the variance in purchase decisions, while 45.7% is associated with factors outside the current research model.

Overall, the findings indicate that an effective e-commerce platform needs to balance two fundamental dimensions: ease of transaction and security protection. Convenience facilitates the purchasing process, while security strengthens consumers' confidence in completing the transaction.

Practical Recommendations

For Shopee management, continuous improvement of the payment and checkout process is recommended. Interface design, navigation, payment integration, and transaction confirmation should remain simple and efficient.

At the same time, Shopee should continue strengthening personal-data protection, authentication, fraud detection, transaction monitoring, and consumer protection mechanisms. The combination of usability and security may strengthen consumer confidence and support purchasing activity.

For higher education institutions, the findings can contribute to the development of learning materials related to digital business administration, consumer behavior, digital marketing, and e-commerce management.

For future researchers, the research model can be expanded by incorporating other variables, such as trust, price perception, promotional activities, electronic word-of-mouth, digital service quality, perceived usefulness, and product quality. Future studies may also employ larger and more heterogeneous samples to increase the generalizability of the findings.

FURTHER STUDY

This study has several limitations. First, the respondents were limited to students of one Business Administration Program at a single institution. Consequently, the findings should not automatically be generalized to all Shopee users in Indonesia.

Second, the study employed a cross-sectional quantitative design. The results therefore describe relationships among the variables at the time of data collection and do not capture changes in consumer perceptions over time.

Third, the research model included only transaction convenience and transaction security as explanatory variables. Although these variables jointly explained 54.3% of the variance in purchase decisions, other relevant determinants remain outside the model.

Future studies are recommended to include broader respondent groups, larger samples, and additional explanatory variables. Comparative studies involving different e-commerce platforms may also provide a more comprehensive understanding of how consumers evaluate convenience and security across digital marketplaces.

ACKNOWLEDGMENT

This section gave you the opportunities to present gratitude to your colleagues who provide suggestions for your papers. You can also convey your appreciation to the financial grants you are accepting, making this paper.

REFERENCES

- Adhitya, W. R., & Fauziah, A. (2023). Pengaruh kemudahan transaksi, keamanan transaksi, dan kualitas pelayanan pelanggan terhadap keputusan pembelian online di Shopee (Studi kasus pada mahasiswa Manajemen Universitas Potensi Utama). *Manajemen Kreatif Jurnal*, 1(1), 178–189. <https://doi.org/10.55606/makreju.v1i1.1031>
- Ariskho, M. N., & Herawati, W. (2026). Pengaruh kepercayaan, kemudahan penggunaan, dan keamanan terhadap keputusan pembelian menggunakan ShopeePay (Studi kasus pada mahasiswa Universitas Wijaya Kusuma Surabaya). *Jurnal Ekonomi, Manajemen, Akuntansi dan Keuangan*, 7(1), 1–12. <https://doi.org/10.53697/emak.v7i1.3668>
- Davis, F. D. (1989). Perceived usefulness, perceived ease of use, and user acceptance of information technology. *MIS Quarterly*, 13(3), 319–340. <https://doi.org/10.2307/249008>
- Fitri, S. Y., & Susanti, F. (2023). Harga, kepercayaan, kemudahan penggunaan aplikasi, dan promosi terhadap keputusan pembelian online di Shopee (Studi pada mahasiswa STKIP dan STIE Widyaswara Indonesia Solok Selatan). *Sammajiva: Jurnal Penelitian Bisnis dan Manajemen*, 1(2), 140–159. <https://doi.org/10.47861/sammajiva.v1i2.193>
- Indonesian Internet Service Providers Association. (2025). Internet penetration and usage behavior survey 2025. APJII.
- Krisnanto, A., et al. (2023). Pengaruh promosi, kemudahan transaksi, dan kepercayaan pada pengguna Shopee PayLater terhadap keputusan pembelian. *Jesya: Jurnal Ekonomi & Ekonomi Syariah*, 6(1), 890–901.
- Robbins, S. P., & Coulter, M. (2023). *Management* (16th ed.). Pearson Education.
- Shofiah, S., & Sulasmini. (2023). Pengaruh kemudahan penggunaan, fitur layanan dan keamanan terhadap keputusan pembelian di Shopee. *Journal of Management and Business*, 2(1), 45–56.
- Sugiyono. (2019). *Metode penelitian kuantitatif, kualitatif, dan R&D*. Alfabeta.

Tiurmaida, Y. A., & Suhardi. (2025). Pengaruh kepercayaan, keamanan dan kemudahan terhadap keputusan pembelian pada e-commerce Shopee di Kota Batam. *AKADEMIK: Jurnal Mahasiswa Ekonomi & Bisnis*, 5(3), 1656–1667. <https://doi.org/10.37481/jmeh.v5i3.1604>