






“Continuous intention to use e-wallets in Indonesia: The impact of e-wallets features”

AUTHORS	Arief Prima Johan  Niki Lukviarman   Rahmat Eka Putra 
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Rahmat Eka Putra, 2022

Arief Prima Johan, Master of Science
in Management, Assistant Professor,
Management Department, Andalas
University, Indonesia. (Corresponding
author)

Niki Lukviarman, Doctor of Business
Administration, Professor, Accounting
Department, Andalas University,
Indonesia.

Rahmat Eka Putra, Master of Science
in Management, Lecturer, Business
Administration Department, Padang
State Polytechnic, Indonesia.



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Arief Prima Johan (Indonesia), Niki Lukviarman (Indonesia),
Rahmat Eka Putra (Indonesia)

CONTINUOUS INTENTION TO USE E-WALLETS IN INDONESIA: THE IMPACT OF E-WALLETS FEATURES

Abstract

Increased use of e-wallets in Indonesia has resulted in high competition among providers. Hence, companies must act to retain customers and impose continuous utilization of their services. This study aimed to investigate the determinants of continuous intention to use the preferred e-wallet in Indonesia. The framework was drawn from the technology continuance theory (TCT) with modifications to fit the e-wallet settings. This study assessed the effect of e-wallet features on continuous intention to use, with attitudes and satisfaction as intervening factors. Data were collected from the general population in Indonesia who uses e-wallets and possesses at least two accounts on different platforms. A total of 948 samples were generated using a web-based self-administrated survey. The data were analyzed using AMOS-SEM by assessing construct validity and reliability, as well as measurement and structural models. The analysis confirms the effect of attitudes and satisfaction on continuous intention. The findings also highlighted the positive impact of service compatibility and merchant networks on attitudes and satisfaction and the positive impact of perceived security toward satisfaction. Unexpected results revealed a strong and direct impact of value of reward programs and merchant networks toward continuance intentions. This study concludes that the modifications of TCT into the e-wallet settings can predict users' post-adoption behavior.

Keywords technology continuance theory, merchant networks,
value of a reward program, service compatibility

JEL Classification M31, G23

INTRODUCTION

E-wallet is one of the most rapidly growing financial innovations. This technology can be understood as a concept where money can be stored, and transactions can be made digitally through mobile devices (Chawla & Joshi, 2019; Jenkins, 2008). The use of e-wallets has been part of lifestyles, particularly since Covid-19 (GSMA, 2021). In addition, human restrictions during pandemics have increased the use of digital payments and other cashless financial transactions. As a result, in 2020, the registered e-money accounts grew by 12.7% globally, with over 136 million additional accounts in just one year, taking the total number of registered accounts to 1.2 billion (GSMA, 2021).

In Indonesia, shifting toward e-wallets is massively increasing. According to the Indonesian Central Bank (2021), the value of electronic transactions in 2020 grew by 38.62 % from USD 10.07 billion to USD 13.95 billion. Furthermore, the data reported that e-wallets are used for multiple purposes, such as retail transactions, transportation, food ordering, e-commerce, and bill payments. Average national usage also showed that 68 percent of e-wallet users utilized the services

at least once a week (Ipsos, 2020). Furthermore, the convenient use of e-wallets has encouraged users to sign-up for many accounts on different platforms. This implied that customers have a preferred e-wallet, which they most frequently and continuously utilize.

1. LITERATURE REVIEW AND HYPOTHESES

This study used technology continuous theory (TCT) to predict post-adoption behavior by integrating the role of experience and attitudes (Daragmeh et al., 2021). However, the predictors of TCT were modified with the e-wallet context and ecosystem (Pal et al., 2019). Service compatibility was integrated into the model to capture alignment between offered service and personal needs (Jiang et al., 2021; Kleijnen et al., 2007). The model is equipped with perceived security essential in financial transactions (Chawla & Joshi, 2019).

This study suspected reward programs as a vital feature attracting continuous usage (Pal et al., 2019). Although previous studies have explored this concept (Tanford, 2013), specific investigation in e-wallet settings is limited. Finally, this study introduces merchant networks as an indispensable component in e-wallet service. Merchants, either digital or conventional, served as distribution channels, ensuring customers reached the platforms. These endogenous are integrated with remaining TCT concepts: satisfaction, attitudes, and continuous intention to use.

This study contributes to the literature in several ways. First, it considers the contextual features of e-wallets by modifying the TCT to predict post-adoption behavior. Next, this study introduces merchant networks as the determinant factor influencing the continuous adoption of e-wallets. In addition, this paper is also the first to consider the impact of reward programs as a contextual feature in e-wallet research. Finally, this paper expands the literature on e-wallets into a more specific context of Indonesia. It offers implications for managers to design strategies for ensuring continuous usage of e-wallets.

Continuous intention refers to constantly using and re-using technologies (Bhattacharjee, 2001; Daragmeh et al., 2021). Previous research confirmed that continuous intention is directly related

to actual use (Al-Emran et al., 2020; S. Lee & D. Lee, 2020). The concept has been examined in various settings, such as in the banking sectors (Rahi et al., 2021), technological learning (Al-Emran et al., 2020), and e-wallets (Abdul-Halim et al., 2022; Daragmeh et al., 2021; Phuong et al., 2020). According to the TCT model, satisfaction and attitude are the most critical factors affecting continuous intention (Liao et al., 2009).

Attitude is favorable or unfavorable feelings generated from the evaluation of a situation. TCT signifies attitude as the critical contributor to continuous intention because it establishes long-lasting general feelings (Daragmeh et al., 2021; Phuong et al., 2020). Besides, an individual tends to avoid cognitive dissonance by preferring attitude-behavior congruence (Kuester & Benkenstein, 2014). Previous studies have found that positive attitudes increase continuous intention (Rahi et al., 2021; Daragmeh et al., 2021; Phuong et al., 2020).

Satisfaction could be understood as a psychological state resulting from a cognitive evaluation of the discrepancy between expectancy and performance (Bhattacharjee, 2001). Once the expectation of e-wallet services is fulfilled, satisfaction is apparent. Furthermore, satisfaction leads to repeated behavior due to the proclivity to repeat pleasant experiences. Daragmeh et al. (2021) confirmed a positive association between satisfaction and continuous intention to use e-wallets.

Service compatibility means that the features correspond with users' needs, values, and lifestyles and have been critical to initial adaptation (Kleijnen et al., 2007). Service compatibility may lead to positive attitudes and satisfaction. Favorable attitudes may arise when provided services and features are compatible with personal preferences. Service compatibility indicates service performance to fulfill users' needs and increases satisfaction. Previous studies supported the positive influence of service compatibility on satisfaction (Sebetci, 2018; Ozturk et al., 2016) and attitude (Jiang et al., 2021; Tsai & Tiwasing, 2021).

Perceived security is critical in digital business and financial transactions, specifically in user credentials and asset protection (Flavián et al., 2006). Hence, users may expect platforms to provide solid security assurance. Security also manifests platforms' competence and integrity (Kumar et al., 2018), resulting in users' favorable evaluation as fair and virtuous companies. As users feel that the security of assets and personal information is well-managed, satisfaction will be evident. Previous studies reported that perceived security positively influenced satisfaction (Kumar et al., 2018; Li et al., 2021). Previous findings also confirmed a positive impact of perceived security on attitudes toward e-wallets (Chawla & Joshi, 2019; Shaw et al., 2022; Singh et al., 2020).

Reward programs are implemented massively in the e-wallet sector. The programs are usually short-term, encouraging customers to redeem in short periods. Visible and achievable rewards with reasonable certainty may trigger user desirability (Tanford, 2013), influencing re-use decisions. Consumers may also evaluate fairness by comparing the cost-benefit of the rewards. O'Brien and Jones (1995) proposed five elements to evaluate the values of reward programs, including cash value, choice of redemption options, aspirational value, relevance, and convenience. Users' evaluation could be positive when these elements fit their expectations, establishing favorable attitudes and satisfaction. Studies found the positive role of reward programs in establishing satisfaction (Nesset et al., 2021) and positive attitudes (Kuester & Benkenstein, 2014).

Merchant networks refer to what extent the platforms have available and accessible merchants that can support transactions. This new concept was adapted from the network externalities that reflect merchants' acceptability in card payment research (Bounie et al., 2016; Pal et al., 2020). Merchants served as distribution channels, ensuring financial services were delivered to customers. It may also reflect performance because massive merchants indicate the ability of companies to establish networks. E-wallet users may expect accessibility and flexibility of merchants and could be regarded as the outcome certainty due to merchants' ease of locating. Massive merchant networks may also be evaluated as a high commitment to providing accessible and fair financial transactions. Hence, merchant networks could lead to favorable attitudes and satisfaction. Bounie et al. (2016) found that merchants' acceptance increased card payments in banking sectors.

The literature review proposes the research framework on the determinant of continuous intention to use e-wallets. The framework, described in Figure 1, considers TCT as the foundation with modification on the endogenous variable according to the e-wallets setting. Therefore, this study intended to comprehend the determinants of continuous intention to use the preferred e-wallet in Indonesia by modifying the TCT model with an e-wallet contextual setting.

Following the literature review and study objectives, several hypotheses are proposed based on the research framework:

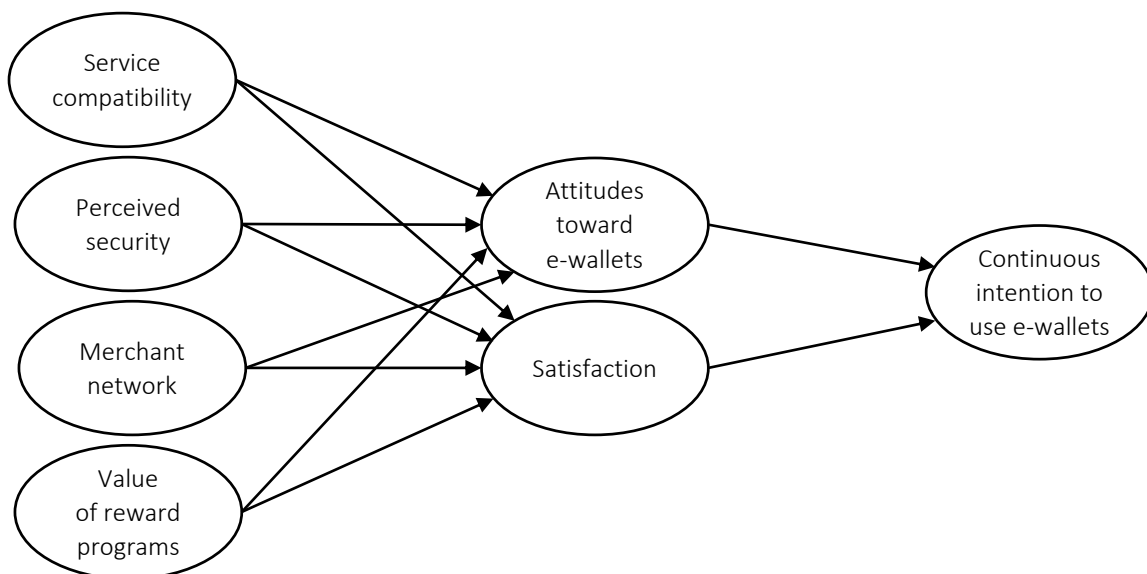


Figure 1. Research framework

- H1: *Consumers' attitudes positively affect continuous intention to use the preferred e-wallet.*
- H2: *Consumers' satisfaction positively affects continuous intention to use the preferred e-wallet.*
- H3(a): *Service compatibility positively affects user attitudes.*
- H3(b): *Service compatibility positively affects user satisfaction.*
- H4(a): *Perceived security positively affects attitudes.*
- H4(b): *Perceived security positively affects satisfaction.*
- H5(a): *Value of reward programs positively affects attitudes.*
- H5(b): *Value of reward programs positively affects satisfaction.*
- H6(a): *Merchant networks positively affect attitudes.*
- H6(b): *Merchant networks positively affect satisfaction.*

2. METHODOLOGY

2.1. Survey development and data collection

Data were collected from the general population of Indonesia who at least possesses two e-wallets from different platforms. Since e-wallets are used for general financial transactions and are provided for the public, assessing the general population is reasonable and could result in the generalization of Indonesia. The study specifies the respondent criteria to those with more than one account to capture the intention to use their preferred e-wallets. The survey focused on eight big cities on the islands of Java and Sumatra, where the rate of business transactions is high. A total of 1,425 responses were generated from data collection. After initial examination for missing values and invalid responses, a total of 948 responses were included for further analysis.

A two-part web-based questionnaire was developed to generate the respondents' characteristics and responses to variables. The first part specified participants' demographic and general information about their daily use of e-wallets. At the end of the first part, respondents identified the preferred e-wallet they used most frequently. The next part focused on measuring the variables, consisting of 29 items. The measures were rated using a five-point Likert scale, from 1 "strongly disagree" to 5 "strongly agree." Electronic platforms, such as email and social media, were used to deliver the questionnaires.

2.2. Measurement

The continuous intention was measured using three items developed by Bhattacharjee (2001) and modified by Daragmeh et al. (2021). The scale captured users' intention to continue using e-wallets. Satisfaction is measured using a modified scale from Bhattacharjee (2001) and Daragmeh et al. (2021). The items assess users' feelings about prior use of the preferred e-wallet. However, the study only adopted four items with high reliability and loading score from the study of Daragmeh et al. (2021). Attitude toward preferred e-wallets was assessed with five scales from Davis (1989) and Venkatesh et al. (2003), modified by Chawla and Joshi (2019). The concept identifies individual positive or negative evaluations of their preferred e-wallet.

Service compatibility was measured using three items developed by Kleijnen et al. (2007), and perceived security was captured from five items adapted from Flavián et al. (2006). Value of reward programs was measured by five criteria adapted from O'Brien and Jones (1995) by identifying whether the programs have high cash value, redemption options, aspirational value, relevance, and convenience. Finally, the paper proposed four items to indicate merchant networks, assessing to what extent the merchants are available, easy to access, and embeddedness as payment options. A pilot test was conducted using 98 respondents before the survey to examine the reliability and consistency of the measurements. The results indicated high reliability levels, with a Cronbach's Alpha score higher than 0.7 for all variables.

2.3. Data analysis

The study utilized the IBM SPSS statistical software to assess the descriptive information. Next, this study employed structural equation modeling using AMOS to examine the hypotheses. AMOS-SEM is widely used in social sciences and is suitable for models with complex relationships and constructs (Hair et al., 2014). The analysis followed Hair et al. (2014) by employing a two-step SEM, examining confirmatory factor analysis (CFA) and model evaluation.

3. RESULTS

3.1. Respondents' profile

Respondents consisted of 51.5% male and 48.5% female. In addition, 27.5% are students, 47.6% are employees, and 24.9% are entrepreneurs. A total of 42.6% are below the district's average income, 45.4% – average, and 12% – above average. Table 1 shows detailed respondents' profiles. It shows that more than 70% have more than one registered e-wallet account. The survey also specifically asked respondents to indicate the preferred e-wallet they use most frequently. The data also showed that the preferred e-wallet was used for multiple purposes.

Table 1. Respondents' profiles

Variables	Frequency	Percentage (%)
Gender		
Male	488	51.5
Female	460	48.5
Age		
18-25	456	48.1
26-35	307	32.4
More than 35	185	19.5
Occupation		
Students	261	27.5
Professional employees	451	47.6
Entrepreneurs	236	24.9
Industry sector		
Manufacture	24	2.5
Finance	71	7.5
Education	221	23.3
Telecommunication	43	4.6
Mining	10	1.0
Art and culture	62	6.5
Commerce	163	17.2

Variables	Frequency	Percentage (%)
Health and public service	57	6.0
Hospitality	20	2.1
Others	278	29.3
Income		
Lower than the city's standard	404	42.6
City's standard + IDR 10 million	430	45.4
Above city's standard + IDR 10 million	114	12.0
Number of registered e-wallet platforms		
One	263	27.7
More than one	685	72.3
Most frequent transaction purposes		
Bill payment	216	22.7
Online shopping	359	37.8
Money transfer	205	21.7
Payment in conventional stores	168	17.7
Frequency of use		
More than twice per day	140	14.8
Once per day	185	19.5
Once in three days	237	25.0
Less than once in three days	385	40.7

Note: Sample size – 948.

3.2. Measurement model

CFA was employed to estimate the robustness, validity, and reliability of the measurement model. As indicated in Table 2, based on Hair et al. (2014), the result showed a robust fit index and supported the measurement model evaluation.

Table 2. CFA and structural model fit

Indicator	CFA	Initial model	Modified model
Chi-square	1354.10	1363.93	1339.16
P-value	0.00	0.00	0.00
Absolute Fit Measure			
GFI	0.91	0.90	0.91
RMSEA	0.05	0.06	0.06
CMIN/DF	3.80	4.08	4.04
RMR	0.02	0.03	0.00
Incremental Fit Indices			
NFI	0.93	0.93	0.93
CFI	0.95	0.94	0.94
RFI	0.92	0.92	0.92
TLI	0.94	0.94	0.94

Loading factors for each scale were high and corresponded with the latent construct, indicating acceptable discriminant validity. Chin (2010) suggested a loading threshold above 0.7, so an item below the score was excluded for further analysis. Appendix A, Table A1, exhibits the loading scores

Table 3. Quality construct and correlation

Item	Mean	Std	CR	CA	AVE	CI	S	A	SC	PS	MN	VRP
CI	4.02	0.65	0.86	0.89	0.55	0.74						
S	4.36	0.52	0.94	0.89	0.6	0.61	0.77					
A	4.30	0.62	0.95	0.88	0.67	0.62	0.61	0.82				
SC	4.08	0.63	0.92	0.87	0.66	0.7	0.68	0.77	0.81			
PS	4.45	0.56	0.92	0.87	0.6	0.67	0.68	0.73	0.72	0.77		
MN	4.28	0.61	0.94	0.88	0.68	0.55	0.53	0.6	0.65	0.59	0.82	
VRP	4.06	0.64	0.94	0.88	0.66	0.54	0.53	0.56	0.66	0.68	0.69	0.81

Note: *CI: Continuous Intention; S: Satisfaction; A: Attitude; SC: Service Compatibility; PS: Perceived Security; MN: Merchant Networks; VRP: Value of Reward Programs.

for each scale. Further assessment of discriminant validity was identified by comparing the square root of each construct’s average variance extraction (AVE) to the inter-correlation with all other constructs (Fornell & Larcker, 1981). Table 3 shows that square root AVEs are higher than constructs’ inter-correlation, suggesting discriminant validity.

Convergent validity was evaluated from composite reliability and AVEs (Fornell & Larcker, 1981). The score of composite reliability of each construct is higher than the suggested threshold of 0.7 (Chin, 2010), and each AVEs are above 0.5 (Fornell & Larcker, 1981), so measurement evaluation indicates convergency. Furthermore, each measurement item also displays high internal consistency, as indicated by Cronbach’s Alpha scores above the suggested cut-off of 0.70 (Chin, 2010).

3.3. Model evaluation and hypotheses testing

Analysis of the structural model resulted in similarities and a better fit than the measurement model. This indicates a robust model with substantial

determinant power to explain continuous intention to use the preferred e-wallets. Furthermore, both absolute and incremental indicators are above the threshold points.

Table 4 exhibits the hypotheses testing result. The analysis found a positive association between consumers’ attitudes toward continuous intention, thus confirming H1 ($\beta = 0.28$ and $p < 0.00$). H2 confirmed a positive relationship between users’ satisfaction and continuous intention ($\beta = 0.34$ and $p < 0.00$). H3(a), which predicted a positive influence of service compatibility on attitude, is also supported ($\beta = 0.71$ and $p < 0.00$). The analysis also reveals a positive influence of service compatibility on users’ satisfaction ($\beta = 0.25$; $p < 0.00$), supporting H3(b). At the same time, the results supported H4(b) regarding the positive effect of perceived security on satisfaction ($\beta = 0.26$; $p < 0.00$), but they did not confirm H4(a) regarding the relationship between perceived security and attitude ($\beta = 0.04$; $p > 0.10$).

Both H5(a) and 5(b), which proposed a positive impact of the reward program on attitudes and

Table 4. Hypotheses testing

No.	Hypothesis	Estimate	P-values
1	Attitudes – Continuous Intention	0.25	***
2	Satisfaction – Continuous Intention	0.71	***
3	Service Compatible – Attitudes	0.27	***
4	Service Compatible – Satisfaction	0.04	***
5	Perceived Security – Attitudes	0.08	0.41
6	Perceived Security – Satisfaction	0.06	***
7	Value of Reward Programs – Attitudes	0.10	0.34
8	Value of Reward Programs – Satisfaction	0.01	0.80
9	Merchant Network – Attitudes	0.03	0.08**
10	Merchant Network – Satisfaction	0.09	0.03*
11	Value of Reward Programs – Continuous Intention	0.34	0.01*
12	Merchant Network – Continuous Intention	0.28	0.01*

Note: *Significant at 10%; **Significant at 5%; ***Significant at 1%.

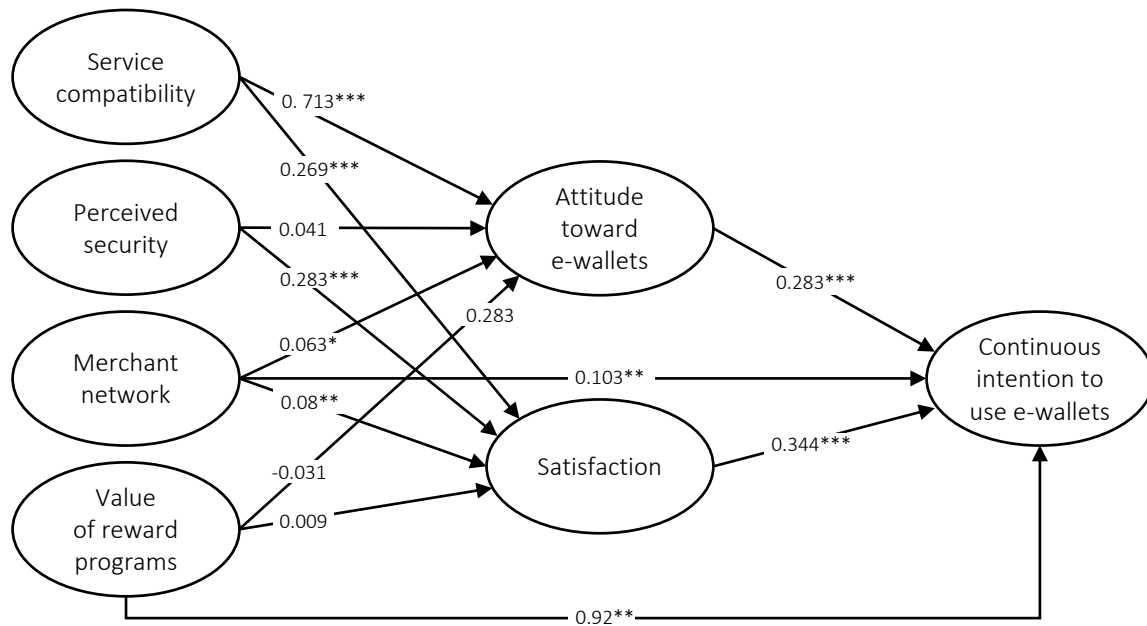


Figure 2. Final structural model

satisfaction, were not verified ($\beta = 0.009$; $p < 0.800$ and $\beta = -0.031$; $p < 0.346$). Further, positive relationships with low confidence levels supported H6(a), which predicted a positive association between merchant networks and attitude ($\beta = 0.063$; $p < 0.10$). Finally, H6(b) proposed a positive impact of merchant networks on customer satisfaction, and it was corroborated with adequate statistical power ($\beta = 0.080$; $p < 0.05$).

Further analysis based on modification indices suggested examining additional relationships. The first suggestion is to examine the direct effect of merchant networks on continuous intentions. The analysis revealed a positive association ($\beta = 0.080$; $p < 0.035$) with more substantial power than indirect effect. Next is to assess the direct relationship of reward programs on continuous intention. Again, the result revealed a positive direct relationship ($\beta = 0.092$ and $p < 0.011$), thus suggesting the impact of merchant networks on continuous intention is direct rather than indirect (Figure 2).

4. DISCUSSION

The study confirmed that favorable lasting evaluation of increased continuous intention and supported the TCT models from previous studies (Al-Emran et al., 2020; Daragmeh et al., 2021; Liao et al., 2009; Rahi et al., 2021). The study also confirmed

the role of satisfaction in forming continuous behavior. Fulfilled expectations established positive emotions and triggered the intention to re-use, magnifying the positive impact of satisfaction toward continuous intention (Daragmeh et al., 2021).

The finding verified that congruency among users' needs, values, and lifestyles with the provided services raised positive attitudes and satisfaction. The result supported Kleijnen et al. (2007) that successful innovations require fulfilling potential users' values, experiences, and behavioral habits. It also supported the positive influence between service compatibility and satisfaction (Tsai & Tiwasing, 2021; Jiang et al., 2021). The study implicated that understanding the specific features needed by consumers is imperative to establish positive evaluation.

The study confirmed the pivotal of consumer protection to establishing satisfaction. In the e-wallet context, customers might worry about losing money and are concerned with privacy. Hence, companies need to convincingly expose their solid security assurance. This finding confirms Van Noort et al. (2008) that exposing safety orientation lowered risk perception. It is also vital to ensure that companies are capable, prudent, and virtuous by exposing robust security systems (Enck et al., 2009). This study found that consumers' attitudes do not influence perceived security. A possible explana-

tion might be the operationalization of perceived security that mainly indicates information-based perception and less considers experience-based perception. Since attitude indicates general and lasting evaluation, its formation requires significant experience and cannot occur merely through information (A. Khan & S. Khan, 2022).

This study provides evidence that values of reward programs have not affected satisfaction and attitude. Reward programs in the e-wallet tend to be short-time and change regularly. Since attitude and satisfaction are related to lasting emotional evaluations, the short time and frequent program changes may disregard customers. However, the study reveals that value of reward programs directly increases continuous intention. It supported Teng and Khong (2021), who found a favorable impact of promotional programs on the actual use of e-wallets.

Merchant networks are reflected in perceptions about the availability and accessibility of merchants. The concept is related to network externalities, serving as agents and enablers for the system to be used more frequently and extensively. This study found a positive association between merchant networks and satisfaction. Vast merchant networks increase platforms' usefulness and ease of use aligned with services' desirability and certainty. This finding is consistent with previous studies that network externalities were critical for perceived transaction reliability (Verma, 2020).

This study revealed unexpected results of the direct impact between merchant networks and continuous intention to use preferred e-wallets. The statistical power of the relationship is stronger than the indirect path through satisfaction and attitude. It indicates that the availability of merchants could directly trigger the use of platforms continuously. Customers may quickly decide to utilize the platform due to its acceptance by

many merchants. The argument is supported by Bounie et al. (2016), who found a positive influence of merchants' acceptability on the increased use of card payments.

Another possibility might be coming from sponsored complimentary. In this case, merchants may act as sponsors when the platform-merchant relationship is tight and complementary. Previous studies found that the availability of complementary functions increases the continuous use of mobile social network sites (Zhou, 2015). This study also validated the proposed scales of merchant networks. The paper developed four instruments assessing merchants' massiveness, ease of access, online acceptance, and conventional marketplaces. The scale validity of these indicators also displayed satisfactory and reliable results. Therefore, this study has also contributed to the literature by proposing novel measurements for merchant networks.

This study contributes to the practical implications of the e-wallet sector by providing guidelines for companies to retain customers. First, companies must continuously fulfill customers' expectations to improve satisfaction and positive attitudes. Next, companies could expand their services into broader segments by providing compatibility with users' needs, values, and lifestyles. Further, platforms must expose their security competence to ensure the psychological safety of their customers, which is valuable to form positive evaluations. This study also suggested that companies design valuable and attractive reward programs that trigger re-using intentions. The programs should offer flexible redemption options and be cash valuable, possible, relevant, and aligned with customer needs. Next, companies must expand merchant networks to ensure platforms' utilization. Finally, this study advises companies to establish sponsored complementary relationships with merchants to promote repeated use.

CONCLUSION

This study aimed to comprehend the determinants of continuous intention to use the preferred e-wallets in Indonesia. The results conclude that user experience, satisfaction, and attitudes played significant roles in maintaining continuous utilization. Service compatibility promotes positive attitudes and satisfaction, while perceived security drives favorable attitudes but does not affect user satisfaction.

Although merchant networks lead to positive attitudes and satisfaction, a direct relationship to continuous intention has a more substantial impact than an indirect relationship. Similarly, value of reward programs directly influences positive intention to use, while there is no meaningful relation to attitudes and satisfaction. Finally, this study concludes that the proposed modification of the TCT model is applicable to e-wallet settings in Indonesia.

This study limits the analysis of contextual e-wallet features on service compatibility, security, merchant networks, and reward programs. Future studies should consider various features to comprehend the effect of provided service to form continuous intentions. For example, they may assess application design attractiveness, service recovery system, and platform's corporate affiliation. Since this study is cross-sectional, it cannot capture a longer horizon of continuance intentions. Future research needs to consider a longitudinal approach to identify cause-effect relationships.

Although this study provides a high generalization of the Indonesian population, it neglected the distinct effects of different user characteristics. Investigations on each important segment should be conducted to generate specific implications. Finally, future studies need to utilize or combine multiple approaches to data collection. Self-administrated web-based surveys implemented in this paper resulted in many removal responses due to raters' errors.

AUTHOR CONTRIBUTION

Conceptualization: Arief Prima Johan, Rahmat Eka Putra, Niki Lukviarman.

Data curation: Rahmat Eka Putra.

Formal analysis: Arief Prima Johan, Rahmat Eka Putra.

Methodology: Arief Prima Johan, Niki Lukviarman.

Funding acquisition: Niki Lukviarman, Arief Prima Johan.

Project administration: Arief Prima Johan.

Supervision: Niki Lukviarman.

Writing – original draft: Arief Prima Johan, Rahmat Eka Putra.

Writing – review & editing: Arief Prima Johan, Niki Lukviarman.

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APPENDIX A

Table A1. Items and factor loading

Construct	Scale	Factor loading
Attitudes	I do not need others' help using a mobile wallet.*	0.59
	Step-by-step navigation of mobile wallet apps is easy to understand.	0.81
	Learning to use a mobile wallet is easy.	0.85
	I like the fact that payments done through mobile wallets require minimum effort.	0.76
	It is easy to transfer money through mobile wallets as minimum steps are required.	0.83
Continuous Intentions	I want to continue using my preferred e-wallet rather than discontinue its use.	0.81
	I intend to continue using my preferred e-wallet rather than any alternative means.	0.75
	If I could, I would like to discontinue using my preferred e-wallet.	0.66
Value of Reward Programs	The proposed rewards have high cash value.	0.78
	It is highly likely to get the proposed rewards.	0.77
	The proposed rewards are what I have wanted.	0.83
	The proposed rewards have flexible diremptions options.	0.81
Merchant Networks	It is convenient to choose and use the proposed reward programs.	0.82
	This platform can be found and used by many merchants.	0.83
	Merchants for this platform are easy to locate and accessible.	0.84
	This platform is easily found as a payment option in online marketplaces.	0.84
Perceived Security	This platform is easily found as a payment option in conventional marketplaces.	0.77
	I am confident making payments through a mobile wallet.	0.76
	Technology used in a mobile wallet is very secure.	0.82
	The service has the potential to be safer than traditional payment options such as credit cards and cash.	0.73
	Transactions conducted through mobile wallets are secure.	0.84
Satisfaction	The chances of losing money stored in mobile wallets are low.	0.67
	I am satisfied with my decision to use this e-wallet	0.78
	My choice to use this e-wallet was a wise one.	0.79
	I am not happy with my earlier decision to use this e-wallet.	0.78
Service Compatibility	My experience with using this e-wallet could have been better.	0.73
	Using this e-wallet for transactions fits my service needs.	0.83
	Using this e-wallet is compatible with how I usually perform my service transactions.	0.79
	The use of e-wallet services is in line with my service preferences.	0.81

Note: *Removed from the analysis.