



Print ISSN: 1738-3110 / Online ISSN 2093-7717  
JDS website: <http://www.jds.or.kr/>  
<http://dx.doi.org/10.15722/jds.21.02.202302.21>

## Digital Bank Channel Distribution: Predictors of Usage Attitudes in Jakarta's Gen Z

Eko Retno INDRIYARTI<sup>1</sup>, Michael CHRISTIAN<sup>2</sup>, Henilia YULITA<sup>3</sup>, Titik ARYATI<sup>4</sup>, Regina Jansen ARSJAH<sup>5</sup>

Received: December 25, 2022. Revised: January 25, 2023. Accepted: February 05, 2023.

### Abstract

**Purpose:** The goal of this study is to examine what makes young people more likely to use digital banking. This is because digital banking services and their distribution channels are technologically advanced, which can be a double-edged sword between ease of use and resistance to technology. **Research design, data and methodology:** This study included 320 participants from generation Z in Jakarta who use digital bank and used a quantitative method with PLS-SEM. **Results:** This study explains how, in addition to usefulness, costs, and self-efficacy, resistance to technology has a direct effect on usage attitudes. Meanwhile, if the attitude of use is preceded by aspects of usefulness, self-efficacy, and awareness, resistance to technology will be felt indirectly. **Conclusions:** This demonstrated that most discussed factors, such as Ease-of-Use and security of use, are important for Generation Z users but no longer a major consideration in accepting digital banking. Aside from being more open to the use of technology in digital banks, Generation Z also desires a balance of technology services and benefits. The limitations of this study are that it excludes social variables, uses certain generations, and limits the research area to one large city, which can be expanded in future studies.

**Keywords :** Channel Distribution, Digital Bank, User Attitude, Technology Resistance, Gen Z

**JEL Classification Code:** D39, G21, G29, M10, O33

### 1. Introduction

Technology has transformed global banking services and shaped competition in electronic financial service channels (Giovanis et al., 2019; Takiieddine & Sun, 2015). This is due to the banking industry's responsiveness to changes or

market needs (Yaseen & Qirem, 2018). The presence of digital banks is one of the banking industry distributions that can integrate technology and convenience services. People can now use digital banking channel distribution such as digital kiosks, ATMs, mobile banking, and internet banking (Sarel & Marmorstein, 2003). One of the advantages of

1 First Author. Lecturer, Faculty of Economics and Business, Universitas Trisakti, Indonesia. Email: [ekoretno@trisakti.ac.id](mailto:ekoretno@trisakti.ac.id) ORCID: 0000-0001-5966-327X

2 Second Author and Corresponding Author, Lecturer, Management and Master of Management, Faculty of Social Sciences and Humanities, Universitas Bunda Mulia, Indonesia. Email: [michaelchristianid@gmail.com](mailto:michaelchristianid@gmail.com) ORCID: 0000-0001-8892-5400

3 Third Author, Lecturer, Communication Studies, Faculty of Social Sciences and Humanities, Universitas Bunda Mulia, Indonesia. Email: [henilia.yulita@gmail.com](mailto:henilia.yulita@gmail.com) ORCID: 0000-0002-3782-2273

4 Fourth Author. Lecturer, Accounting, Faculty of Economics and Business, Universitas Trisakti, Indonesia. Email: [titik.aryati@trisakti.ac.id](mailto:titik.aryati@trisakti.ac.id) ORCID: 0000-0003-2821-2067

5 Fifth Author. Lecturer, Accounting, Faculty of Economics and Business, Universitas Trisakti, Indonesia. Email: [regina.arsjah@trisakti.ac.id](mailto:regina.arsjah@trisakti.ac.id) ORCID: 0000-0002-0122-8838

© Copyright: The Author(s)

This is an Open Access article distributed under the terms of the Creative Commons Attribution Non-Commercial License (<http://creativecommons.org/licenses/by-nc/4.0/>) which permits unrestricted noncommercial use, distribution, and reproduction in any medium, provided the original work is properly cited.

using digital banking is that it can reduce operational costs (He et al., 2019), particularly when it comes to optimizing customer services. Furthermore, digitizing banking service distribution allows underserved people in specific areas to be connected to the mainstream banking system (Kaur et al., 2021).

Digital banking services in Indonesia, according to Financial Services Authority Regulation Number 12/PJOK.03/2018, optimize customer data to provide bank customers with the distribution of information, communication, and banking transactions via electronic media that are fast, convenient, and in line with customer needs. This transaction is evolving into a variety of integrated service features, such as payment services for various merchants, which are increasingly providing maximum benefits to customers. According to Jamshidi and Hussin (2016), these perceived benefits demonstrate how effectively technology meets the needs of adopters. Previous research on technology adoption has confirmed the construct's validity and reliability (Jamshidi & Hussin, 2016; Priya et al., 2018). The perceived usefulness of technology is a major factor in its adoption (Ratten, 2015b). One reason for this is the individual's desire to make an objective decision, which includes digital banking service distribution (Malatji et al., 2020). Despite the rapid growth of the digital banking trend, the return on investment from technology costs in banks, for example, is only 12% when compared to banks in developed countries such as the United States (Sinha & Mukherjee, 2016).

Previous research has highlighted the trend of digital banking distribution, which was initially referred to as "online banking" or "mobile banking" in various countries. He et al. (2019). In Chinese banks, for example, important determinants include competition, bank size, and high and low levels of return on assets. Other research from Alalwan et al. (2017) on banks in Jordan explains that price value, social influence, and hedonic motivation all influence mobile banking adoption. Another compelling reason is that digital banking services distribution are used as a competitive survival strategy, as is the case with banks. Other studies focus on usability and usefulness (Abbad, 2013; Rawashdeh, 2015), while others focus on security (Al-Zu'bi et al., 2014; Sánchez-Torres et al., 2018).

Few have, however, expressed concerns about technological barriers in digital banks. The presence of a digital bank in which the technology and features of various services are distributed for convenience and benefit must be measured in terms of user barriers. The term "resistance to technology" is used to describe this barrier (Anouze & Alamro, 2020). Another viewpoint is that technology has an impact on how people use bank services (Abu-Taieh et al., 2022; Samsudeen et al., 2022). Furthermore, for users of the younger generation, such as generation Z (Gen Z), who have

a personality that enjoys experimenting with new technologies, including digital banks, the Ease-of-Use is a significant barrier in encouraging the use of the services distribution. Banks' significant investment and effort in providing digital banking services will be futile if users do not accept or adopt them. This aspect is expected to add novelty by balancing the measurement of ease-of-use with barriers to users, particularly those from Gen Z. As a result, the purpose of this study is to examine attitudes toward using digital banks by incorporating aspects of resistance to use as a moderating variable.

## **2. Literature Review**

### **2.1. Ease-of-use**

Revising Davis's (1989) earlier concept that the Ease-of-Use of a system is one of the determining factors in encouraging sustainable use. This is also true for digital service distribution such as banks. This demonstrates that users can easily understand how to use a bank service (Anouze & Alamro, 2020; Kaur et al., 2021). Service providers must provide Ease-of-Use as a component of service quality that influences satisfaction and attitude toward use.

### **2.2. Usefulness**

Usefulness, like Ease-of-Use, is an important aspect that service providers must be able to provide to users. This will influence the user's attitude toward use (Davis, 1989). This usability aspect may reduce usage effort (Nath et al., 2013; Roy et al., 2017) or provide the benefit of a faster transaction service (Anouze & Alamro, 2020; Kaur et al., 2021). As a result, this aspect of usability determines whether a system or service will be used again.

### **2.3. Security**

According to Salisbury et al. (2001), the security aspect is a type of feeling safe when using a service, particularly regarding internet technology. Service providers must provide a sense of security when using electronic technology-based services over time (Cheng et al., 2006). As a result, banks must be able to assure customers that the services they use are secure (Anouze & Alamro, 2020). This is necessary to avoid causing customers anxiety.

### **2.4. Costs**

Costs in this case include those incurred when utilizing a digital banking service (Kaur et al., 2021). Furthermore, this

concept explains that the lower the fees charged, the more reasonable the use of a bank service supported by a suite of sophisticated technologies. Cost is an important factor in determining digital banking service distribution from another angle (Ciciretti et al., 2009).

## 2.5. Self-efficacy

The Ease-of-Use of a technology-based service distribution, such as a digital bank, is heavily influenced by self-efficacy. According to (Kaur et al., 2021) high self-efficacy can assist customers in completing service transactions efficiently and without significant obstacles. This concept also explains why customers will not require extensive assistance from either the available service features or the surrounding environment. The extent to which efficiency effects are formed will influence customer attitudes (Lee et al., 2011).

## 2.6. Awareness

Customers can use the presence of technological sophistication in bank service distribution such as digital banks to assist with daily financial transactions (Shaikh et al., 2020). In this case, awareness explains how the presence of a digital bank service is not only mobile in use but also integrated with various payment services. As a result, banks, as service providers, feel obligated to inform the public of the existence of this digital bank (Alnsour, 2013; Alnsour & Al-Hyari, 2011).

## 2.7. Resistant to Technology

A reaction that is resistant to technology describes a reaction or action that tends to reject an innovation in existing technology. Technology that is strongly linked to an innovation, as is well known, can support business continuity (Christian & Justinus, 2021). It is undeniable that digital banks distribution are available as a solution for convenience and quick transactions at any time and from any location (Shaikh & Karjaluo, 2016). However, this sophistication frequently creates barriers in the form of difficulties in use for some users. As a result, banks must remove such impediments (Mani & Chouk, 2017; Salisbury et al., 2001).

## 2.8. Attitude to Use

According to Malaquias and Hwang (2019), perceived benefits include the benefits by technology. Similarly, other researchers (Wallace & Sheetz, 2014) believe that perceived benefit is an individual's belief that certain technologies can improve his or her needs. Another factor that influences the

user's assessment of the benefits of technology is the user's lifestyle. Ratten (2015a), (2015b) stated that users will believe a technology is valuable if they believe it fits their lifestyle. Someone will also consider adopting a technology if it can effectively assist someone in meeting and needs (Davis, 1989; Malaquias & Hwang, 2019).

## 2.9. Hypothesis Development

### 2.9.1. The Relationship Between Ease-of-Use, Resistant to Technology and Attitude to Use

The belief that using an IT-based framework will facilitate the distribution and implementation (Malatji et al., 2020). Constraints will impact on the decision to use a service. According to Anouze and Alamro (2020), the convenience factor can create a desire to continue using a bank service. Avoidable obstacles promote Ease-of-Use, which ultimately improves user performance (Nath et al., 2013). Based on the concepts described, this study proposes the following hypotheses:

- H1<sub>a</sub>:** Ease-of-Use has a significant impact on resistant to technology.
- H1<sub>b</sub>:** Ease-of-Use has a significant impact on attitudes toward use.
- H1<sub>c</sub>:** Ease-of-Use, as mediated by technological resistance, has a significant influence on attitudes toward use.

### 2.9.2. The Relationship Between Usefulness, Resistant to Technology and Attitude to Use

Several studies have been conducted to investigate the relationship between usability and attitudes toward using a banking service. In relation to the impact of perceived usefulness, users would continue to use a bank service distribution if the effort required to complete a transaction is reduced (Nath et al., 2013; Roy et al., 2017). This also explains why technical barriers to using a bank service have no effect on the service itself (Anouze & Alamro, 2020). Furthermore, this usability factor correlates positively with usage attitudes (Gounaris & Koritos, 2008; Ozdemir et al., 2008). Based on these explanations, the following hypotheses are proposed in this study:

- H2<sub>a</sub>:** Usefulness has a significant impact on resistant to technology.
- H2<sub>b</sub>:** Usefulness has a significant impact on attitudes toward use.
- H2<sub>c</sub>:** Usefulness mediated by technological resistance, has a significant influence on attitudes toward use.

### 2.9.3. The Relationship Between Security, Resistant to Technology to Technology and Attitude to Use

It is undeniable that security is an important key factor in banking transactions, particularly digital transactions, and that bank service providers must ensure it. Customers will want to use the service if they believe they are safe. Complex technical processes, on the other hand, can be a barrier to use and a source of concern for customers. Concern in this case raises the question of whether the customer's transaction was successful or not. Several studies have also found a link between security, barriers, and the use of digital bank services themselves. According to Salisbury et al. (2001), the good concerns in it, which include all types of obstacles, can be avoided if the customer feels secure. In line with this, Cheng et al. (2006) asserted that a sense of security can influence customer usage attitudes. These explanations led to the following hypotheses in this study:

- H3<sub>a</sub>:** Security has a significant impact on resistance to technology.
- H3<sub>b</sub>:** Security has a significant impact on attitudes toward use.
- H3<sub>c</sub>:** Security, as mediated by resistance to technology, has a significant impact on attitudes toward its use.

### 2.9.4. The Relationship Between Costs, Resistant to Technology and Attitude to Use

There is a cost associated with the use of digital banking service distribution in their implementation, which most service users are unaware of. Even though the benefits and Ease-of-Use have been achieved, some users may find this a sensitive issue to consider. This is consistent with the criticisms of the TAM model raised by Malatji et al. (2020), in which the cost of adopting a new technology is one of the factors that must be considered. Difficulty in utilizing services is also regarded as a barrier that can result in costs. This study proposes the following hypothesis based on the explanations presented:

- H4<sub>a</sub>:** Costs have a significant impact on technological resistance.
- H4<sub>b</sub>:** Costs have a significant impact on attitudes toward using
- H4<sub>c</sub>:** Costs, as mediated by resistance to technology, has a significant impact on attitudes toward its use.

### 2.9.5. The Relationship Between Self-efficacy, Resistant to Technology and Attitude to Use

Customers' ability, experience, or information can all contribute to their sense of self-efficacy. Self-efficacy directs efficiency in the use of services such as digital

banking in the process, so that barriers to using a service are no longer felt (Nath et al., 2013). Thus, self-efficacy, which is based on efficiency of use, can influence service use (Sharma & Govindaluri, 2014). This is also thought to be an important factor in the acceptance, adoption, and distribution of a technology, such as one used in digital banking services (Banu et al., 2019). This study proposes the following hypotheses based on existing concepts:

- H5<sub>a</sub>:** Self-efficacy has a significant impact on resistance to technology.
- H5<sub>b</sub>:** Self-efficacy has a significant impact on attitudes toward use.
- H5<sub>c</sub>:** Self-efficacy, as mediated by resistance to technology, has a significant impact on attitudes toward its use.

### 2.9.6. The Relationship Between Awareness, Resistant to Technology and Attitude to Use

Inadequate public knowledge and awareness can result in underutilized digital banking service distribution (Shaikh et al., 2020). Customers' knowledge will determine their usage abilities (Sadowski, 2017). Customers who are aware of the availability of new digital technology-based services can adopt a sustainable use attitude. This is regarded as an important consideration when using a service (Alnsour, 2013; Alnsour & Al-Hyari, 2011). This concept's explanations raise the following hypotheses:

- H6<sub>a</sub>:** Awareness has a significant impact on resistance to technology.
- H6<sub>b</sub>:** Awareness has a significant impact on attitudes toward use.
- H6<sub>c</sub>:** Awareness, as mediated by resistance to technology, has a significant impact on attitudes toward its use.

### 2.9.7. The Relationship Between Resistant to Technology and Attitude to Use

Even though digital banking is an innovative banking channel distribution (Shaikh & Karjaluo, 2016), the application of technology in digital banking requires a significant investment, so efforts are required to return capital through customer transactions (Kaur et al., 2021). Furthermore, technological developments presented to the public should not create resistance, which can become an impediment to intentional use (Mani & Chouk, 2017). This resistance barrier can also form in the face of technology adoption. As a result, the following hypothesis is proposed in this study:

- H7:** Technology resistance has a significant impact on attitudes toward use.

This study proposes a conceptual research framework, as shown in Figure 1, based on the development of the hypotheses described above.

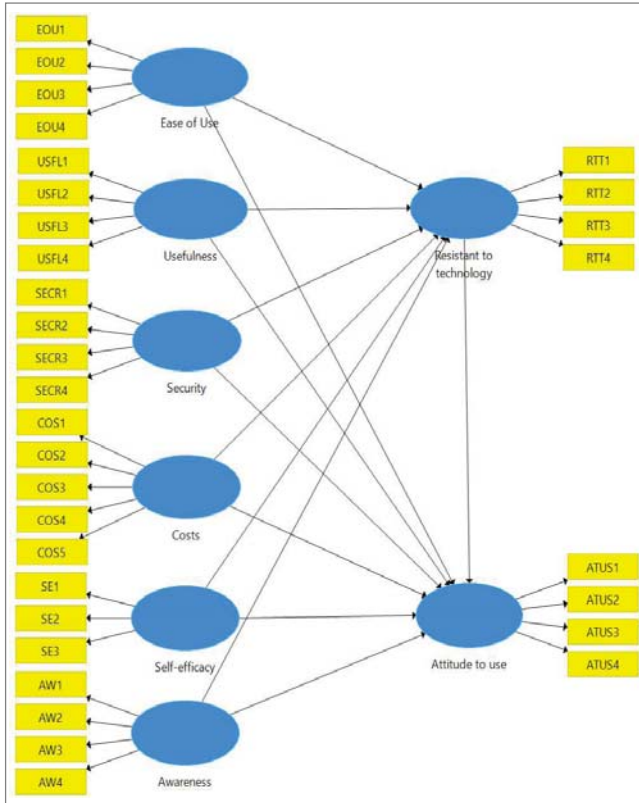


Figure 1: Conceptual Framework

### 3. Research Methods and Materials

#### 3.1. Research Design

This quantitative study employs partial least squares structural equation modeling (PLS-SEM) with SmartPLS 3.0 as an analysis tool. Six exogenous variables, one mediator variable, and one endogenous variable are used in this study. Indicators are used to measure each variable, as shown in Table 1. Exogenous variables include Ease-of-Use (four indicators), usefulness (four indicators), security (four indicators), cost (five indicators), and self-efficacy (three indicators). Indicators are used to measure each variable, as shown in Table 1. Exogenous variables include Ease-of-Use (4 indicators), usefulness (4 indicators), security (4 indicators), cost (5 indicators), self-efficacy (3 indicators),

and awareness (four indicators). Resistance to technology is used as a mediator variable, with four indicators. Furthermore, endogenous variables employ attitude, which is comprised of four indicators.

#### 3.2. Sample and Data Collection

This quantitative study employs partial least squares structural equation modeling. This study used a survey method. The distribution of online questionnaires is used to collect data from participants. The survey was carried out from May to June 2022. Because the population size was not known with certainty, the sample size was determined by multiplying the number of indicators by 5 (the minimum sample size) to 10 (the maximum sample size) (Benitez et al., 2020; Wolf et al., 2013). The sample size in this study was determined to be as many as 320 samples with inclusion criteria, namely members of Gen Z in Jakarta who use one of the digital banks, with 32 indicators. Individuals born after 1995 comprise this generational group (Bassiouni & Hackley, 2014). The age criteria for this generation group were then adjusted based on the general assumption that in Indonesia, individuals entering the adult age category started at 17 years old (minimum age), and the maximum age in this study was 26 years. To ensure that all participants used a digital bank, two screening questions were asked at the beginning of the questionnaire, namely, whether participants used a digital bank in Indonesia and which digital bank was used most frequently. The participants were then asked to continue filling out the questionnaire.

#### 3.3. Analysis Techniques

This study employs SmartPLS 3.0 with structural modeling to analyze the data. The first analysis in this study looked at the reliability and validity of the data. The reliability test is based on Cronbach's alpha (CA) and composite reliability (CR) values greater than 0.7, while the validity test is based on outer loading (OL) values greater than 0.7 and average variance extracted (AVE) values greater than 0.5 (Barati et al., 2019; Memon & Rahman, 2014). Furthermore, this study looked at the model's fit, which was determined by the results of the saturated root mean square (SRMR) 0.01 and the Nordic fit index (NFI), which had to be close to 1 (Hu & Bentler, 1999; Hussain et al., 2018). Meanwhile, in this study, the coefficient of determination is calculated using adjusted R<sup>2</sup> (0.5 = weak; 0.5 = moderate; > 0.75 = strong). The following analysis is a hypothesis testing analysis based on p-values less than 0.05 (Ali et al., 2020; Otache, 2019).

**Table 1: Operationalization Variable**

Variable	Indicator		Reference studies
Attitude to use	In the future, I plan to continue using digital banking.	ATUS1	Anouze & Alamro (2020)
	I would advise others to use the digital bank.	ATUS2	
	I have always preferred online banking.	ATUS3	
	I am pleased with the services offered by the digital bank.	ATUS4	
Ease-of-Use	I find it simple to use the digital banking service.	EOU1	Anouze & Alamro (2020); Kaur et al. (2021)
	I understand the use of a digital bank.	EOU2	
	I quickly became accustomed to using the digital banking service.	EOU3	
	Overall, I find it simple to use the digital banking service.	EOU4	
Usefulness	Using a digital bank will allow me to complete financial tasks more quickly.	USFL1	Anouze & Alamro (2020); Kaur et al. (2021)
	Using the digital bank will make it easier for me to complete my financial transaction tasks.	USFL2	
	The digital bank, in my opinion, is beneficial to me personally.	USFL3	
	Overall, I believe that using a digital bank is beneficial.	USFL4	
Security	I believe it is safe to send sensitive/personal information (e.g., personal data, PIN, etc.) via digital bank.	SECR1	Anouze & Alamro (2020)
	In comparison to traditional banks, a digital bank is a type of bank that is also safe to provide sensitive or personal information.	SECR2	
	I will feel completely secure providing the sensitive/personal information required via the digital bank.	SECR3	
	Overall, the digital bank is a secure location to send sensitive or personal data.	SECR4	
Cost	I am aware that I'll be charged a fee for using the digital bank transaction.	COS1	Anouze & Alamro (2020)
	When using these digital bank transactions, Internet data costs will be high.	COS2	
	The additional services charged for digital bank transactions are costly.	COS3	
	For me, the digital bank transaction fees are a burden.	COS4	
	The overall cost of conducting digital bank transactions is higher than that of traditional banks.	COS5	
Self-efficacy	I am confident that I will use the digital bank for other purposes.	SE1	Anouze & Alamro (2020); Kaur et al. (2021)
	I am not afraid to use the digital bank directly if I'm given clear instructions.	SE2	
	I'm not afraid to use the digital bank if I have someone/someone who understands it and can be contacted if I have any problems.	SE3	
Awareness	I learned enough about the digital bank service.	AW1	Anouze & Alamro (2020)
	I was given enough information about the benefits of the digital bank.	AW2	
	I was given enough information about how to use the digital bank.	AW3	
	I never received any information about the digital bank.	AW4	
Resistant to technology	I would like to learn more about each new technological advancement of the digital bank.	RTT1	Anouze & Alamro (2020)
	Technological advancements, particularly those related to digital banking, have, in my opinion, improved people's lives.	RTT2	
	For my financial transactions, I am at ease using the digital bank service.	RTT3	
	I would like to play around with the digital bank service (try out different features).	RTT4	

## 4. Results and Discussion

### 4.1. Results

#### 4.1.1. Distribution of Participant Profiles

Table 2 shows that female participants dominated this study, accounting for more than half of all participants. This figure is not significantly different from that of male participants. Most of the participants in this study were between the ages of 21 and 22, with participants aged 19-20 years and 23-24 years accounting for more than half of the

total. In this study, more than 30% of Gen Z came from North Jakarta, with South Jakarta accounting for less than 10%. The Jenius digital bank was used by nearly 43% of the participants in this study, followed by Bank Jago and Blu, each with less than 14%. Meanwhile, Motion and Permata Bank were the digital banks that were used the least by the study's participants, with each transaction amounting to less than 1%. Based on existing trends and technological developments, participants in this study had varying lengths of use. Participants used the digital bank the longest, for two years, with a total of nearly 25%, and the shortest, for three years, with a total of less than 4%.

**Table 2:** Distribution of Participant Profile

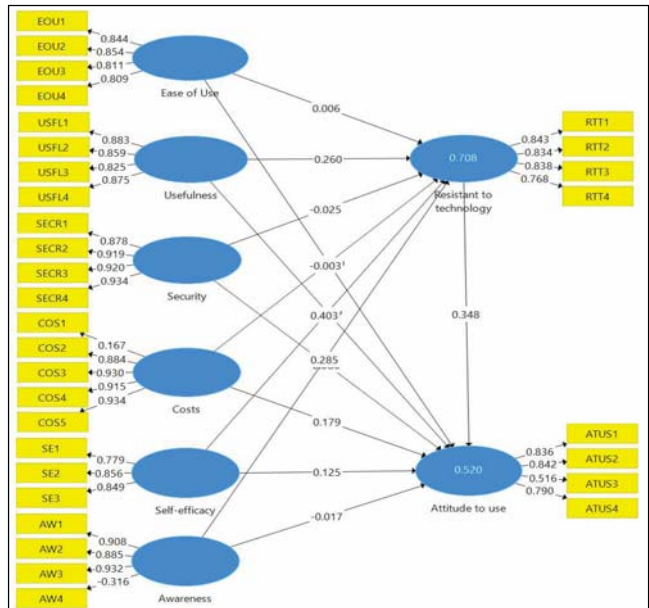
		N	%
Gender	Female	184	57.5%
	Male	136	42.5%
Age	17-18 years	20	6.25%
	19-20 years	52	16.25%
	21-22 years	182	56.88%
	23-24 years	46	14.38%
	25-26 years	20	6.25%
Residence location	North Jakarta	106	33.13%
	West Jakarta	49	15.31%
	Central Jakarta	43	13.44%
	East Jakarta	90	28.13%
	South Jakarta	32	10%
Frequently used digital banks	Bank Jago	42	13.13%
	Blu	39	12.19%
	Digibank	6	1.88%
	Jenius	137	42.81%
	LINE Bank	51	15.94%
	Motion	2	0.63%
	Neobank	12	3.75%
	Permata Bank	2	0.63%
	Seabank	29	9.06%
How long have you used online banking?	Less than a year	112	35%
	1 year	96	30%
	2 years	77	24.06%
	3 years	11	3.44%
The Benefits of Using a Digital Bank	More than 3 years	24	7.50%
	Payment method compatibility with a wide range of merchants	10	3.13%
	Several promotions	93	29.06%
	Many friends and family already use	61	19.06%
	Follow the trend	76	23.75%
The function of using a digital bank	Easy to use	55	17.19%
	I really like the brand name	25	7.81%
The function of using a digital bank	The main bank	269	84.06%
	Complementary banks	51	15.94%
How did you first learn about this digital bank?	Social media or chat messaging advertisements	159	49.69%
	Closest people (friends, relatives, family)	96	30%
	Exhibition	65	20.31%

According to the motivation for using digital banks, the participants in this study used digital banks the most to obtain forms of promotion and to follow trends, with a total of more than 20% each. The study's subsequent findings also revealed that participants were unconcerned about the compatibility of payment methods at various merchants. This is because this is not the primary motivation for the participants in this study. The shift in trend from traditional to digital services in banks, according to this study, explains why digital banks account for more than 80% of Gen Z banking. While the rest continue to use digital banks as supplemental banks. The speed with which digital banks in Indonesia reach the public, particularly the study participants, explains why nearly half of digital banks are known through advertisements distribution on social media

and chat messaging. For the first time, the influence of close friends and family became the second largest medium in providing information about digital banks for participants in this study, with a total of 30%. Conventional marketing, such as exhibitions in crowded places like malls, is the final medium through which participants in this study can learn about digital banks.

**4.1.2. PLS Algorithm Measurement**

The outer loading (OL) in Figure 2 of this study explains why all variables have results greater than 0.7. The Ease-of-Use variable displays the results of items that meet the conditions (EOU1, EOU2, EOU3, and EOU4). Similarly, the Usefulness variable displays the results of the four items (USFL1, USFL2, USFL3, and USFL4) that also meet the criteria for this study. Furthermore, the security variable (SECR1, SECR2, SECR3, and SECR4) produces results that are consistent with the provisions. One variable (COS1) in the Costs variable does not result in 0.7, so it must be removed. Other items in this variable (COS2, COS3, COS4, and COS5) have produced results that meet the study's criteria. The self-efficacy variables (SE1, SE2, and SE3) also produce results that meet the criteria. On the Awareness variable, AW4 has a result of < 0.7 out of the four items (AW1, AW2, AW3, and AW4), so it must be eliminated. All items (RTT1, RTT2, RTT3, and RTT4) meet the requirements for the resistance to technology variable. Furthermore, the ATUS3 item in the Attitude to Use variable does not meet the conditions, so it must be deleted so that the other items in this variable do. All items in this study were valid after re-running after deleting the data.



**Figure 2:** Outer Loading

Table 3 displays the results of other validity tests based on discriminant validity, in which all the variables in this study performed well. These results demonstrate that all variables are valid, can provide evidence of the construct's uniqueness, and can explain the phenomenon being measured. The average variance extracted (AVE) results,

which showed a result greater than 0.5, also bolstered the discriminant validity in this study. Table 2 also shows the results of reliability based on Cronbach's alpha (CA) and composite reliability (CR), where all variables have results greater than 0.7, indicating that all variables in this study are reliable.

**Table 3:** Distribution of reliability and validity test results

Variable	CA	CR	AVE	Discriminant validity							
				EOU	USFL	SECR	COS	SE	AW	RTT	ATUS
Ease-of-Use	0.849	0.898	0.689	0.830	-	-	-	-	-	-	-
Usefulness	0.883	0.920	0.920	-	0.861	-	-	-	-	-	-
Security	0.933	0.952	0.952	-	-	0.913	-	-	-	-	-
Costs	0.949	0.963	0.963	-	-	-	0.932	-	-	-	-
Self-efficacy	0.771	0.868	0.868	-	-	-	-	0.828	-	-	-
Awareness	0.898	0.936	0.831	-	-	-	-	-	0.911	-	-
Resistant to technology	0.839	0.892	0.892	-	-	-	-	-	-	0.821	-
Attitude to use	0.777	0.870	0.691	-	-	-	-	-	-	-	0.831

Note: OL=Outer loading (>0.7); CA=Cronbach's alpha (>0.7); CR=Composite reliability (>0.7); AVE=Average variance extracted (>0.5); EOU = Ease-of-Use; USFL=Usefulness; SECR=Security; COS=Costs; SE=Self-efficacy; AW=Awareness; RTT=Resistant to technology; ATUS=Attitude to use

#### 4.1.3. Fit Model and Coefficient of Determination

Table 4 shows the results of the fit model on the saturated root mean square (SRMR) of 0.068, which is still within the conditions (< 0.1). The Normed Fit Index (NFI) results show 0.767, which is close to 1. Both outcomes demonstrate that the model meets the fit criteria. Meanwhile, Table 3 shows that the adjusted R2 result for resistance to technology is 0.705. The use of variables (Ease-of-Use, usefulness, security, costs, self-efficacy, awareness) can explain 70.5% of the relationship between resistance to technology. Furthermore, the adjusted R2 result of 0.531 explains 53.1% of the relationship between the variables (Ease-of-Use, usefulness, security, costs, self-efficacy, awareness, and resistance to technology).

**Table 4:** Model fit and Coefficient of Determination

Description	Saturated model	Estimated model	R <sup>2</sup> adjusted
SRMR	0.068	0.068	-
NFI	0.767	0.767	-
Resistant to technology	-	-	0.705
Attitude to use	-	-	0.531

Note: SRMR=Standardized Root Mean Square (<0.1); NFI=Normed Fit Index

#### 4.1.4. Hypothesis Testing

Table 5 displays the results of the research hypothesis test. The P-value of 0.395 (> 0.05) in the Ease-of-Use path to Attitude to Use explains why this study rejects the H1a hypothesis, or why Ease-of-Use has no significant effect on

Attitude to Use. The ease-of-use path towards resistance to technology yields the same result, with P = 0.891 (> 0.05), indicating that the ease-of-use path has no significant effect on resistance to technology. In other words, the H1b hypothesis is not supported by this study. Similarly, the resistant to technology mediation path on Ease-of-Use versus attitude toward use shows P = 0.894 (> 0.05). These findings indicate that the hypothesis H1c's mediating effect is not supported, or that resistance to technology does not mediate the effect of Ease-of-Use on attitude toward use.

Furthermore, the study accepts the H2a hypothesis, as evidenced by the P value of 0.000 (< 0.05) on the usefulness path towards attitude toward use. As a result, usefulness has a significant influence on the attitude toward use. The H2b hypothesis, with P = 0.002 (< 0.05) for the usefulness path on resistant technology, is also accepted, explaining the significance of the usefulness effect on resistant technology. The P value for this mediation pathway on the Usefulness Mediation Effect is 0.018. (< 0.05). These findings explain how resistance to technology can act as a mediator between usefulness and attitude toward use. In other words, the findings of this study support the H2c hypothesis.

The security variable has no effect on attitude toward use (P > 0.05), indicating that this study rejects the H3a hypothesis. The same result is explained in the security path against resistant technology, where P > 0.05, indicating that security has no effect on technology resistance. As a result of these findings, hypothesis H3b is rejected. As a result of the inability of resistance to technology to mediate security against an attitude toward use, the H3c hypothesis can also be explained.



For the other path, Costs to Attitude to Use,  $P = 0.001 (< 0.05)$ . These results explain that costs significantly influence attitudes toward use, or, in other words, that the H4a hypothesis is accepted. Different results are shown in the Costs path to technology resistance, where  $P = 0.834 (> 0.05)$ , indicating that the H4b hypothesis is rejected. These

findings demonstrate that costs have no effect on attitudes toward use. As a mediator, the result of  $P = 0.840 (> 0.05)$  explains that resistance to technology is not able to mediate the effect of costs on attitude toward use. This result, in other words, explains that this study does not support H4c.

**Table 5:** Hypothesis Test

Path	STD	T statistics	P-Values	Remark
<b>Direct effects</b>				
Ease-of-Use → Attitude to use	0.075	0.852	0.395	H1a: rejected
Ease-of-Use → Resistant to technology	0.070	0.137	0.891	H1b: rejected
Usefulness → Attitude to use	0.068	5.563	0.000	H2a: accepted
Usefulness → Resistant to technology	0.085	3.061	0.002	H2b: accepted
Security → Attitude to use	0.072	1.036	0.301	H3a: rejected
Security → Resistant to technology	0.059	0.530	0.597	H3b: rejected
Costs → Attitude to use	0.043	3.363	0.001	H4a: accepted
Costs → Resistant to technology	0.030	0.209	0.834	H4b: rejected
Self-efficacy → Attitude to use	0.070	2.047	0.041	H5a: accepted
Self-efficacy → Resistant to technology	0.072	5.557	0.000	H5b: accepted
Awareness → Attitude to use	0.070	0.299	0.765	H6a: rejected
Awareness → Resistant to technology	0.071	4.143	0.000	H6b: accepted
Resistant to technology → Attitude to use	0.073	4.534	0.000	H7: accepted
<b>Indirect effects</b>				
Ease-of-Use → Resistant to technology → Attitude to use	0.024	0.134	0.894	H1c: rejected
Usefulness → Resistant to technology → Attitude to use	0.036	2.384	0.018	H2c: accepted
Security → Resistant to technology → Attitude to use	0.020	0.523	0.601	H3c: rejected
Costs → Resistant to technology → Attitude to use	0.010	0.202	0.840	H4c: rejected
Self-efficacy → Resistant to technology → Attitude to use	0.037	3.557	0.000	H5c: accepted
Awareness → Resistant to technology → Attitude to use	0.031	3.088	0.002	H6c: accepted

Noted: STD=Standard deviation; P-values<0.05

Self-efficacy was  $P = 0.041 (< 0.05)$  in this study, indicating that it has a significant influence on attitude toward use. These findings support the acceptance of hypothesis H5a.  $P = 0.000 (< 0.05)$  showed the same results in the self-efficacy pathway for resistance to technology, where H5b was also accepted. In other words, these findings explain how self-efficacy influences resistance to technology. With a P value of 0.000, resistance to technology can act as a mediator in the relationship between self-efficacy and attitude toward use ( $< 0.05$ ).

Other findings are explained by the awareness variable, where the awareness path towards the use attitude has a  $P = 0.765 (> 0.05)$ . These findings explain why the awareness path has no effect on attitudes toward use, or why H6a is rejected. Furthermore, the P value on the awareness path to resistance to technology is 0.000. ( $< 0.05$ ). These findings explain why this study backs up hypothesis H6b. These findings highlight the importance of the awareness path in influencing resistance to technology. The results of the same hypothesis are also explained by the mediation pathway of resistance to technology on the effect of awareness on

attitude toward use, where  $P = 0.002 (< 0.05)$ . These findings explain how resistance to technology can act as a buffer between awareness and attitudes toward its use. In other words, hypothesis H6c is accepted in this study.

The attitude toward use is 0.000 in the final hypothesis, H7, where P is on the resistance to technology path ( $< 0.05$ ). The significance of technological resistance and attitudes toward its application is explained by these findings. As a result, this study explains why the H7 hypothesis is accepted.

## 4.2. Discussion

The assumption that using an IT framework can improve the efficiency of the work being done (Malatji et al., 2020). The perceived usefulness of technology is also related to its value, which is the relative comparison between the costs of procurement and the benefits provided (Suhartanto & Leo, 2018). The general idea of adopting the definition of "Ease-of-Use" comes from Davis (1989), who defines this factor as an individual's view or belief about the extent to which he

will be free of effort in using a particular system. According to this definition, Ease-of-Use in using technology related to bank service distribution emphasizes confidence in being able to use digital banking. This also demonstrates that this factor is linked to user attitudes (Christian & Agung, 2020). In digital-based banks, the effectiveness of technology is associated with a comparison of services with and without cellular technology (only with conventional services). If the bank's services perform as expected, adoption behavior is likely; conversely, if the service's performance is not as expected, adoption behavior is unlikely.

These findings are intriguing when compared to previous research that has taken a different stance, such as that of Hu et al. (1999), who explains that the ease-of-use factor has no effect on medical personnel's willingness to use technology-based work tools such as telemedicine. This is due to the user's general competence and above-average intellectual capacity when it comes to using telemedicine. If the measurement is done on the use of technology distribution in bank services that use technology, such as online banking, the results of this study will be different (Pikkarainen et al., 2004). Thus, the findings of this study emphasize the simplicity of most application technologies that can influence usage intentions, particularly those related to services and those that can provide user satisfaction (Christian, Wibowo, et al., 2022). The user group of Gen Z has demonstrated general competence in the form of knowledge to use digital banking. This group has a strong desire to use digital banking services, even though it is unlikely that they will encounter any difficulties in doing so.

The belief in the benefits of dealing with financial transactions that can be completed more quickly shapes usefulness in this study. This also emphasizes the importance of usability in the acceptance and adoption of technology in digital banking services (Anouze & Alamro, 2020; Kaur et al., 2021). The generations in this study seriously consider the advantages of using digital banking services. It can also remove existing barriers to use if this generation perceives meaningful benefits. As a result, marketing to users from Gen Z will increase the bank's success in providing digital banking service distribution.

Like most users, the main consideration in forming a sense of security when using digital banking is security, particularly in terms of user personal data. This emphasizes the importance of security in the use of digital banking service distribution (Anouze & Alamro, 2020). Users from Gen Z, on the other hand, do not see security as a concern, according to this study. As a result, this generation believes that the sophistication of technology used in digital banking services has proven and dependable security standards. This could be attributed to a willingness to accept and adopt technological sophistication in banking services.

The dominant source of costs in this study is being aware that there are additional costs associated with using digital banking service distribution. This study also explains that Gen Z, as digital banking users, is unconcerned about the fees associated with the services provided. However, if they encounter obstacles or difficulties in using digital banking services, this generation will consider using them. This is consistent with the findings of (Alalwan et al., 2017), who discovered that cost influences the use of banking services.

On the self-efficacy factor, users from Gen Z are not concerned about using digital banking because they have close friends and family who can help them if there are any questions. Users' lack of self-efficacy can lead to switching to other brands (Lee et al., 2011). This study emphasizes that Gen Z, as digital banking users, still requires adequate information about the use of digital banking service distribution, either from themselves because they are accustomed to it or from the environment.

Not every user is acquainted with the incorporation of technology in digital banking services. On the one hand, this will be detrimental to banks as service providers. Inadequate public knowledge and awareness can result in underutilized digital banking services (Shaikh et al., 2020). According to the findings of this study, awareness of Gen Z as digital banking users is a factor in banks' success in using digital banking services, if these users are provided with adequate information about features and how to use them. Information, such as advertisements distribution introducing new features and services or customer services, can help overcome the barriers to using digital banking.

Even though digital banking is an innovative banking channel distribution (Shaikh & Karjaluoto, 2016), the application of technology in digital banking requires a significant investment, so efforts are required to return capital through customer transactions (Kaur et al., 2021). This study explains the dominant forming aspect of technological resistance, namely the willingness to accept and investigate digital banking. This explains why, as digital banking users in this study, Gen Z believes that technological sophistication in digital banking service features can be learned and not become an impediment to use. This generation, with all its sophistication, can easily adapt to digital banking services.

In the context of technology and the use of a service, the results of this study are not entirely consistent with the findings of Ahmed et al. (2022). Although this study explains that the use of technology in a digital service cannot be separated from the role of the social environment and the performance of the service itself, users of Gen Z are no longer concerned with ease of use, security, and cost. This is also possible because this generation believes in the legitimacy of existing digital bank brands. This viewpoint sees trust as an important intermediary factor (Jena, 2022).

While most previous studies have generally explained a positive correlation between aspects of benefits, usability, costs, security, usability, and awareness of the presence of a new technology in a bank's services, this study demonstrated that resistance to technology is directly related to the attitude of use. Services for digital banking. As connoisseurs of new technological sophistication, Gen Z sees the difficulty of using technology as an impediment in this case. As a result, when it comes to digital banking Ease-of-Use, Gen Z sees difficulties as obstacles that can influence attitudes toward using digital bank services.

## **5. Conclusions**

This study makes an interesting contribution to the study of Gen Z's considerations when using digital banking services. This generation will accept digital banking if factors such as usefulness, service costs, self-efficacy, awareness of the presence of digital banking, and information on using digital banking services act as barriers to adoption. As a result, banks as service providers can reduce their efforts and costs in shaping the perceptions of potential Gen Z users, particularly in terms of Ease-of-Use and security of use. These factors are not insignificant for Gen Z users, but they are no longer a major factor in accepting digital banking. If this generation does not receive enough information and becomes unfamiliar with using digital banking service distribution, barriers to using them may form.

## **6. Implications**

### **6.1. Theoretical Implications**

According to the modeling concept used in this study, for prospective digital banking users from Gen Z, the Ease-of-Use of a technology application is no longer the most important factor influencing their intention to use digital banking. This is largely due to the characteristics of this generation, which is aware of the most recent distribution of information from widely used technologies such as digital banking. This is also related to technology adoption models such as the Unified Theory of Acceptance and Use (UTAUT), in which the performance expectancy factor is frequently associated with the usability aspect and the behavioral intention factor is linked to the awareness of the existence of technology, which attracts interest in its use. As a theoretical contribution, the findings of this study emphasize that these two factors (Ease-of-Use and awareness) can be considered in measuring Gen Z's intention to use digital banking. The younger the generation of digital

banking users, the less concerned they will be with Ease-of-Use and awareness. These findings also explain the role of intermediary factors other than technology in bridging digital bank services and user behavior, such as trust in the digital bank brand or the importance of the surrounding environment.

### **6.2. Practical Implications**

In this case, banks in Indonesia automatically gain future users from Gen Z and younger generations who can easily learn about the development of digital banking information in Indonesia, particularly in other major cities such as Jakarta. Based on this, banks can efficiently adjust marketing costs, which is frequently done in brand activation and product launch activities. Reaching and informing the Gen Z target users of digital banking in a relatively short period of time is an important part of these marketing activities. Furthermore, this study emphasizes the sophistication and integration of features in digital banking service distribution, which must be followed by user-beneficial aspects to avoid becoming obstacles. Users must be informed of the presence of all types of features in digital banking services to identify their features and usage. In this case, digital banking users from this generation prioritize a balance of the latest trends and technology as well as the benefits offered. Also, how well-known the brand is and how the environment is can influence how this generation uses a digital bank.

## **7. Limitations of the Study and Recommendation Future Research**

There are several research limitations in this study. Although this study focuses on personal factors in measuring digital banking intention, it does not include aspects of social influence, such as the influence of family, friends, or partners, which are commonly used in studies. As a result, future studies can compare measurements of social and personal factors. The following limitation is that this study only focuses on one generation, namely, Gen Z, which aims to measure users at a younger age. On the other hand, the "digital banking trend," as it is known, began with generation Y. Based on this, generational comparisons can be used as a consideration in future studies. The potential market for introducing technology such as digital banking in Indonesia is more appropriate if it is marketed in the early stages in large cities such as Indonesia, with the consideration that there are many young people of productive age available. However, other major cities must be included as a comparison in future studies.

## References

- Abbad, M. M. (2013). E-banking in Jordan. *Behaviour & Information Technology*, 32(7), 681–694. <https://doi.org/10.1080/0144929X.2011.586725>
- Abu-Taieh, E. M., AlHadid, I., Abu-Tayeh, S., Masa'deh, R., Alkhaldeh, R. S., Khwaldeh, S., & Alrowwad, A. (2022). Continued Intention to Use of M-Banking in Jordan by Integrating UTAUT, TPB, TAM and Service Quality with ML. *Journal of Open Innovation: Technology, Market, and Complexity*, 8(3), 1–29. <https://doi.org/10.3390/joitmc8030120>
- Ahmed, R. R., Štreimikienė, D., & Štreimikis, J. (2022). The extended UTAUT model and learning management system during COVID-19: Evidence from PLS-SEM and conditional process modeling. *Journal of Business Economics and Management*, 23(1), 82–104. <https://doi.org/10.3846/jbem.2021.15664>
- Al-Zu'bi, Z., Abu-Assi, H., & Dmour, H. (2014). Determinants of Internet Banking Adoption in Jordan. *International Journal of Business and Management*, 9(12), 169–196. <https://doi.org/10.5539/ijbm.v9n12p169>
- Alalwan, A. A., Dwivedi, Y. K., & Rana, N. P. (2017). Factors influencing adoption of mobile banking by Jordanian bank customers: Extending UTAUT2 with trust. *International Journal of Information Management*, 37(3), 99–110. <https://doi.org/10.1016/j.ijinfomgt.2017.01.002>
- Ali, G. A., Hilman, H., & Gorondutse, A. H. (2020). Effect of entrepreneurial orientation, market orientation and total quality management on performance Evidence from Saudi SMEs. *Benchmarking: An International Journal*, 27(4), 1503–1531. <https://doi.org/10.1108/BIJ-08-2019-0391>
- Alnsour, M. (2013). How to Retain a Bank Customer: A Qualitative Study of Jordanian Banks Relational Strategies. *International Journal of Marketing Studies*, 5(4), 123–131. <https://doi.org/10.5539/ijms.v5n4p123>
- Alnsour, M., & Al-Hyari, K. (2011). Internet Banking and Jordanian Corporate Customers: Issues of Security and Trust. *Journal of Internet Banking and Commerce*, 16(1), 1–15.
- Anouze, A. L. M., & Alamro, A. S. (2020). Factors affecting intention to use e-banking in Jordan. *International Journal of Bank Marketing*, 38(1), 86–112. <https://doi.org/10.1108/IJBM-10-2018-0271>
- Banu, A. M., Mohamed, N. S., & Parayitam, S. (2019). Online Banking and Customer Satisfaction: Evidence from India. *Asia-Pacific Journal of Management Research and Innovation*, 15(1–2), 68–80. <https://doi.org/10.1177/2319510X19849730>
- Barati, M., Taheri-Kharamah, Z., Farghadani, Z., & Rásky, É. (2019). Validity and Reliability Evaluation of the Persian Version of the Heart Failure-Specific Health Literacy Scale. *International Journal of Community Based Nursing and Midwifery*, 7(3), 222–230. <https://doi.org/10.30476/IJCBNM.2019.44997>
- Bassiouni, D. H., & Hackley, C. (2014). 'Generation Z' children's adaptation to digital consumer culture: A critical literature review. *Journal of Customer Behaviour*, 13(2), 113–133. <https://doi.org/10.1362/147539214X14024779483591>
- Benitez, J., Henseler, J., Castillo, A., & Schubert, F. (2020). How to perform and report an impactful analysis using partial least squares: Guidelines for confirmatory and explanatory IS research. *Information & Management*, 57(103168), 1–16. <https://doi.org/10.1016/j.im.2019.05.003>
- Boons, F., & Lüdeke-Freund, F. (2013). Business models for sustainable innovation: state-of-the-art and steps towards a research agenda. *Journal of Cleaner Production*, 45(2013), 9–19. <https://doi.org/10.1016/j.jclepro.2012.07.007>
- Cheng, T. C. E., Lam, D. Y. C., & Yeung, A. C. L. (2006). Adoption of internet banking: An empirical study in Hong Kong. *Decision Support Systems*, 42(3), 1558–1572. <https://doi.org/https://doi.org/10.1016/j.dss.2006.01.002>
- Christian, M., & Agung, H. (2020). Urban Consumer Behavior On Buying Multi-Products On Shopee Using Technology Acceptance Model(TAM). *Widyakala Journal*, 7(2), 54–60. <https://doi.org/10.36262/widyakala.v7i2.337>
- Christian, M., & Justinus, J. (2021). Identifying Determinants of Competitive Advantage for Ayam Geprek Business in Jakarta During the Pandemic Covid-19. *Journal of Business & Applied Management*, 14(1), 83–98. <https://doi.org/10.30813/jbam.v14i1.2712>
- Christian, M., Wibowo, S., Indriyarti, E. R., Sunarno, S., & Yuniarto, Y. (2022). Do Service Quality and Satisfaction Affect the Intention of Using Application-Based Land Transportation? A Study on Generation YZ in Jakarta. *Studies in Systems, Decision and Control*, 216, 737–746. [https://doi.org/10.1007/978-3-031-10212-7\\_60](https://doi.org/10.1007/978-3-031-10212-7_60)
- Ciciretti, R., Hasan, I., & Zazzara, C. (2009). Do Internet Activities Add Value? Evidence from the Traditional Banks. *Journal of Financial Services Research*, 35(1), 81–98. <https://doi.org/10.1007/s10693-008-0039-2>
- 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>
- Giovanis, A., Assimakopoulos, C., & Sarmaniotis, C. (2019). Adoption of mobile self-service retail banking technologies. *International Journal of Retail & Distribution Management*, 47(9), 894–914. <https://doi.org/10.1108/IJRDM-05-2018-0089>
- Gounaris, S., & Koritos, C. (2008). Investigating the drivers of Internet banking adoption decision: a comparison of three alternative frameworks. *International Journal of Bank Marketing*, 26(5), 282–304. <https://doi.org/10.1108/02652320810894370>
- He, D., You, K., Li, W., & Wu, J. (2019). Determinants of Technology Adoption: Evidence from the Chinese Banking Industry. *Emerging Markets Finance and Trade*, 57(11), 1–23. <https://doi.org/10.1080/1540496X.2019.1678027>
- Hu, L., & Bentler, P. M. (1999). Cutoff criteria for fit indexes in covariance structure analysis: Conventional criteria versus new alternatives. *Structural Equation Modeling: A Multidisciplinary Journal*, 6(1), 1–55. <https://doi.org/10.1080/10705519909540118>
- Hu, P. J., Chau, P. Y. K., Sheng, O. R. L., & Tam, K. Y. (1999). Examining the Technology Acceptance Model Using Physician Acceptance of Telemedicine Technology. *Journal of Management Information Systems*, 16(2), 91–112. <https://doi.org/10.1080/07421222.1999.11518247>
- Hussain, S., Fangwei, Z., Siddiqi, A. F., Ali, Z., & Shabbir, M. S. (2018). Structural Equation Model for Evaluating Factors Affecting Quality of Social Infrastructure Projects.

- Sustainability*, 10(1415), 1–25. <https://doi.org/10.3390/su10051415>
- Jamshidi, D., & Hussin, N. (2016). Forecasting patronage factors of Islamic credit card as a new e-commerce banking service: An integration of TAM with perceived religiosity and trust. *Journal of Islamic Marketing*, 7(4), 378–404. <https://doi.org/10.1108/JIMA-07-2014-0050>
- Jena, R. K. (2022). Examining the Factors Affecting the Adoption of Blockchain Technology in the Banking Sector: An Extended UTAUT Model. *International Journal of Financial Studies*, 10(4), 1–20. <https://doi.org/10.3390/ijfs10040090>
- Kaur, S. J., Ali, L., Hassan, M. K., & Al-Emran, M. (2021). Adoption of digital banking channels in an emerging economy: exploring the role of in-branch efforts. *Journal of Financial Services Marketing*, 26, 107–121. <https://doi.org/10.1057/s41264-020-00082-w>
- Lee, K.-W., Tsai, M.-T., & Lanting, M. C. L. (2011). From marketplace to marketplace: Investigating the consumer switch to online banking. *Electronic Commerce Research and Applications*, 10(1), 115–125. <https://doi.org/10.1016/j.elerap.2010.08.005>
- Malaquias, R., & Hwang, Y. (2019). Mobile banking use: A comparative study with Brazilian and U.S. participants. *International Journal of Information Management*, 44(4), 132–140. <https://doi.org/10.1016/j.ijinfomgt.2018.10.004>
- Malatji, W. R., Eck, R. Van, & Zuva, T. (2020). Understanding the usage, Modifications, Limitations and Criticisms of Technology Acceptance Model (TAM). *Advances in Science, Technology and Engineering Systems Journal*, 5(6), 113–117. <https://doi.org/10.25046/aj050612>
- Mani, Z., & Chouk, I. (2017). Drivers of consumers' resistance to smart products. *Journal of Marketing Management*, 33(1–2), 76–97. <https://doi.org/10.1080/0267257X.2016.1245212>
- Memon, A. H., & Rahman, I. A. (2014). SEM-PLS Analysis of Inhibiting Factors of Cost Performance for Large Construction Projects in Malaysia: Perspective of Clients and Consultants. *The Scientific World Journal*, 2014(165158), 1–9. <https://doi.org/10.1155/2014/165158>
- Nath, R., Bhal, K. T., & Kapoor, G. T. (2013). Factors influencing IT Adoption by Bank Employees: An Extended TAM Approach. *Vikalpa*, 38(4), 83–96. <https://doi.org/10.1177/0256090920130406>
- Otache, I. (2019). The mediating effect of teamwork on the relationship between strategic orientation and performance of Nigerian banks. *European Business Review*, 31(5), 744–760. <https://doi.org/10.1108/EBR-10-2017-0183>
- Ozdemir, S., Trott, P., & Hoecht, A. (2008). Segmenting internet banking adopter and non-adopters in the Turkish retail banking sector. *International Journal of Bank Marketing*, 26(4), 212–236. <https://doi.org/10.1108/02652320810884777>
- Pikkarainen, T., Pikkarainen, K., Karjaluoto, H., & Pahlila, S. (2004). Consumer acceptance of online banking: an extension of the technology acceptance model. *Internet Research*, 14(3), 224–235. <https://doi.org/10.1108/10662240410542652>
- Priya, R., Gandhi, A. V., & Shaikh, A. (2018). Mobile banking adoption in an emerging economy. *Benchmarking: An International Journal*, 25(2), 743–762. <https://doi.org/10.1108/BIJ-01-2016-0009>
- Ratten, V. (2015a). International Consumer Attitudes Toward Cloud Computing: A Social Cognitive Theory and Technology Acceptance Model Perspective. *Thunderbird International Business Review*, 57(3), 217–228. <https://doi.org/10.1002/tie.21692>
- Ratten, V. (2015b). Exploring Behaviors and Perceptions Affecting the Adoption of Cloud Computing. *International Journal of Innovation in the Digital Economy*, 4(3), 51–68. <https://doi.org/10.4018/jide.2013070104>
- Rawashdeh, A. (2015). Factors affecting adoption of internet banking in Jordan. *International Journal of Bank Marketing*, 33(4), 510–529. <https://doi.org/10.1108/IJBM-03-2014-0043>
- Roy, S. K., Balaji, M. S., Kesharwani, A., & Sekhon, H. (2017). Predicting Internet banking adoption in India: a perceived risk perspective. *Journal of Strategic Marketing*, 25(5–6), 418–438. <https://doi.org/10.1080/0965254X.2016.1148771>
- Sadowski, B. M. (2017). Advanced users and the adoption of high speed broadband: Results of a living lab study in the Netherlands. *Technological Forecasting and Social Change*, 115(1), 1–14. <https://doi.org/10.1016/j.techfore.2016.09.009>
- Salisbury, W. D., Pearson, R. A., Pearson, A. W., & Miller, D. W. (2001). Perceived security and World Wide Web purchase intention. *Industrial Management & Data Systems*, 101(4), 165–177. <https://doi.org/10.1108/02635570110390071>
- Samsudeen, S. N., Selvaratnam, G., & Hayathu Mohamed, A. H. (2022). Intention to use mobile banking services: an Islamic banking customers' perspective from Sri Lanka. *Journal of Islamic Marketing*, 13(2), 410–433. <https://doi.org/10.1108/JIMA-05-2019-0108>
- Sánchez-Torres, J. A., Canada, F.-J. A., Sandoval, A. V., & Alzate, J.-A. S. (2018). E-banking in Colombia: factors favouring its acceptance, online trust and government support. *International Journal of Bank Marketing*, 36(1), 170–183. <https://doi.org/10.1108/IJBM-10-2016-0145>
- Sarel, D., & Marmorstein, H. (2003). Marketing online banking services: The voice of the customer. *Journal of Financial Services Marketing*, 8(2), 106–118. <https://doi.org/10.1057/palgrave.fsm.4770111>
- Shaikh, A. A., Alharthi, M. D., & Alamoudi, H. O. (2020). Examining key drivers of consumer experience with (non-financial) digital services—An exploratory study. *Journal of Retailing and Consumer Services*, 55(102073), 1–10. <https://doi.org/10.1016/j.jretconser.2020.102073>
- Shaikh, A. A., & Karjaluoto, H. (2016). On Some Misconceptions Concerning Digital Banking and Alternative Delivery Channels. *International Journal of E-Business Research*, 12(3), 1–16. <https://doi.org/10.4018/IJEER.2016070101>
- Sharma, S. K., & Govindaluri, S. M. (2014). Internet banking adoption in India. *Journal of Indian Business Research*, 6(2), 155–169. <https://doi.org/10.1108/JIBR-02-2013-0013>
- Sinha, I., & Mukherjee, S. (2016). Acceptance of technology, related factors in use of off branch e-banking: an Indian case study. *The Journal of High Technology Management Research*, 27(1), 88–100. <https://doi.org/10.1016/j.hitech.2016.04.008>
- Suhartanto, D., & Leo, G. (2018). Small business entrepreneur resistance of ICT adoption: a lesson from Indonesia. *International Journal of Business and Globalisation*, 21(1), 5. <https://doi.org/10.1504/IJBG.2018.10015253>

- Takieddine, S., & Sun, J. (2015). Internet banking diffusion: A country-level analysis. *Electronic Commerce Research and Applications*, 14(5), 361–371. <https://doi.org/10.1016/j.elerap.2015.06.001>
- Wallace, L. G., & Sheetz, S. D. (2014). The adoption of software measures: A technology acceptance model (TAM) perspective. *Information & Management*, 51(2), 249–259. <https://doi.org/https://doi.org/10.1016/j.im.2013.12.003>
- Willaby, H. W., Costa, D. S. J., Burns, B. D., MacCann, C., & Roberts, R. D. (2015). Testing complex models with small sample sizes: A historical overview and empirical demonstration of what Partial Least Squares (PLS) can offer differential psychology. *Personality and Individual Differences*, 84(10), 73–78. <https://doi.org/10.1016/j.paid.2014.09.008>
- Wolf, E. J., Harrington, K. M., Clark, S. L., & Miller, M. W. (2013). Sample Size Requirements for Structural Equation Models: An Evaluation of Power, Bias, and Solution Propriety. *Educational and Psychological Measurement*, 73(6), 913–934. <https://doi.org/10.1177/0013164413495237>
- Yaseen, S. G., & Qirem, I. A. El. (2018). Intention to use e-banking services in the Jordanian commercial banks. *International Journal of Bank Marketing*, 36(3), 557–571. <https://doi.org/10.1108/IJBM-05-2017-0082>