4th INCOGITE and 2nd HOSPITOUR 2022
"Regenerative Economy, Business & Tourism: Through innovation & Sustainability"
Thursday, November 17th, 2022 – Universitas Pelita Harapan Tangerang

Examining Factors Influencing Indonesian Customer's Intention and Adoption of BOPS Service

Dita Kartika Sari[1], Rizal Edy Halim[2]

[1] dita.kartika91@ui.ac.id, [2] rizaledy@gmail.com

[1, 2] Faculty of Economics and Business, Universitas Indonesia, Depok, Indonesia

Abstract. This study aims to identify the factors influencing customers' intention and adoption of the Buy Online Pick-up in Store (BOPS) service in Indonesia. The factors examined in this study are based on the Unified Theory of Acceptance and Use of Technology (UTAUT) and expanded with additional dimensions. The research surveyed 340 existing BOPS customers in Indonesia. Hedonic motivation, compatibility, price-saving orientation, personal innovativeness, and trust are predictors of the customer's intention to use the BOPS service in the future. Moreover, trust and behavior intention was found to be the factors that influence customers to adopt BOPS service. Meanwhile, performance expectancy, effort expectancy, and social influence do not significantly influence customers' intention to use the BOPS service. The output of this study adds the existing knowledge that explains customer behavior, BOPS explicitly as one of omnichannel service.

Keywords: BOPS, UTAUT, personal innovativeness, trust, omnichannel, Indonesia

1. Introduction

The evolution of omnichannel marketing strategies has occurred in the last decade, although it has not yet been fully developed and implemented by business owners. However, there has been rapid growth when the world is experiencing the COVID-19 virus pandemic, which requires business owners to use online channels and take advantage of a new strategy, namely omnichannel. Nielsen report [1], which examines consumers with incomes affected by the pandemic, states that this global health crisis is the reason behind the drastic increase in the use of both online and offline channels, both click-and-collect, contactless delivery, and so on. Furthermore, the article explains that the most significant percentage of omnichannel users is in the Asia Pacific region [1]. With the existing potential, the use of an omnichannel strategy can be applied by companies in Indonesia so that they can attract customers with the shopping experience offered.

One of the implementations of an omnichannel strategy that is quite popular is the "buy online pick-up in store" (BOPS) service which allows consumers to make online purchases and pick up products at the nearest predetermined location [2]–[4]. BOPS is not a new service, but the adoption of this service has expanded along with the COVID-19 pandemic, which has caused consumers to prioritize convenience in shopping. Roy Nicholas Mandey, chairman of the Indonesian Retail Entrepreneurs Association (Aprindo), said that 90% of Aprindo members had implemented an omnichannel strategy where one of the strategies implemented by retailers is the BOPS option [5]. In America, 40% of its citizens have tried new shopping methods during the pandemic, one of which is BOPS, and it is likely to continue using the service even after the pandemic is over [6]. The result is in line with a consumer survey conducted by Deloitte that after the pandemic period, they will remain less active outside their homes, so they will continue to rely on home delivery services or BOPS [7].

Previous research on the retailer side related to BOPS discussed supply chain management [3], [4], [8]–[10]. In their article, Jin et al. [11] provide input on retailers who want to implement the BOPS strategy. Meanwhile, several researchers explored BOPS services from the logistics side [11]–[14]. Research related to BOPS mainly discusses the retailer side, and there is still limited research on the use of BOPS services from the customer side [15], [16]. Based on these reasons, the researcher will focus on one of the omnichannel business models, namely the Buy Online Pick-up Store (BOPS), by researching the customer side.

BOPS is one of the popular services due to several advantages that benefit consumers, namely making it easier for them to find product availability information to avoid consumer losses on transportation time and costs [17]. In order to manage and maximize profits from online and offline channels, retailers with dual channels are starting to take advantage of BOPS, one of the advantages of which is a more convenient shopping process and reduced shipping costs [9]. For retailers, this service provides benefits by increasing in-store traffic [4] and the potential for consumers to purchase additional products when visiting stores to take online orders [17].

Many factors influence consumers to adopt a particular service. Therefore, researchers have developed theories to understand the intention of using or adopting technology so that companies understand what to consider before implementing new services or features in their business so that they are in demand by consumers. Previous studies have proven that consumers consider the convenience and comfort offered by the company to meet their needs [16], [18]. With changing lifestyles, consumers today expect simple and convenient services [16]. In line with the opinion of Jara et al.[19] that BOPS consumers tend to consider the level of convenience more when shopping.

Although the ease of use of a service or feature is considered one of the factors that influence usage intentions [20], [21], there are conflicting opinions regarding this theory. Previous researchers have proven that ease of use affects consumers' intention to adopt a service or feature [22]–[24]. But also found research which states that this ease of use does not affect consumers to adopt the intention to use a service or feature [16], [25]. Therefore, it is interesting for researchers to re-examine whether this perceived convenience factor will influence consumers to adopt BOPS services.

When technological innovation is introduced, a group of people will always want to be the first to adopt the innovation. This group acts as an innovation change agent and opinion leader [26]. The level of innovation that exists in this individual is a motivating variable to adopt a particular technological innovation [27]. BOPS is one of the innovations that add variety to consumers to choose how to get the products they have purchased. Consumers with a high level of innovation will positively perceive BOPS services, which can then influence others to adopt this service [22].

K. Kim et al. [16], in their research on consumer perceptions of BOPS services, proved that there was an influence of performance expectancy, trust, compatibility, hedonic motivation, and social effect on the intention to use BOPS services. However, K. Kim et al. [16] mentioned that there are limitations in this study, one of which is that there are still other factors that can influence consumer intentions to adopt BOPS services. Personal innovativeness is one of the variables that is widely studied as a factor that plays an essential role in adopting a service [22], [28], [29]. Dewi et al. [30] add that there is a gap between consumer acceptance and resistance to a technology service, so it is necessary to integrate technological acceptance and personal traits, namely personal innovativeness. Therefore, the researchers in this study added the personal innovativeness variable as one factor influencing the intention to adopt BOPS services.

Based on this background, the authors are interested in examining the factors influencing the intention to adopt "buy online pick-up in-store" or BOPS services in Indonesia. This research will be aimed at Indonesian consumers who have previously shopped with BOPS services which are then expected to contribute both empirically and practically to the variables studied in this study.

2. Theoretical Framework

2.1 Omnichannel

Omnichannel comes from the Latin word "*omnis*", which means universal, so this new approach allows companies to integrate all information on all sales channels they have [20]. In general, customers in the buying process expect a consistent and integrated service experience across all sales channels to facilitate a smooth and seamless transfer process between channels according to customer preferences [24]. This omnichannel concept stems from the realization that customers often switch sales channels in the transaction process from the beginning of the information search process to after-sales service, both from stores, computers, smartphones, social media, tablets, and online services in stores [31]. With this omnichannel system, the maximum availability, visibility, and consistency related to products can be obtained in all sales channels owned by the company [32], [33].

2.2 Buy Online Pick-up in Store

Omnichannel, in practice, has various forms; not all of them are implemented within a company, depending on the type of industry and the needs of the company itself. Buy-Online-Pick-up-In-Store (BOPS) is one form of omnichannel that has been implemented in many major retailers worldwide, such as Uniqlo, ZARA, Walmart, and Best Buy. In BOPS services, online and offline channels have their respective functions with different processes to meet consumer needs [2]. The order fulfilment mode through the BOPS service is where consumers search for products and purchase transactions through online channels and then complete the transaction by picking up products purchased offline at predetermined stores [2], [4], [34]. With this service, conventional retailers (offline) will be helped in developing their business online [3].

BOPS is not a new service. This service has been implemented for quite a long time, especially in the retail industry. BOPS is often called a click-and-collect service [2] and is included in the O2O service [35]. This service is considered one of the popular omnichannel features [4], [36] because of its advantages that can be felt directly by both consumers and retailers. This service allows consumers to reduce shipping costs and waiting times [2], and consumers do not have to worry about the products ordered being unavailable because of the integrated product inventory [34]. For retailers, this BOPS service can increase in-store traffic [2], [34] because consumers have to take their orders to offline stores and potentially increase in-store sales or cross-buying made by consumers when taking orders [37].

2.3 The Unified Theory of Acceptance and Use of Technology

The Unified Theory of Acceptance and Use of Technology (UTAUT) is a model developed based on predecessor theories that explore how and why someone decides to adopt an information technology [38]. UTAUT provides a more comprehensive framework for interpreting a person's intention to use technology-based services [39]. The UTAUT framework consists of the variables Performance Expectancy, Effort Expectancy, Social Influence, and Facilitating Conditions which act as considerations for someone to adopt information technology. Venkatesh et al. [21] argue that although UTAUT has been widely used and developed to understand the behavior of technology users, further research is still needed on the theory to be applied specifically in the context of consumers. Therefore Venkatesh developed UTAUT2 by adding three variables to the existing framework. These three additional variables emphasize the intrinsic motivation of technology users, which consists of Habit, Price Value, and Hedonic Motivation [20], [21], [40].

2.4 Performance Expectancy

One of the considerations for adopting technology is that the technology helps a person to achieve his goals [21]. If an individual sees that technology is helping to make it easier for him to achieve his goals, then the intention to use it will increase. The level of usability of this technology, or performance expectancy in UTAUT, is one of the strong predictors of consumers adopting a particular technology [38]. It is evident from previous studies that have explored the effect of performance expectancy on the intention to consume certain services or products.

In e-commerce, performance expectancy has been shown to influence consumer spending intentions [18], [41]. Juaneda-Ayensa et al. [20] and Mosquera et al. [42] prove that performance expectancy affects consumers' purchase intentions in omnichannel stores. While in the context of BOPS, K. Kim et al. [16] demonstrated that performance expectancy is an essential factor in influencing consumer adoption intention, and S. Kim et al. [28] explained that performance expectancy affects user intentions indirectly. Therefore, the researcher proposes the following hypothesis:

H1: Performance Expectancy has a positive and significant effect on consumer intentions to use BOPS services

2.5 Effort Expectancy

In their findings, Venkatesh et al. [38], UTAUT defines effort expectancy as the ease of use of technology so that it can be utilized by its users efficiently to achieve its goals. Effort expectancy is the same as its predecessor theory: ease of use in TAM and complexity in IDT [28]. The complexity and ease of use can be seen in the amount of time and energy consumers must waste. So it can be said that the less burden the consumer feels on his experience using an application, the more satisfied the consumer will be [41]. The ease of using this technology is one of the factors that influence a person's intention to use technology [21], [23], [38], [43].

Many previous studies have explored the effect of the ease of technology on the intention to use it. However, inconsistent results were found for this effect in the omnichannel context. Juaneda-Ayensa et al. [20] and Silva et al. [24] showed that effort expectancy affects consumers' intention to adopt an omnichannel shopping system. In contrast, Mosquera et al. [42] showed no effect between these two variables in the omnichannel experience, and the research of K. Kim et al. [16] also showed that there was no effect of effort expectancy with the intention to use BOPS services. Based on this description, the researcher proposes the following hypothesis:

H2: Effort expectancy has a positive and significant effect on consumer intentions to use BOPS services

2.6 Social Influence

In theory, UTAUT explains that the people around us can influence the intention to adopt a technology [38]. Although online shopping can be done alone, interest in doing these activities may be due to friends or family who have also done it [44]. Meanwhile, Cai et al. [39] argue that consumers will respond positively to a logistics technology if they also receive positive social support. The social environment plays a vital role in one's acceptance of logistics technology. It can even be said that this social pressure can be considered one of the marketing objectives [45].

Previous research has explored the influence of social influence on a person's adoption and purchase intentions [16], [22], [45]. In the context of BOPS, K. Kim et al. [16] explained that social influence refers to positive word-of-mouth activities carried out by friends and family who have experienced BOPS services so that they influence someone to finally participate in using BOPS services. Based on this description, the researcher proposes the following hypothesis:

H3: Social Influence has a positive and significant effect on consumer intentions to use BOPS services

2.7 Hedonic Motivation

Hedonic motivation is the pleasure or enjoyment obtained when using technology [46]. Integrating hedonic motivation variables in the framework can complement the variables in UTAUT, which are more utility-focused [21]. Suppose the experience felt by consumers when using a service or technology provides benefits and pleasure according to the costs incurred. In that case, consumers will cognitively believe that this enjoyment factor influences them to adopt the service or technology [47]. Nicholson [20] explains that consumers like shopping at offline stores for fashion products because the store environment can affect consumer emotions through interaction, product evaluation, and sensory stimulation.

Previous research on the effect of hedonic motivation has shown that it can influence consumer intentions to adopt certain services. In their study, Shaw & Sergueeva [44] prove that a consumer's hedonic motivation affects the intention to use mobile commerce. In the context of last-mile delivery, Kapser & Abdelrahman [45] show the effect of hedonic motivation on the intention to use automatic delivery vehicles. In addition, K. Kim et al. [16] also showed a strong influence of hedonic motivation on the intention to use BOPS services. Therefore, the researcher proposes the following hypothesis

H4: Hedonic motivation has a positive and significant effect on consumer intentions to use BOPS services

2.8 Price-Saving Orientation

The innovation of goods delivery services is increasing in line with consumers' growing interest in purchasing online. One e-commerce can offer various shipping options at various speeds and prices. Price is considered one of the essential factors in the context of last-mile delivery because the market is very competitive [45]. Kapser & Abdelrahman [45] found that the price for a delivery service is more important to potential users than the service's usability. Price-sensitive consumers generally try to minimize the fee charged for buying an item; in this case, consumers are assumed to be trying to save on expenses [48].

In the context of BOPS, consumers choose to use this service because it can save costs from shipping [15]. The statement is in line with K. Kim et al. [16], which analyzes price value as consumer confidence that using this BOPS service can save costs. Ketzenberg & Akturk [6] stated that 48% of the respondents chose BOPS services because they did not want to be burdened with shipping costs. Contrary to the analysis of K. Kim et al. [16], who did not find any effect of price value on users' intention to use BOPS services. Because the meaning of price value here is an effort to reduce costs, the researchers focus more on price-saving orientation following the research of K. Kim et al. [16]. Therefore, it is necessary to re-analyze the effect of price-saving orientation on the intention to use BOPS services with the following hypothesis:

H5: Price-saving Orientation has a positive and significant effect on consumers' intention to use BOPS services

2.9 Compatibility

Facilities' suitability and availability are crucial when using innovative technology [18]. Service suitability or compatibility describes the level of suitability of service with the lifestyle, values, experiences, and needs of an individual [49]. If innovation is considered to have been integrated with the habits and lifestyles of consumers, it will be more compatible with these consumers [15], [50]. If the service is considered according to these considerations, it will create an individual's intrinsic motivation to adopt the service [51].

Compatibility is a factor that can affect the intention to adopt a service which is often analyzed as an independent antecedent [24]. Yuen et al. [49] prove that compatibility is one of the factors with a relatively large influence on users' intentions to adopt self-collection services. In the omnichannel context, compatibility is also proven to influence consumers to shop through stores that have implemented omnichannel services [24]. In this study, compatibility is determined by the extent to which BOPS services are in accordance with the lifestyle and availability of internet services to use these services. Based on this description, the researcher proposes the following hypothesis:
H6: Compatibility has a positive and significant effect on consumers' intention to adopt BOPS services

2.10 Personal Innovativeness

Personal innovativeness is a person's willingness to try new technologies [26]. Innovative consumers will generally be stimulated to use a technology [47] even earlier than their social environment [22]. In the omnichannel context, Juaneda-Ayensa et al. [20] found that personal innovativeness is the strongest antecedent of someone to adopt a service. In line with the opinion of Hoffmann & Soyez [52], innovation is an important factor in the adoption of new technologies that can encourage the survival of an organization due to sustainable profitability.

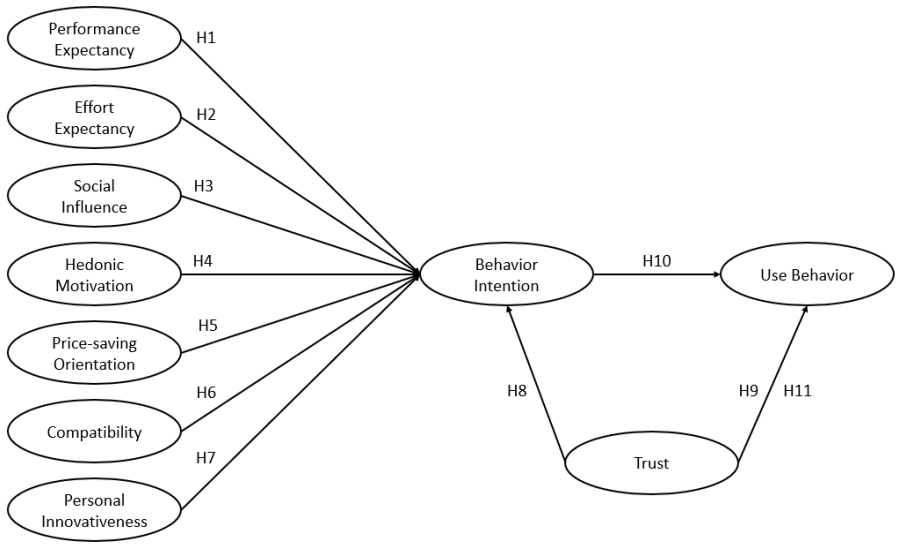
The personal innovativeness variable has been widely analyzed together with UTAUT to understand technology adoption intentions [22], [28], [53]. Previous research has shown that innovative consumers tend to have the intention to do online shopping[29], [30], [54]. For BOPS services, personal innovativeness is considered the main factor that influences consumers' intention to adopt the service [28]. Therefore, the researcher proposes the following hypothesis:
H7: Personal Innovativeness has a positive and significant effect on consumers' intention to adopt BOPS services

2.11 Trust

When marketing products, retailers must be able to create confidence in the products offered so that consumers do not feel fraud [55]. The absence of face-to-face interaction makes consumer perceptions during the online shopping process important to create consumer trust [56]. Santo & Marques [56] argues that consumers who get complete and consistent access to information on a product or service can create trust and help consumers in the decision-making process in online shopping. If consumers already have a sense of trust in retailers, consumers will subjectively ignore the possibility of unexpected activities from retailers [57].

Previous studies related to consumer confidence in shopping activities have been widely studied [18], [53], [55], [57], [58]. Tarhini et al. [18], in their research, prove that one of the reasons consumers use m-commerce services is because they are considered trustworthy and reliable. Trust helps reduce consumer concern over risk and security, thereby increasing consumer intention to participate in online activities [56]. The intention in this study is defined as the intention to use BOPS services continuously [16]. Meanwhile, numerous e-commerce literature shows a correlation between use intention and actual use [16]. The BOPS system requires consumers to complete transactions online, so consumers need to trust in using this service. Based on this description, the researcher proposes the following hypothesis:
H8: Trust has a positive and significant effect on consumers' intention to adopt BOPS services
H9: Trust has a positive and significant effect on consumer behavior to adopt BOPS services
H10: Consumer intentions have a positive and significant effect on consumer behavior to adopt BOPS services
H11: Consumer intentions mediate the effect of trust on consumer behavior in adopting BOPS services

Figure 1
Research Model



3. Research Methodology

3.1 Measurement Development

This research is a cross-sectional study and uses a close-ended survey questionnaire with a Likert scale of 1 ("strongly disagree ") to 5 ("strongly agree "). The original questionnaire was translated into Bahasa Indonesia which has been reviewed by three marketing lecturers and ten individuals who fit the research sample criteria. The questionnaire was 33 items consisting of 10 constructs based on the research model. The measurement of performance expectancy, social influence, hedonic motivation, price-saving orientation, compatibility, trust, behavior intention, and use behavior adapted from K.Kim et al. [16]. Meanwhile, effort expectancy and personal innovativeness were adapted from S.Kim et al. [28]. Apart from the core questionnaire from the constructs, respondents were also given a questionnaire related to their personal information.

3.2 Data Analysis Procedure

The study conducted analytical procedures as follows. First, conducted pre-test to analyze the validity and reliability of the questionnaire using SPSS software. Secondly, performed outer model (measurement model) analysis with confirmatory factor analysis. Third, conducted inner model (structural model) analysis by looking at path analysis results to answer all the research hypotheses [59]. The analytical method used in this research is Partial Least Squares Structural Equation Modelling (PLS-SEM).

3.3 Data Collection

This study uses a convenience sampling method. The final questionnaire is developed in the Google Forms platform and distributed online through social media. The requirements to be involved in this research include respondents over 17 years old and having a BOPS shopping experience. Before filling out the questionnaire, respondents must read this research's purpose and agree to be involved.

4. Data Analysis

4.1 Pre-test

Analysis of the validity and reliability of the pre-test was carried out on 30 respondents according to the research criteria. An item is valid if it meets the KMO & MSA values of $\geq 0,5$. In addition, Bartlett's Test Sphericity $< 0,5$ and the Factor Loading of the Component Matrix with a value of $\geq 0,5$ [60]. The analysis results show that all items in the questionnaire are considered valid, except for the third item on the personal innovatives variable with the Factor Loading of Component Matrix $\leq 0,5$, so the item is omitted. Moreover, the variable can be reliable if it has a value of ≥ 0.60 [61] and the analysis results show that all variables meet the minimum reliability value. Therefore, the total of the final questionnaires was 32 items.

Table 4.1
Reliability & Validity Pre-Test Result

Variable	Item	*Cronbach's Alpha*	KMO	Bartlett's Test of Sphericity	MSA	Component Matrix
Performance Expectancy	PE1	0,742	0,658	0,000	0,644	0,757
	PE2				0,662	0,766
	PE3				0,656	0,730
	PE4				0,669	0,762
Effort Expectancy	EE1	0,795	0,717	0,000	0,703	0,773
	EE2				0,718	0,689
	EE3				0,739	0,848
	EE4				0,708	0,860
Social Influence	SI1	0,912	0,736	0,000	0,692	0,940
	SI2				0,696	0,938
	SI3				0,855	0,890
Compatibility	CB1	0,674	0,644	0,004	0,717	0,717
	CB2				0,615	0,821
	CB3				0,631	0,796
Hedonic Motivation	HM1	0,916	0,740	0,000	0,698	0,944
	HM2				0,698	0,944
	HM3				0,859	0,899
Price-Saving Orientation	PS1	0,842	0,687	0,000	0,644	0,908
	PS2				0,643	0,910
	PS3				0,851	0,805
Trust	TR1	0,816	0,706	0,000	0,774	0,821
	TR2				0,688	0,868
	TR3				0,674	0,878
Personal Innovativeness	PI1	0,806	0,669	0,000	0,628	0,890
	PI2				0,826	0,767
	PI4				0,632	0,885
Behavior Intention	BI1	0,925	0,737	0,000	0,678	0,957
	BI2				0,717	0,943
	BI3				0,852	0,910
Use Behavior	UB1	0,782	0,661	0,000	0,698	0,816
	UB2				0,612	0,900
	UB3				0,697	0,816

4.2 Measurement Model

4.2.1 Reliability Test

This stage consists of testing reliability indicators and internal consistency reliability. The reliability indicator is accepted if the value of outer loading ≥ 0,7 or between 0,4 – 0,7 can still be retained [59]. Internal consistency reliability is seen from the cronbach's alpha and composite reliability values, where the accepted composite reliability value is > 0.7 [59]. Based on the results of the analysis carried out, all items on the variables studied have met the minimum requirements and can be continued to the next analysis.

Table 4.2
Reliability Test Result

Variable	Item	Cronbach's Alpha	Composite Reliability	Outer Loading
Performance Expectancy	PE1	0,803	0,872	0,819
	PE2			0,730
	PE3			0,807
	PE4			0,814
Effort Expectancy	EE1	0,855	0,902	0,794
	EE2			0,885
	EE3			0,846
	EE4			0,812
Social Influence	SI1	0,910	0,943	0,930
	SI2			0,935
	SI3			0,896

Compatibility	CB1	0,674	0,820	0,619
	CB2			0,878
	CB3			0,819
Hedonic Motivation	HM1	0,861	0,915	0,896
	HM2			0,873
	HM3			0,884
Price-Saving Orientation	PS1	0,770	0,867	0,844
	PS2			0,862
	PS3			0,774
Trust	TR1	0,789	0,877	0,814
	TR2			0,870
	TR3			0,831
Personal Innovativeness	PI1	0,739	0,844	0,786
	PI2			0,734
	PI4			0,883
Behavior Intention	BI1	0,878	0,925	0,880
	BI2			0,898
	BI3			0,912
Use Behavior	UB1	0,729	0,847	0,740
	UB2			0,862
	UB3			0,812

4.2.2 Convergent Validity

Convergent validity was tested to determine the extent to which research items were positively correlated with items in the same construct [59]. The average variance extracted (AVE) value is the value used to evaluate the convergent validity of the construct with the accepted value > 0,5. The following is the AVE value of each variable in this research construct:

Table 4.3
Convergent Validity Result

Variable	AVE
Performance Expectancy	0,630
Effort Expectancy	0,697
Social Influence	0,847
Compatibility	0,608
Hedonic Motivation	0,782
Price-Saving Orientation	0,685
Trust	0,703
Personal Innovativeness	0,645
Behavior Intention	0,804
Use Behavior	0,650

4.2.3 Discriminant Validity

Discriminant validity can be analyzed using the Fornell-Larcker criterion approach and cross-loadings. For the Fornell-Larcker criterion approach, the value of the square root AVE in each construct must be greater than the correlation value with the other constructs [59]. To achieve a valid value in the cross-loading approach, the outer loading of an item must have a higher value than the cross-loadings value of other constructs [59].

Table 4.4
Fornell-Larcker criterion

	BI	CB	EE	HM	PE	PI	PS	SI	TR	UB
BI	**0.897**									
CB	0.580	**0.780**								
EE	0.381	0.502	**0.835**							
HM	0.638	0.649	0.494	**0.884**						
PE	0.500	0.549	0.609	0.636	**0.794**					
PI	0.415	0.410	0.413	0.425	0.347	**0.803**				

PS	0.500	0.445	0.367	0.543	0.499	0.348	**0.828**			
SI	0.425	0.519	0.314	0.469	0.427	0.288	0.338	**0.920**		
TR	0.509	0.452	0.482	0.582	0.529	0.428	0.544	0.368	**0.839**	
UB	0.717	0.563	0.454	0.634	0.534	0.469	0.575	0.507	0.618	**0.806**

Table 4.5
Cross-Loadings

	BI	**CB**	**EE**	**HM**	**PE**	**PI**	**PS**	**SI**	**TR**	**UB**
BI1	**0.880**	0.512	0.321	0.568	0.448	0.405	0.431	0.384	0.465	0.618
BI2	**0.898**	0.521	0.370	0.598	0.429	0.335	0.475	0.371	0.454	0.645
BI3	**0.912**	0.526	0.332	0.549	0.469	0.379	0.439	0.389	0.452	0.665
CB1	0.315	**0.619**	0.513	0.452	0.450	0.311	0.358	0.215	0.316	0.331
CB2	0.520	**0.878**	0.415	0.562	0.507	0.357	0.373	0.463	0.402	0.503
CB3	0.491	**0.819**	0.309	0.508	0.352	0.304	0.329	0.485	0.341	0.465
EE1	0.248	0.374	**0.794**	0.366	0.459	0.326	0.240	0.194	0.356	0.316
EE2	0.366	0.433	**0.885**	0.432	0.545	0.375	0.315	0.289	0.420	0.411
EE3	0.306	0.401	**0.846**	0.414	0.533	0.315	0.329	0.283	0.401	0.390
EE4	0.332	0.461	**0.812**	0.428	0.489	0.357	0.332	0.268	0.425	0.385
HM1	0.586	0.602	0.438	**0.896**	0.548	0.370	0.474	0.441	0.529	0.543
HM2	0.557	0.569	0.432	**0.873**	0.570	0.374	0.467	0.385	0.502	0.585
HM3	0.548	0.549	0.439	**0.884**	0.570	0.384	0.500	0.418	0.513	0.555
PE1	0.423	0.417	0.527	0.496	**0.819**	0.318	0.374	0.292	0.435	0.421
PE2	0.369	0.406	0.399	0.491	**0.730**	0.285	0.365	0.349	0.397	0.412
PE3	0.375	0.454	0.531	0.527	**0.807**	0.213	0.404	0.323	0.399	0.409
PE4	0.417	0.465	0.472	0.507	**0.814**	0.280	0.438	0.393	0.444	0.452
PI1	0.295	0.308	0.384	0.371	0.318	**0.786**	0.303	0.214	0.383	0.343
PI2	0.203	0.329	0.322	0.293	0.194	**0.734**	0.206	0.244	0.251	0.291
PI4	0.435	0.359	0.315	0.358	0.304	**0.883**	0.310	0.248	0.375	0.456
PS1	0.415	0.409	0.351	0.462	0.460	0.349	**0.844**	0.297	0.458	0.500
PS2	0.447	0.357	0.291	0.477	0.391	0.273	**0.862**	0.276	0.407	0.480
PS3	0.377	0.339	0.270	0.406	0.389	0.240	**0.774**	0.269	0.496	0.448
SI1	0.407	0.497	0.299	0.422	0.378	0.287	0.325	**0.930**	0.345	0.472
SI2	0.413	0.460	0.299	0.451	0.422	0.257	0.296	**0.935**	0.359	0.480
SI3	0.349	0.476	0.267	0.423	0.378	0.252	0.316	**0.896**	0.308	0.445
TR1	0.413	0.452	0.474	0.504	0.484	0.435	0.435	0.329	**0.814**	0.503
TR2	0.484	0.395	0.408	0.515	0.484	0.316	0.534	0.340	**0.870**	0.560
TR3	0.376	0.283	0.327	0.441	0.354	0.331	0.388	0.250	**0.831**	0.488
UB1	0.583	0.524	0.252	0.462	0.365	0.292	0.407	0.493	0.361	**0.740**
UB2	0.599	0.458	0.382	0.537	0.450	0.421	0.469	0.422	0.535	**0.862**
UB3	0.556	0.392	0.450	0.529	0.471	0.412	0.511	0.322	0.584	**0.812**

4.3 Structural Model

4.3.1 Coefficient of Determination (R^2)

The R Square Behavior Intention value is 0,500, which means that this variable is explained by 50% of other variables in this study, and the other 50% is explained by variables not included in this study. Furthermore, the use behavior variable is explained by the Trust and Behavior Intention variables of 60.1%, while the other 39.9% is explained by other variables not included in this study.

Tabel 4.6
R-Square Test Result

	R Square	**Description**
BI	0,500	Moderate
UB	0,601	Moderate

4.3.2 Path Analysis

This analysis tests the relationship between the existing variables according to the research hypothesis by evaluating the t-value and p-value [59]. The analysis was carried out using the SmartPLS software with the bootstrapping method of 5000 subsamples. The analysis results show that the factors that have been shown to influence the intention to use BOPS services significantly are compatibility, hedonic motivation, price-saving orientation, personal innovativeness, and trust. In addition, trust and intention significantly affect the use of BOPS services. Meanwhile, the relationship between the effect of performance expectancy, effort expectancy, and social influence on the intention to use BOPS services is not significant.

Table 4.7
Path Analysis

	Original Sample (O)	Sample Mean (M)	Standard Deviation (STDEV)	T Statistics (|O/STDEV|)	P - Values
BI -> UB	0.543	0.543	0.046	11.815	**0.000**
CB -> BI	0.212	0.213	0.061	3.461	**0.000**
EE -> BI	-0.065	-0.062	0.066	0.980	**0.164**
HM -> BI	0.291	0.283	0.070	4.185	**0.000**
PE -> BI	0.054	0.051	0.071	0.764	**0.223**
PI -> BI	0.103	0.110	0.054	1.896	**0.029**
PS -> BI	0.128	0.130	0.055	2.346	**0.010**
SI -> BI	0.062	0.062	0.049	1.270	**0.102**
TR -> BI	0.110	0.111	0.062	1.778	**0.038**
TR -> UB	0.342	0.341	0.054	6.307	**0.000**

4.3.3 Mediation Effect

This test aims to prove whether this study has a mediating relationship. Looking at the t-value and p-value in the table of specific indirect effects shows that intention is proven to mediate the effect of trust on use behavior, with a t-value of 1.729 and a p-value of 0.042. Thus it can be said that H11 is accepted.

5. Discussion

5.1 Conclusions

Based on the results of this research, it can be concluded that several factors influence the intention to use and the actual behavior of customers in using BOPS. Hedonic motivation factors, cost-saving orientation, compatibility, personal innovation, and trust in the system are factors in this study that positively and significantly affect the intention to use BOPS services again. Still, several factors are not proven to influence it, which are performance expectancy, effort expectancy, and social influence.

As a relatively new service, BOPS is an option for shopping differently and involves online and offline stores in one transaction. For some people, this is considered new and fun, so people with good experience using the BOPS service intend to use it again. The customer's lifestyle also affects the customer's intention to use BOPS services, such as people who have high mobility and are rarely at home, so it would be more appropriate to pick up their goods directly at the store before or after going somewhere. That makes the BOPS service not charge shipping fees to customers, affecting the intention to use this service again because it can save on shopping costs.

Innovative people like to experiment with something new, including technology services. BOPS is a fairly new service, and people with high innovation will try to use BOPS services. In addition, trust in the BOPS system also affects the intention to reuse. Currently, many people are considering security because they have to share personal data to complete transactions. If this service is felt safe enough for the customer, it will raise the customer's intention to use it again. This trusted system has also been proven to influence customers to implement this service for their shopping activity.

5.2 Suggestions

Based on the results, some inputs can be explained as follows: retailers must maintain and even improve the quality of service to ensure that customers have a pleasant and uninterrupted experience so that they will continue to choose BOPS services for their shopping activities in the future. In addition, promotion is one thing that attracts customers to use this service, so it needs to be applied at certain moments to attract customers.

Business owners who use BOPS services need to understand their target market. As stated by E. Kim et al. [15] customers consider this service appropriate because purchased products can be picked up before or after their activities, so it is important to consider locations for pick-up services that are accessible. In addition to being an accessible place, businesses must introduce this service in a wider market to reach people who like to experiment with new things. In addition to getting new customers, business actors have the opportunity to get a spoke person for free because, generally, these innovative customers tell their experiences of something that has been tried.

The number of fraud cases requires business actors to establish a system that requires verification of customer data. On the other hand, the number of hacking incidents concerns customers to be careful in spreading their data. Business actors need to ensure the security of the existing systems in each of their services. This can be communicated as an effort to gain the trust of customers. This trust is the basis for customers to stay on this service.

5.3 Limitation and Future Research

This cross-sectional study aims to identify the factors influencing the intention and behavior of re-adopting BOPS services in Indonesia. Future research can be carried out with a longitudinal design to understand the consumer response deeper in adopting BOPS services. Not all of the factors studied are proven and are in line with previous studies discussing similar services. Many factors influence a person to adopt the technology. Not all factors are examined in this study, so future research can add other variables to enrich the study results. The respondents in this study have experience using BOPS in various industries, but no industry-specific requirements were studied for this research. Future research can conduct similar research by determining the specific industry. BOPS is one type of omnichannel studied previously in the retail industry. At the same time, it is still limited to research specifically on the F&B industry so that industry can be used as a reference for future research

References

[1] Nielsen, “Covid-19 has flipped the value proposition of omnichannel shopping for constrained consumers,” no. May. pp. 1–4, 2020.

[2] Y. Lee, S. Choi, and J. M. Field, “Development and validation of the pick-up service quality scale of the buy-online-pick-up-in-store service,” *Oper. Manag. Res.*, vol. 13, no. 3–4, pp. 218–232, 2020, doi: 10.1007/s12063-020-00161-0.

[3] J. C. Lu, Y. Yang, S. Y. Han, Y. C. Tsao, and Y. Xin, “Coordinated inventory policies for meeting demands from both store and online BOPS channels,” *Comput. Ind. Eng.*, vol. 145, no. March, p. 106542, 2020, doi: 10.1016/j.cie.2020.106542.

[4] R. Kong, L. Luo, L. Chen, and M. F. Keblis, “The effects of BOPS implementation under different pricing strategies in omnichannel retailing,” *Transp. Res. Part E Logist. Transp. Rev.*, vol. 141, p. 102014, Sep. 2020, doi: 10.1016/j.tre.2020.102014.

[5] Y. Prasidya, “Retailers Embrace Consumers’ Shift to Online Channels,” *The Jakarta Post*. [Online]. Available: https://www.thejakartapost.com/news/2020/08/14/retailers-embrace-consumers-shift-to-online-channels.html.

[6] M. Ketzenberg and M. S. Akturk, “How ‘Buy Online, Pick Up In-Store’ Gives Retailers an Edge,” *Harvard Business Review*, 2021. .

[7] E. Sheehan and L. Skelly, “The Click and Collect Consumer | Deloitte Global,” 2021, [Online]. Available: https://www2.deloitte.com/global/en/pages/consumer-business/articles/global-retail-digitized-route-likely-to-continue.html.

[8] C. Fan, Y. Liu, X. Yang, X. Chen, and J. Hu, “Online and offline cooperation under buy-online, pick-up-in-store: Pricing and inventory decisions,” *J. Ind. Manag. Optim.*, vol. 15, no. 3, pp. 1455–1472, 2019, doi: 10.3934/jimo.2018104.

[9] X. Lin, Y. W. Zhou, and R. Hou, “Impact of a ‘Buy-online-and-pickup-in-store’ Channel on Price and Quality Decisions in a Supply Chain,” *Eur. J. Oper. Res.*, no. xxxx, 2020, doi: 10.1016/j.ejor.2020.03.064.

[10] Y. Song, T. Fan, Y. Tang, and C. Xu, “Omni-channel strategies for fresh produce with extra losses in-store,” *Transp. Res. Part E Logist. Transp. Rev.*, vol. 148, no. February, p. 102243, 2021, doi: 10.1016/j.tre.2021.102243.

[11] M. Cotarelo, H. Calderón, and T. Fayos, “A further approach in omnichannel LSQ, satisfaction and customer loyalty,” *Int. J. Retail Distrib. Manag.*, 2021, doi: 10.1108/IJRDM-01-2020-0013.

[12] M. Murfield, C. A. Boone, P. Rutner, and R. Thomas, “Investigating logistics service quality in omni-channel retailing,” *Int. J. Phys. Distrib. Logist. Manag.*, vol. 47, no. 4, pp. 263–296, 2017, doi: 10.1108/IJPDLM-06-2016-0161.

[13] W. Piotrowicz and R. Cuthbertson, “Exploring omnichannel retailing: Common expectations and diverse realities,” *Explor. Omnichannel Retail. Common Expect. Divers. Realities*, pp. 1–288, 2018, doi: 10.1007/978-3-319-98273-1.

[14] I. Ö. Yumurtacı Hüseyinoğlu, M. F. Sorkun, and G. Börühan, “Revealing the impact of operational logistics service quality on omni-channel capability,” *Asia Pacific J. Mark. Logist.*, vol. 30, no. 5, pp. 1200–1221, 2018, doi: 10.1108/APJML-08-2017-0169.

[15] E. Kim, M. C. Park, and J. Lee, “Determinants of the intention to use Buy-Online, Pickup In-Store (BOPS): The moderating effects of situational factors and product type,” *Telemat. Informatics*, vol. 34(8), no. June, pp. 1721–1735, 2017, doi: 10.1016/j.tele.2017.08.006.

[16] K. Kim, S. L. Han, Y. Y. Jang, and Y. C. Shin, “The effects of the antecedents of ‘buy-online-pick-up-in-store’ service on consumer’s bopis choice behaviour,” *Sustain.*, vol. 12, no. 23, pp. 1–15, 2020, doi: 10.3390/su12239989.

[17] Q. Zhang, W. Cao, Y. Liu, and Z. Zhang, “Integration of online and offline channels in retail: feasibility of BOPS?,” *Kybernetes*, 2020, doi: 10.1108/K-11-2019-0774.

[18] A. Tarhini, A. A. Alalwan, A. B. Shammout, and A. Al-Badi, “An analysis of the factors affecting mobile commerce adoption in developing countries: Towards an integrated model,” *Rev. Int. Bus. Strateg.*, vol. 29, no. 3, pp. 157–179, 2019, doi: 10.1108/RIBS-10-2018-0092.

[19] M. Jara, D. Vyt, O. Mevel, T. Morvan, and N. Morvan, “Measuring customers benefits of click and collect,” *J. Serv. Mark.*, vol. 32, no. 4, pp. 430–442, 2018, doi: 10.1108/JSM-05-2017-0158.

[20] E. Juaneda-Ayensa, A. Mosquera, and Y. S. Murillo, “Omnichannel customer behavior: Key drivers of technology acceptance and use and their effects on purchase intention,” *Front. Psychol.*, 2016, doi: 10.3389/fpsyg.2016.01117.

[21] V. Venkatesh, J. Y. L. Thong, and X. Xu, “Consumer Acceptance and Use of Information Technology: Extending the Unified Theory of Acceptance and Use of Technology,” *MIS Q.*, vol. 36, no. 1, pp. 157–178, 2012, doi: http://www.jstor.org/stable/41410412.

[22] H. M. Jeon, H. J. Sung, and H. Y. Kim, “Customers’ acceptance intention of self-service technology of restaurant industry: expanding UTAUT with perceived risk and innovativeness,” *Serv. Bus.*, vol. 14, no. 4, pp. 533–551, 2020, doi: 10.1007/s11628-020-00425-6.

[23] H. Karjaluoto, A. A. Shaikh, M. Leppäniemi, and R. Luomala, “Examining consumers’ usage intention of contactless payment systems,” *Int. J. Bank Mark.*, vol. 38, no. 2, pp. 332–351, 2019, doi: 10.1108/IJBM-04-2019-0155.

[24] S. C. e Silva, C. C. Martins, and J. M. de Sousa, “Omnichannel approach: Factors affecting consumer acceptance,” *J. Mark. Channels*, vol. 25, no. 1–2, pp. 73–84, 2018, doi: 10.1080/1046669x.2019.1647910.

[25] P. Chaudhary, A. Singh, and S. Sharma, “Understanding the antecedents of omni-channel shopping by customers with reference to fashion category: the Indian millennials’ perspective,” *Young Consum.*, no. August, 2021, doi: 10.1108/YC-05-2021-1327.

[26] R. Agarwal and J. Prasad, “A Conceptual and Operational Definition of Personal Innovativeness in the Domain of Information Technology,” *Inf. Syst. Res.*, vol. 9, no. 2, pp. 204–215, 1998, doi: 10.1287/isre.9.2.204.

[27] A. A. Mahrous and S. S. Hassan, “Achieving Superior Customer Experience: An Investigation of Multichannel Choices in the Travel and Tourism Industry of an Emerging Market,” *J. Travel Res.*, vol. 56, no. 8, pp. 1049–1064, 2017, doi: 10.1177/0047287516677166.

[28] S. Kim, T. P. Connerton, and C. Park, “Transforming the automotive retail: Drivers for customers’ omnichannel BOPS (Buy Online & Pick up in Store) behavior,” *J. Bus. Res.*, vol. 139, no. October 2020, pp. 411–425, 2022, doi: 10.1016/j.jbusres.2021.09.070.

[29] T. Natarajan, S. A. Balasubramanian, and D. L. Kasilingam, “Understanding the intention to use mobile shopping applications and its influence on price sensitivity,” *J. Retail. Consum. Serv.*, vol. 37, no. January, pp. 8–22, 2017, doi: 10.1016/j.jretconser.2017.02.010.

[30] C. K. Dewi, Z. Mohaidin, and M. A. Murshid, “Determinants of online purchase intention: a PLS-SEM approach: evidence from Indonesia,” *J. Asia Bus. Stud.*, vol. 14, no. 3, pp. 281–306, 2020, doi: 10.1108/JABS-03-2019-0086.

[31] B. Berman and S. Thelen, “Planning and implementing an effective omnichannel marketing program,” *Int. J. Retail Distrib. Manag.*, vol. 46, no. 7, pp. 598–614, 2018, doi: 10.1108/IJRDM-08-2016-0131.

[32] W. Piotrowicz and R. Cuthbertson, “Introduction to the special issue information technology in retail: Toward omnichannel retailing,” *Int. J. Electron. Commer.*, vol. 18, no. 4, pp. 5–16, 2014, doi: 10.2753/JEC1086-4415180400.

[33] S. Saghiri, R. Wilding, C. Mena, and M. Bourlakis, “Toward a three-dimensional framework for omni-channel,” *J. Bus. Res.*, vol. 77, no. June 2016, pp. 53–67, 2017, doi: 10.1016/j.jbusres.2017.03.025.

[34] D. Taylor, S. Brockhaus, A. M. Knemeyer, and P. Murphy, “Omnichannel fulfillment strategies: defining the concept and building an agenda for future inquiry,” *Int. J. Logist. Manag.*, vol. 30, no. 3, pp. 863–891, 2019, doi: 10.1108/IJLM-09-2018-0223.

[35] C. L. Hsu and J. C. C. Lin, “Understanding continuance intention to use online to offline (O2O) apps,” *Electron. Mark.*, vol. 30, no. 4, pp. 883–897, 2020, doi: 10.1007/s12525-019-00354-x.

[36] M. Jin, G. Li, and T. C. E. Cheng, “Buy online and pick up in-store: Design of the service area,” *Eur. J. Oper. Res.*, vol. 268, no. 2, pp. 613–623, 2018, doi: 10.1016/j.ejor.2018.02.002.

[37] Bell&Howell, “2017 Click and Collect Retail Consumer Preference Study,” 2017.

[38] V. Venkatesh, M. G. Morris, G. B. Davis, and F. D. Davis, “User Acceptance of Information Technology: Toward a Unified View,” *MIS Q.*, vol. 27, no. 3, pp. 425–478, 2003, doi: 10.1016/j.inoche.2016.03.015.

[39] L. Cai, K. F. Yuen, D. Xie, M. Fang, and X. Wang, “Consumer’s usage of logistics technologies: Integration of habit into the unified theory of acceptance and use of technology,” *Technol. Soc.*, vol. 67, no. October, p. 101789, 2021, doi: 10.1016/j.techsoc.2021.101789.

[40] K. Tamilmani, N. P. Rana, and Y. K. Dwivedi, “Consumer Acceptance and Use of Information Technology: A Meta-Analytic Evaluation of UTAUT2,” *Inf. Syst. Front.*, vol. 23, no. 4, pp. 987–1005, 2021, doi: 10.1007/s10796-020-10007-6.

[41] A. A. Alalwan, “Mobile food ordering apps: An empirical study of the factors affecting customer e-satisfaction and continued intention to reuse,” *Int. J. Inf. Manage.*, vol. 50, no. February 2019, pp. 28–44, 2020, doi: 10.1016/j.ijinfomgt.2019.04.008.

[42] A. Mosquera, E. Juaneda-Ayensa, C. Olarte-Pascual, and J. Pelegrin-Borondo, “Key Factors for In-store Smarphone Use in an Omni experience: Millenials vs. Nonmillenials,” *Complexity*, vol. 2018, pp. 1–14, 2018, doi: https://doi.org/10.1155/2018/1057356.

[43] J. P. Cabrera-Sánchez, Á. F. Villarejo-Ramos, F. Liébana-Cabanillas, and A. A. Shaikh, "Identifying relevant segments of AI applications adopters – Expanding the UTAUT2's variables," *Telemat. Informatics*, vol. 58, no. September 2020, 2021, doi: 10.1016/j.tele.2020.101529.

[44] N. Shaw and K. Sergueeva, "The non-monetary benefits of mobile commerce: Extending UTAUT2 with perceived value," *Int. J. Inf. Manage.*, vol. 45, no. December 2017, pp. 44–55, 2019, doi: 10.1016/j.ijinfomgt.2018.10.024.

[45] S. Kapser and M. Abdelrahman, "Acceptance of autonomous delivery vehicles for last-mile delivery in Germany – Extending UTAUT2 with risk perceptions," *Transp. Res. Part C Emerg. Technol.*, vol. 111, no. June 2019, pp. 210–225, 2020, doi: 10.1016/j.trc.2019.12.016.

[46] S. A. Brown and V. Venkatesh, "Model of adoption of technology in households: A baseline model test and extension incorporating household life cycle," *MIS Q. Manag. Inf. Syst.*, vol. 29, no. 3, pp. 399–426, 2005, doi: 10.2307/25148690.

[47] A. A. Fauzi and M. L. Sheng, "Ride-hailing apps' continuance intention among different consumer groups in Indonesia: the role of personal innovativeness and perceived utilitarian and hedonic value," *Asia Pacific J. Mark. Logist.*, vol. 33, no. 5, pp. 1195–1219, 2020, doi: 10.1108/APJML-05-2019-0332.

[48] P. Chatterjee, "Causes and consequences of 'order online pick up in-store' shopping behavior," *Int. Rev. Retail. Distrib. Consum. Res.*, vol. 20, no. 4, pp. 431–448, 2010, doi: 10.1080/09593969.2010.504009.

[49] K. F. Yuen, X. Wang, L. T. W. Ng, and Y. D. Wong, "An investigation of customers' intention to use self-collection services for last-mile delivery," *Transp. Policy*, vol. 66, no. March, pp. 1–8, 2018, doi: 10.1016/j.tranpol.2018.03.001.

[50] R. L. Flight, A. W. Allaway, W.-M. Kim, and G. D'Souza, "A study of Perceived Innovation Characteristics Across Cultures and Stages of Diffusion," *J. Mark. Theory Pract.*, vol. 19, no. 1, pp. 109–126, 2011.

[51] X. Wang, K. F. Yuen, Y. D. Wong, and C. C. Teo, "An innovation diffusion perspective of e-consumers' initial adoption of self-collection service via automated parcel station," *Int. J. Logist. Manag.*, vol. 29, no. 1, pp. 237–260, 2018, doi: 10.1108/IJLM-12-2016-0302.

[52] S. Hoffmann and K. Soyez, "A cognitive model to predict domain-specific consumer innovativeness," *J. Bus. Res.*, vol. 63, no. 7, pp. 778–785, 2010, doi: 10.1016/j.jbusres.2009.06.007.

[53] S. A. Nikou and A. A. Economides, "Mobile-based assessment: Investigating the factors that influence behavioral intention to use," *Comput. Educ.*, vol. 109, pp. 56–73, 2017, doi: 10.1016/j.compedu.2017.02.005.

[54] S. Pandey and D. Chawla, "Exploring Factors That Drive Adoption of Various Categories of M-commerce: An Emerging Market Study," *Glob. Bus. Rev.*, vol. 21, no. 2, pp. 526–546, 2020, doi: 10.1177/0972150918792146.

[55] I. D. Savila, R. N. Wathoni, A. S. Santoso, I. D. Savila, R. N. Wathoni, and A. S. Santoso, "The Role of Multichannel Integration , Trust and Offline-to-Online The Role of Multichannel Integration , Trust and Offline-to-Online Customer Loyalty Towards Repurchase Intention : an Empirical Customer Loyalty Towards Repurchase Intention : an Empirical," *Procedia Comput. Sci.*, vol. 161, pp. 859–866, 2019, doi: 10.1016/j.procs.2019.11.193.

[56] P. E. Santo and A. M. A. Marques, "Determinants of the online purchase intention: hedonic motivations, prices, information and trust," *Balt. J. Manag.*, vol. 17, no. 1, pp. 56–71, 2022, doi: 10.1108/BJM-04-2021-0140.

[57] M. Zhang, C. Ren, G. A. Wang, and Z. He, "The impact of channel integration on consumer responses in omni-channel retailing: The mediating effect of consumer empowerment," *Electron. Commer. Res. Appl.*, vol. 28, pp. 181–193, 2018, doi: 10.1016/j.elerap.2018.02.002.

[58] S. Rose, M. Clark, P. Samouel, and N. Hair, “Online Customer Experience in e-Retailing: An empirical model of Antecedents and Outcomes,” *J. Retail.*, vol. 88, no. 2, pp. 308–322, 2012, doi: 10.1016/j.jretai.2012.03.001.

[59] J. Hair Jr, G. T. Hult, C. Ringle, and M. Sarstedt, *A Primer on Partial Least Squares Structural Equation Modeling (PLS-SEM)*. 2017.

[60] J. F. Hair Jr, W. C. Black, B. J. Babin, R. E. Anderson, W. C. Black, and R. E. Anderson, *Multivariate Data Analysis*. 2019.

[61] N. K. Malhotra, D. Nunan, and D. F. Birks, *Marketing research*. 2016.