Are Habit, Social Influences, and Price Important to Actual Use of Online Food Delivery System (OFDS)?

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Abstract. Online Food Delivery Service (OFDS) can be defined as a transaction for the delivery of various foods through mobile handheld devices that allow consumers to connect to various local restaurants and food providers through mobile-based applications. In a developing country like Indonesia, the adoption rate and revenue of the OFDS sector are growing rapidly. This study aims to investigate what factors drive user intention to adopt the OFDS. Total of 100 respondents who filled out the questionnaire which was distributed online. Data is processed using the Structural Equation Model (SEM) method with the help of SPSS 23 and SMOSS 21 software. The results of this study indicate that the results of this study indicate that habit has a positive influence on the intention to use OFDS; price and intention to use OFDS have an influence on the actual use of OFDS. Based on the results of this study, OFDS providers must pay attention to habit and price factors so that more and more consumers adopt OFDS because it is predicted that in the next few years the number of users and income of the OFDS sector will increase.

Keywords: Online Food · Habit · Social Influence · Behavioral Intention

1 Introduction

The emergence of the sharing economy, the process of buying and selling transactions through e-commerce, the development of solutions from third parties, and economic growth, food delivery platforms have emerged and are growing rapidly [1]. Food delivery platform is also commonly referred to as the Online Food Delivery Service (OFDS). OFDS can be defined as transactions for the delivery of various foods through mobile handheld devices that allow consumers to connect to various local restaurants and food providers through mobile-based applications (Chen et al., 2020; Prasetyo et al., 2021). Over the past few years, the popularity of OFDS has grown very rapidly [2]. Indonesia is one of the developing countries that has a rapid use of OFDS [3].

OFDS sector revenue has increased quite significantly from year to year [4]. In 2017 Indonesian OFDS sector had revenue of 851 thousand USD and tripled to 2,571 thousand USD in 2022. This number is predicted to continue to increase until 2024. Apart from

revenue, the OFDS market penetration in Indonesia has also increased [5]. In 2020, Indonesia has 19.1 million OFDS users. In the same year, there were 25 million OFDS restaurant users. This number is predicted to continue to increase in the following years.

One of the reasons for the high OFDS penetration rate in Indonesia is that new OFDS users are attracted by the advantages provided by this application. OFDS provides almost all the needs of customers who want to buy food and drinks and allows customers to buy them without having to leave the house and not interact with restaurants to order food [3]. OFDS is also equipped with digital payment tools that make it easier for customers to make purchases. In addition, OFDS providers in Indonesia such as GoFood, Shopee Food, GrabFood, etc. compete each other to steal users' attention by offering various kinds of promotions and discounts. According to previous research, promotions and discounts can affect users' intention to use OFDS [2, 3].

Many previous studies have examined OFDS. Some researchs using the Technology Acceptance Model (TAM) [3, 6–9], using the Theory of Planned Behavior [3, 8, 10], using the unified theory of acceptance and use of technology Model (UTAUT) [11, 12]. With the fast-paced competition in the food service industry and the popularity of OFDS, so research into the factors that attract consumers to use this application will be very useful. Therefore this study aims to investigate what factors drive user intentions to adopt OFDS. Previous research stated that future research could examine how encouragement from social influence influences the intention to use OFDS [11]. Meanwhile, on the other hand, there is still little research that examines how the influence of social influences on the intention to use OFDS. Therefore, this study will examine social influence factors and several other factors that influence the user's intention to use OFDS.

2   Research Methods

This research is quantitative research and based on the objectives, this research aims to investigate the casual relationship between variables. This study used a questionnaire distributed through an online platform. In the questionnaire distributed there were screening questions that confirmed whether the respondent had used OFDS in the last
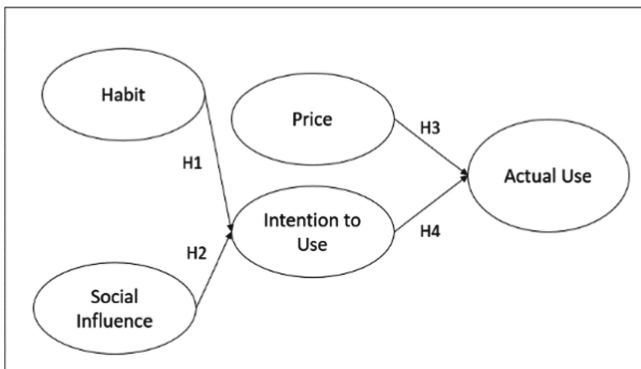

Fig. 1. Research Model

6 months before the study was conducted. Respondents who had never used OFDS in the last 6 months were excluded. More specifically, the characteristics of the sample from this study were respondents who in the last 6 months had used OFDS, aged between 16 to 56 years, and had a high school education or equivalent.

There are 5 variables in this study. Each variable has measurement items. The 5 variables used in this study are habit (3 items), intention to use (4 items), price (3 items) and actual use (3 items). Research model shown by Fig. 1. Total of 100 respondents who filled out the questionnaire which was distributed online. Data is processed using the Structural Equation Model (SEM) method with the help of SPSS 23 and SMOSS 21 software.

3   Results

3.1   Respondent's Profile

The questionnaire distributed online was filled in by 100 respondents. Respondents were dominated by women (55%), aged 16–24 years (65%), had a bachelor's degree/diploma (46%), worked as students (54%), and had an income of Rp 1.000.001 Rp 5.000.000 (27%).

3.2   Validity and Reliability Test Results

We tested the validity and reliability of the first stage by calculating the Pearson Correlation and Cronbach's Alpha in SPSS. In the first stage, all variables are declared valid and reliable because they have Pearson Correlation <0.05 and Cronbach's Alpha >0.6.

3.3   Measurement Models

Table 1 shows the CFA model fit test. The test results reveal that all indices have categories of marginal fit values. To test the validity and reliability of the research variables, we calculated the Variance Extracted (AVE) and Construct Reliability (CR) values. From the calculation results, it can be concluded that all the variables used in this study are valid and reliable. All variables have an AVE value of more than 0.50 and a CR value of more than 0.70 (Table 2).

3.4   Structural Models and Hyphothesis Testing

Table 3 shows the fit test model of the structural research model. It can be concluded that all indices are included in the marginal fit. The results of hypothesis testing are shown in Table 4. Table 4 shows that not all of the proposed hypotheses are accepted. The hypothesis is accepted if it has a significance value (p-value) of less than 0.05 and the estimate value is in line with the proposed hypothesis. The results of hypothesis testing show that H1, H2, and H4 are accepted. Whereas H3 is rejected because it has a negative estimation value and a p-value greater than 0.05.

Table 1. CFA Model Fit Test

No.	Match Testing	Criteria	Results	Description
1	CMIN/DF	≤2,00	3,057	Marginal fit
2	GFI	≥0,90	0,749	Marginal fit
3	RMSEA	≤0,08	0,144	Marginal fit
4	TLI/NNFI	≥0,90	0,748	Marginal fit
5	CFI	≥0,90	0,803	Marginal fit

Table 2. AVE and CR of the Construct

Variable	AVE	CR
Habit	0,565	0,791
Social Influence	0,652	0,849
Price	0,540	0,778
Intention to Use	0,544	0,824
Actual Use	0,512	0,756

Table 3. Model Fit Test of Structural Model

No.	Match Testing	Criteria	Results	Description
1	CMIN/DF	≤2,00	2,998	Marginal fit
2	GFI	≥0,90	0,750	Marginal fit
3	RMSEA	≤0,08	0,142	Marginal fit
4	TLI/NNFI	≥0,90	0,755	Marginal fit
5	CFI	≥0,90	0,802	Marginal fit

Table 4. Summary of Hypothesis Test Results

H	Relationship between constructs	Estimate Value	*Critical ratio*	*P*	Significance	Supported Hypothesis
H1	HB → IU	0,814	4,1	***	Yes	Yes
H2	SI → IU	−0,002	−0,16	0,987	No	No
H3	PC → AU	0,788	4,889	***	Yes	Yes
H4	IU → AU	0,269	2,379	0,017	Yes	Yes

4 Results

The results of hypothesis testing show that the higher the respondent's habit, the higher the intention to use OFDS. This result is in line with previous studies [11, 13, 14] Habit shows how the relationship regarding a person's past and future behavior [15]. By accepting H2, it shows that habit has an important role in shaping consumer intentions to use OFDS. Based on the results of SEM calculations, habit has a considerable influence on the intention to use OFDS (estimated value 0.814). In the case of OFDS, even though at first there were still many consumers who were not familiar with OFDS applications, over time consumers thought they would get convenience and ultimately depended on OFDS to buy food. Therefore, to create big intentions, OFDS companies must create marketing programs that increase the habit of using OFDS applications.

The results of hypothesis testing show that social influences are not a factor that influences a person's intention to do something. This result is in line with previous studies [16, 17]. Previous research stated that social influences cannot be predicted effectively to measure a person's intention to do or not do something. This shows that the people closest to the consumer are not able to influence the consumer to determine their intention to use OFDS.

The results of hypothesis testing show that the cheaper the OFDS price, the higher the possibility for consumers to actually use OFDS. The results of this study are in line with previous research [3]. It means that if the price of food in OFDS is affordable and reasonable, it will affect the actual use of OFDS. Consumer perceptions of OFDS can be measured by how many sacrifices (including costs incurred) and what benefits are obtained. The more things that can be saved or the cheaper the price paid, the higher the perception that the OFDS service is a convenient service to use. What's interesting is that price has a significant influence on the actual use of OFDS (estimated value 0.788) when compared to the effect that comes from the intention to use OFDS (estimated value 0.269). This shows that even though customers have the intention to use OFDS, if the price offered by OFDS providers is unaffordable and considered unreasonable by OFDS, consumers will cancel using OFDS. Therefore OFDS providers need to consider the affordability of the prices offered which include food prices that have been marked up by OFDS providers, taxes, delivery prices, and service fees.

The results of hypothesis testing show that the higher the consumer's intention to use OFDS, the higher the likelihood of the consumer actually using OFDS. The results of this study are in line with previous research [3, 18]. The consumer's intention to use OFDS is defined as the possibility of the consumer to actually use OFDS.

5 Conclusion

This study wants to find out what factors influence the intention and actual use of OFDS by consumers in Indonesia by considering habit, social influences, and price. Of the 4 hypotheses proposed, only 3 hypotheses are supported. The results of this study indicate that habit has a positive influence on the intention to use OFDS; price and intention to use OFDS have an influence on the actual use of OFDS.

Based on the research results, it is known that habit and price are important factors that influence the actual use of OFDS. Therefore, OFDS providers must pay attention to

these two factors so that more and more consumers will use OFDS. With a lot of data showing that the number of users and revenues of OFDS will increase in the next few years, it is important for OFDS providers to pay attention to what factors can affect the attitude, intention, and usage of OFDS. Even though Indonesia is a potential market for OFDS providers, competition in the OFDS industry is also predicted to more intense.

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