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## The Effect of Electronic Service Quality on Customer Satisfaction and Implications for LinkAja Customer Loyalty (Survey of Undergraduate Students of Class 2019, 2020, and 2021 of The Faculty of Economics and Business, Winaya Mukti University)

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**Abstract:** This research starts from the discovery of problems in low customer satisfaction which has an impact on customer loyalty. Low customer satisfaction is caused by low electronic service quality. This study aims to determine the effect of electronic service quality on customer satisfaction and its implications for LinkAja customer loyalty. The research method used is descriptive and verification method with a sample size of 80 respondents. Instrument testing uses validity and reliability tests. The data collection techniques used were observation and distributing questionnaires. The data analysis method used is path analysis, coefficient of determination analysis, and hypothesis testing. The results showed that in structure I there was an effect of electronic service quality on customer satisfaction of 78.6%, and the remaining 21.4% was influenced by other variables not studied. In structure II, there is an effect of customer satisfaction on customer loyalty of 40.2%, and the remaining 59.8% is influenced by other variables not studied. In structure III, there is an effect of electronic service quality on customer loyalty of 42.9%, and the remaining 57.1% is influenced by other variables not studied.

**Keyword:** Electronic Service Quality, Customer Satisfaction, Customer Loyalty

### INTRODUCTION

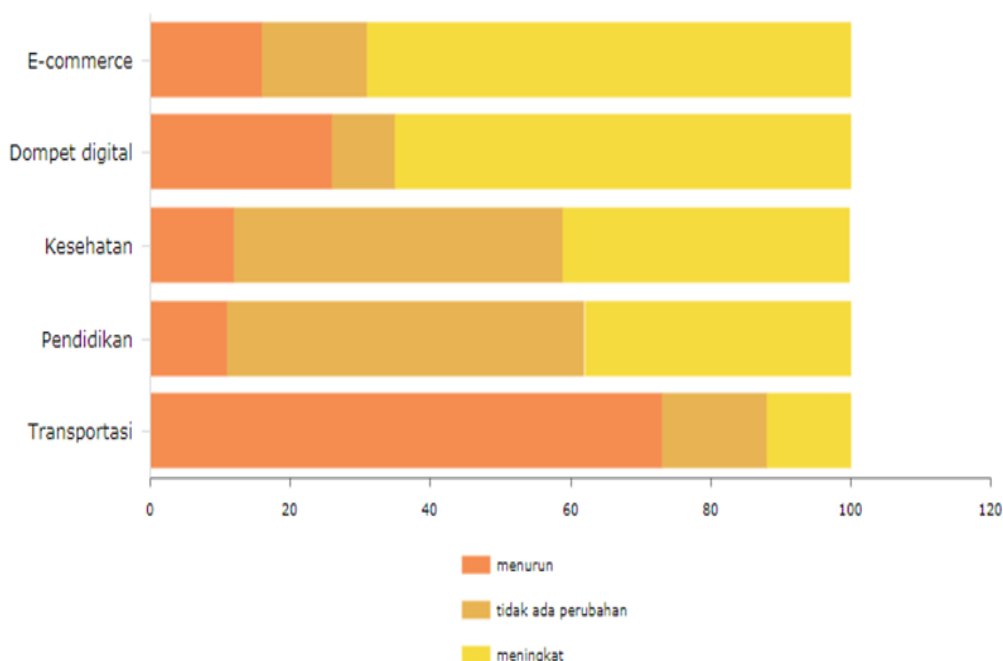
Information and communication technology continues to develop every day resulting in humans being unable to escape this rapid growth. One of the most significant forms of technological advancement is the invention of the internet. With the development of the internet and globalisation continuing to occur, changes in the world are increasingly felt by everyone. One form of globalisation is economic globalisation which leads to an increase in the world economy.

In terms of marketing, economic globalisation can take the form of easy access to business that can be achieved whenever and wherever we are. Until now, the world has reached the industrial era 4.0 which is characterised by the integration of all human activities into the

virtual world without the need for direct contact (Lestari, 2020). In line with this, the payment system in economic transactions also continues to change to support business progress. For this reason, banks as the party that facilitates people's buying and selling transactions are required to make innovations so that the customer transaction process is easier (Napitupulu, 2020).

In the modern era, convenience is a top priority that cannot be underestimated. Indonesian people in conducting financial transactions generally use banknotes and coins as official means of exchange. However, in the current digital era, it has changed the public transaction system from what used to be offline to online (Widiyanti, 2020).

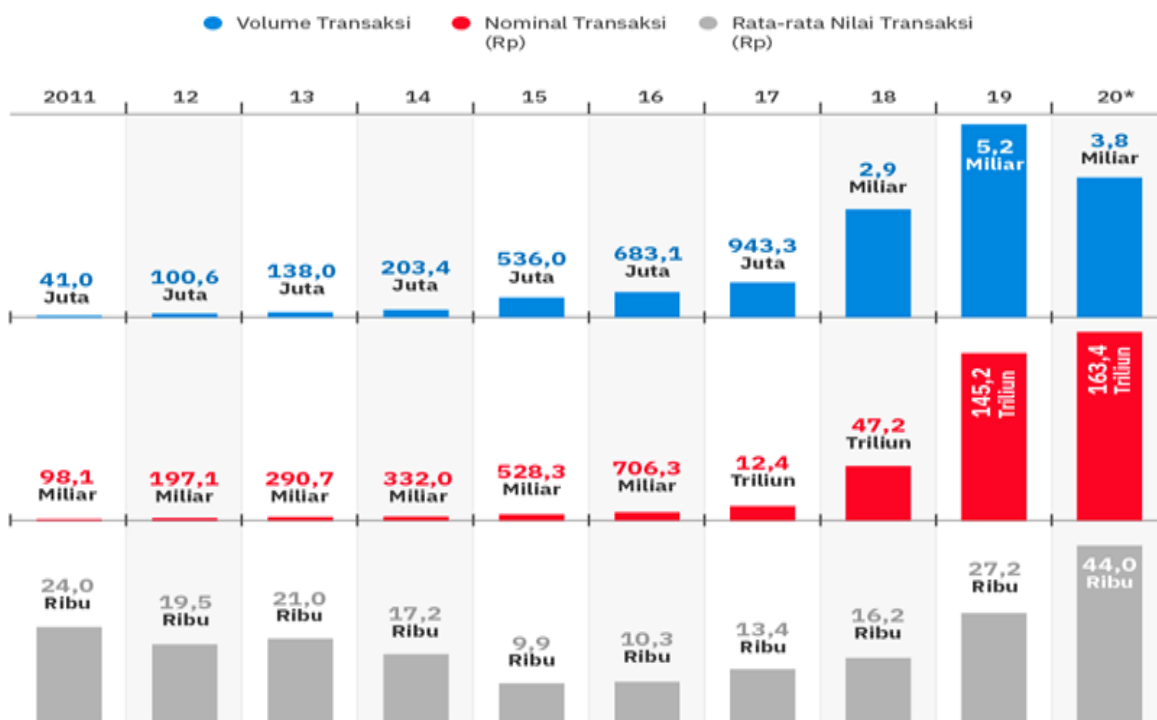
In 2020, the world is faced with unexpected conditions, namely the outbreak of the corona virus. The Covid-19 pandemic has changed the order of human life. The appeal to maintain distance and the recommendation to "stay at home" in order to break the chain of the spread of Covid-19 has resulted in limited human movement. This has resulted in an increase in online shopping transactions and the use of e-wallets among the public.



**Figure 1. Use of Digital Services in Indonesia during the Covid-19 Pandemic in 2020**

Based on Figure 1, the use of a number of digital services in Indonesia has increased during the Covid-19 pandemic. The first position was occupied by e-commerce and the second position was occupied by digital wallets which experienced an increase of 65%. This proves that digital wallets are increasingly becoming an option for Indonesians in making transactions.

Bank Indonesia as the central bank has issued a policy related to payment methods using e-money which is regulated in Bank Indonesia regulation Number: 20/6/PBI/2018, E-Money is issued on the basis of the value of money deposited in advance by the holder to the issuer and the value of the money is stored electronically in a medium such as a server or chip.



Source: Bank Indonesia

**Figure 2. The Development of Electronic Transactions**

Electronic transaction data in Figure 2 obtained through the Bank Indonesia Website proves that the use of electronic money in Indonesian society from year to year has increased significantly, despite experiencing a decrease in transaction volume but the nominal transaction has increased. The development of e-wallets is also triggered by a variety of product offerings, there are several e-wallets that are currently developing in Indonesia. Here are some market shares of e-wallet products:

**Table 1. Market Share of E-Wallet in 2020**

No.	E-Wallet	Market Share
1.	ShopeePay	32%
2.	OVO	25%
3.	GoPay	21%
4.	DANA	14%
5.	LinkAja	8%

Source: bisnis.com

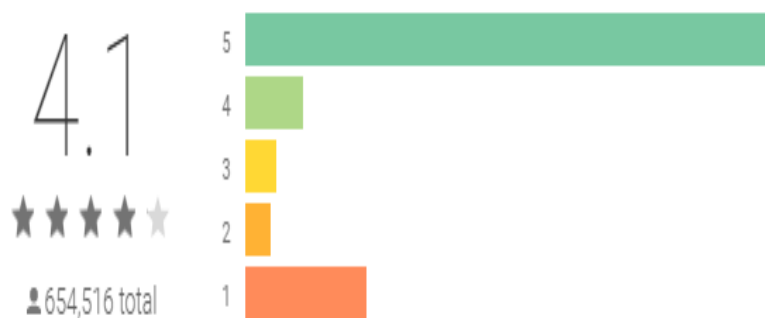
Based on Table 1, it shows that of the five e-wallets market share percentage, LinkAja is in the last rank of the total market share of 8%, indicating that LinkAja is still less competitive with other e-wallet products. As for some lists of e-wallets with loyal users in Indonesia in 2020 are as follows:



**Figure 3. E-Wallet Customer Loyalty**

From the data above, it can be seen that LinkAja e-wallet has the lowest level of customer loyalty compared to other e-wallets. This is a problem faced by LinkAja so that it cannot compete with other e-wallet products. Loyal customers will use the company's products more and for a longer time (Kotler and Armstrong, 2018: 44). Customer loyalty is closely influenced by the company's ability to meet expectations and satisfy customers.

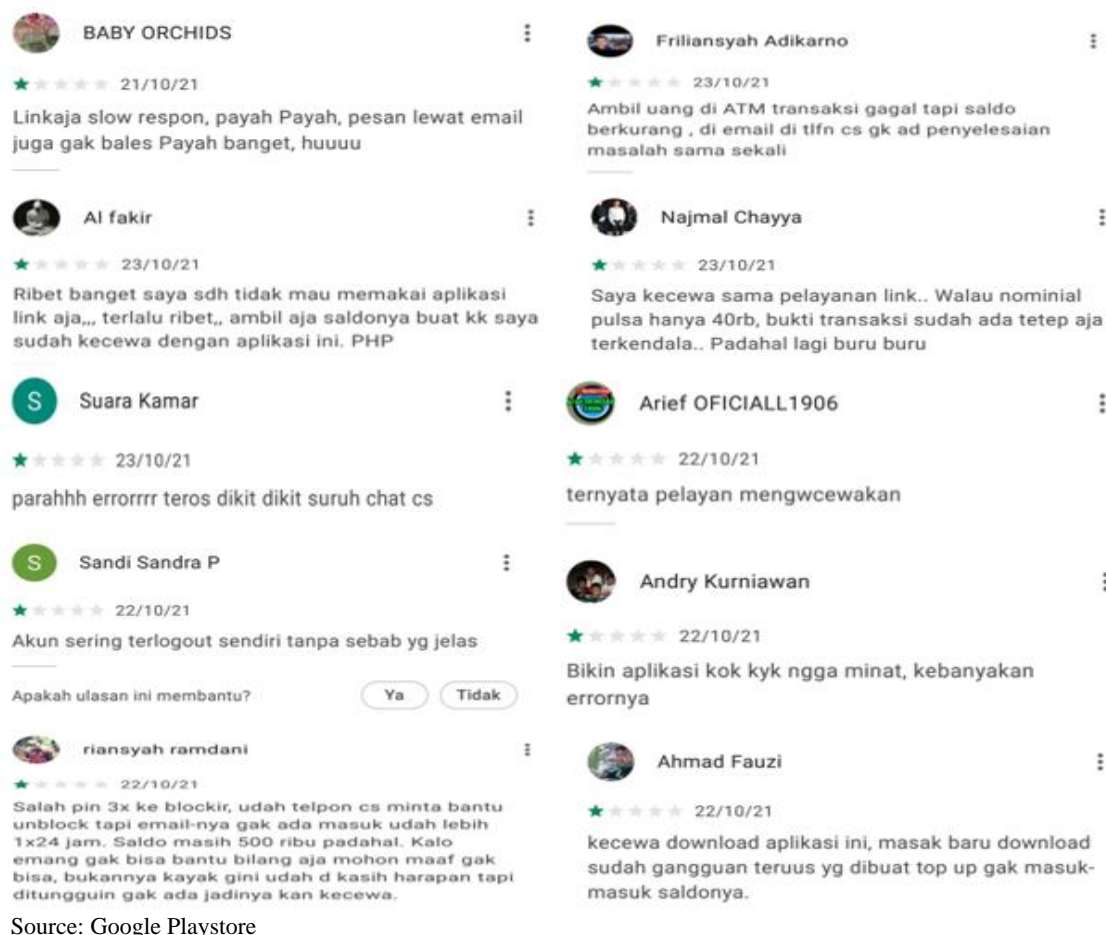
The level of customer satisfaction will affect customer loyalty to the product. Customer satisfaction is one of several causes of the formation of customer loyalty. If customer satisfaction is high, it will have an impact on loyalty to a product or service. To find out the level of LinkAja customer satisfaction, it can be seen from the rating given by LinkAja e-wallet users in the Google Play Store application. The following is data about the rating on LinkAja services:



Source: Google Playstore

**Figure 4. LinkAja Ratings**

It can be seen that LinkAja's rating value is 4.1 out of 5. There are still quite a lot of customers who give a 1-star rating or a rating of 1 and there are also those who give 2 and 3 stars, meaning that there are still many customers who are dissatisfied with LinkAja's e-wallet. to find out what factors cause the number of customers who are dissatisfied with LinkAja's e-wallet, the following data on LinkAja customer complaints:



Source: Google Playstore

Figure 5. LinkAja Customer Complaints

From the list of LinkAja user complaints, there are many complaints about customer service and also the LinkAja application which often experiences problems or errors. So that it makes customers disappointed and gives a rating or one star for LinkAja, this is certainly a serious problem that LinkAja must immediately fix.

Good service encourages customer interest in reusing these services so as to create loyalty. Consumer loyalty can also be formed from the satisfaction felt by consumers, where a company or agency must pay attention to customer satisfaction where this satisfaction has an impact on loyalty. This is reinforced by Kotler's opinion (in Widjoyo, Rumambi, and Kunto, 2013: 4), nowadays companies must pay better attention to the level of customer satisfaction because consumers themselves can spread bad and good news quickly.

## METHOD

This research uses quantitative methods with descriptive and verification approaches with a sample size of 80 respondents. Instrument testing uses validity and reliability tests. The data collection techniques used were observation and distributing questionnaires. The data analysis method used is path analysis, coefficient of determination analysis, and hypothesis testing.

## Validity Test

To find the validity coefficient value, the researcher used the Pearson product moment formula. Sugiyono (2016: 179) states that the minimum requirement for an instrument item to be considered valid is that the validity index value is positive and the amount is 0.3 and above, if the correlation level is below 0.3 it must be corrected and considered invalid.

### Reliability Test

This reliability test is carried out on the statement items in the questionnaire which will be made in the study. According to Sugiyono (2017: 130) the reliability test is the extent to which the measurement results using the same object will produce the same data. The research instrument is indicated as having an adequate level of reliability if the Cronbach Alpha coefficient is greater than or equal to 0.70. If the test criteria are met, the questionnaire is declared reliable.

### Correlation Analysis

Correlation analysis is used to determine the degree of relationship or strength between research variables. The correlation coefficient is usually denoted by the letter r where the value of r can vary from -1 to +1. An r value close to -1 or +1 indicates a strong relationship between variables and an r value close to 0 indicates a weak relationship between these variables. While the + (positive) and - (negative) signs provide information about the direction of the relationship between variables. If the value is + (positive) then the variables have a unidirectional relationship.

### Coefficient of Determination Analysis

The coefficient of determination analysis is an analysis used to determine how much influence the variable relationship is expressed in percentage form. The calculation formula for the coefficient of determination analysis is as follows:

$$Kd = r^2 \times 100\%$$

Where :

Kd = Coefficient of Determination

r<sup>2</sup> = Magnitude of Multiple Correlation Coefficient

### Hypothesis Test

Hypothesis testing in research is carried out to determine whether or not there is an influence of the variables studied. Hypothesis testing in this study through 3 structures, namely structural I regarding the effect of electronic service quality on customer satisfaction, structural II regarding the effect of customer satisfaction on customer loyalty and structure III regarding the effect of electronic service quality on customer loyalty. Hypothesis testing for this correlation is formulated with a null hypothesis (H0) and an alternative hypothesis (Ha).

### Partial Hypothesis Test (t test)

The t test is called a partial test, which tests how much influence each variable has individually. This test can be done by comparing t count with t table or by looking at the significance column of each t count. However, if the probability or significance value is > 0.05, it can be said that there is no significant relationship between each variable. The t-test can also be done with the help of the SPSS application.

## RESULTS AND DISCUSSION

Validity testing is carried out to determine whether the measuring instrument designed in the form of a questionnaire can actually carry out its function in each item question. If the correlation coefficient of the statement items tested with  $r_{hitung} > 0.300$  then the statement is declared valid. The following are the results of the validity test of all statement items:

**Table 2. Electronic Service Quality Variable Validity Test Results**

Item's	r <sub>hitung</sub>	r <sub>tabel</sub>	Description
1	0,752	0,300	Valid

2	0,728	0,300	Valid
3	0,656	0,300	Valid
4	0,795	0,300	Valid
5	0,748	0,300	Valid
6	0,764	0,300	Valid
7	0,799	0,300	Valid
8	0,820	0,300	Valid
9	0,706	0,300	Valid
10	0,745	0,300	Valid
11	0,635	0,300	Valid
12	0,731	0,300	Valid
13	0,724	0,300	Valid
14	0,744	0,300	Valid

Source: SPSS 26

**Table 3. Customer Satisfaction Variable Validity Test Result**

Item's	r <sub>hitung</sub>	r <sub>tabel</sub>	Description
1	0,884	0,300	Valid
2	0,736	0,300	Valid
3	0,707	0,300	Valid
4	0,698	0,300	Valid
5	0,863	0,300	Valid
6	0,830	0,300	Valid

Source: SPSS 26

**Table 4. Customer Loyalty Variable Validity Test Result**

Item's	r <sub>hitung</sub>	r <sub>tabel</sub>	Description
1	0,803	0,300	Valid
2	0,818	0,300	Valid
3	0,862	0,300	Valid
4	0,825	0,300	Valid
5	0,832	0,300	Valid
6	0,802	0,300	Valid
7	0,817	0,300	Valid

Source: SPSS 26

Based on the results of the validity test using SPSS 26, all statement items in the questionnaire are declared valid or can be used as measuring instruments. This is because all statements have a correlation value greater than 0.300.

Reliability in this study uses the Cronbach Alpha value approach with a minimum limit of 0.7, which means that the measuring instrument is said to be precise, stable and reliable. The following are the results of the reliability test for each variable:

**Table 5. Reliability Test Results**

No	Variable	r <sub>hitung</sub>	r <sub>tabel</sub>	Description
1.	Electronic Service Quality	0,936	0,700	Reliabel
2.	Customer Satisfaction	0,877	0,700	Reliabel
3.	Customer Loyalty	0,920	0,700	Reliabel

Source: SPSS 26

Based on the results of the reliability test using SPSS 26, all variables are declared reliable or the measuring instrument is said to be precise, stable and reliable. This is because all variables have an Alpha Cronbach value greater than 0.700.

**Structure I**

Structure I testing begins with a correlation calculation using a correlation analysis calculation. This analysis is used to determine the degree or strength of the relationship between the electronic service quality variable (X) and the customer satisfaction variable (Y). These results were obtained using the SPSS version 26 application. The following are the calculation results:

**Table 6. Correlation Analysis of Structure I Model Summary**

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.887 <sup>a</sup>	.786	.783	2.055592

a. Predictors: (Constant), ElectronicServiceQuality  
Source: SPSS 26

The correlation value (R) is 0.887 which is included in a very strong relationship. The correlation that occurs is a positive correlation, which is vulnerable between 0.800 - 1.000. This shows that there is a very strong relationship between electronic service quality (X1) and customer satisfaction (Y).

The results of data processing indicate the coefficient of determination R square of 0.786 or 78.6%. This illustrates that the influence of the electronic service quality variable (X) has an effect of 78.6% on customer satisfaction (Y) and the remaining 21.4% is the influence of other variables not examined.

This partial hypothesis testing is carried out to test whether the electronic service quality variable (X) has a significant effect on the customer satisfaction variable (Y). Partial hypotheses are explained in statistical form as listed below:

$H_0 : \rho_{yx} \leq 0$  : (there is no significant positive effect between electronic service quality and customer satisfaction).

$H_a : \rho_{yx} > 0$  : (there is a significant positive influence between electronic service quality on customer satisfaction).

After the test is carried out, the calculation results for each hypothesis T count, compared with T table with an error rate of 5% one tailed test and the provisions are as follows:  $H_0$  is rejected,  $H_a$  is accepted, if T count > T table means there is an influence.

$H_0$  is accepted,  $H_a$  is rejected, if T count < T table means there is no effect.

**Table 7. Partial Hypothesis Testing (T Test) Structure I Coefficients<sup>a</sup>**

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	.297	.927		.320	.750
	ElectronicServiceQuality	.404	.024	.887	16.936	.000

a. Dependent Variable: CustomerSatisfaction  
Source: SPSS 26

It was obtained that T count was 16.936 by taking a significant level of 0.05 and a degree of freedom (n-1-1) = 80-1-1 = 78, obtained T table = 1.664, because T count > T table



or  $16.936 > 1.664$  and sig of 0.000 smaller than 0.05, a decision was made to reject  $H_0$ . This means that there is a significant positive effect between the electronic service quality variable (X) on customer satisfaction (Y). Based on the results that have been described, the following is a path diagram for structure I:

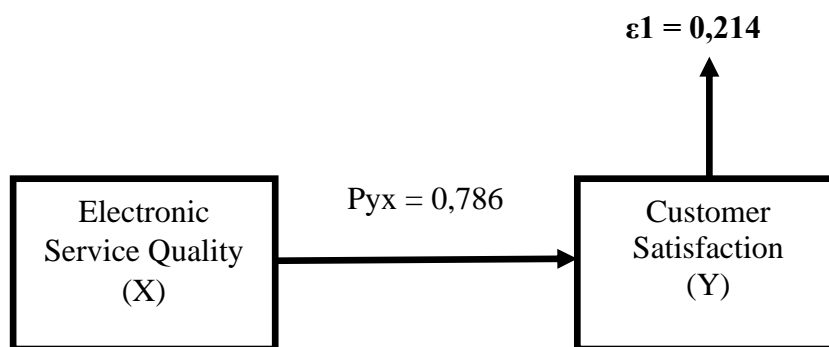


Figure 6. Structure I Path Diagram

The figure above illustrates the effect of electronic service quality (X) on customer satisfaction (Y). The path equation based on this figure is as follows:

$$Y = 0,786X + 0,214 (\epsilon_1)$$

### Structure II

Structure II testing begins with a correlation calculation using a correlation analysis calculation. This analysis is used to determine the degree or strength of the relationship between the customer satisfaction variable (Y) and the customer loyalty variable (Z). These results were obtained using the SPSS version 26 application. The following are the calculation results:

Table 8. Partial Hypothesis Testing (T Test) Structure II  
Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.634 <sup>a</sup>	.402	.394	4.211033

a. Predictors: (Constant), CustomerSatisfaction  
Source: SPSS 26

The correlation value (R) is 0.634 which is included in a strong relationship. The correlation that occurs is a positive correlation, which is vulnerable between 0.600 - 0.799. This shows that there is a strong relationship between customer satisfaction (Y) and customer loyalty (Z).

The results of data processing indicate the coefficient of determination R square of 0.402 or 40.2%. This illustrates that the effect of the customer satisfaction variable (Y) has an effect of 40.2% on customer loyalty (Z) and the remaining 59.8% is the influence of other variables not examined.

This partial hypothesis testing is carried out to test whether the customer satisfaction variable (Y) has a significant effect on the customer loyalty variable (Z). Partial hypotheses are explained in statistical form as listed below:

$H_0 : P_{zy} \leq 0$  : (there is no significant positive effect between customer satisfaction and customer loyalty).

$H_a : P_{zy} > 0$  : (there is a significant positive influence between customer satisfaction and customer loyalty).

After the test is carried out, the calculation results for each hypothesis T count, compared with T table with an error rate of 5% one tailed test and the provisions are as follows: Ho is rejected, Ha is accepted, if T count > T table means there is an influence. Ho is accepted, Ha is rejected, if T count < T table means there is no effect.

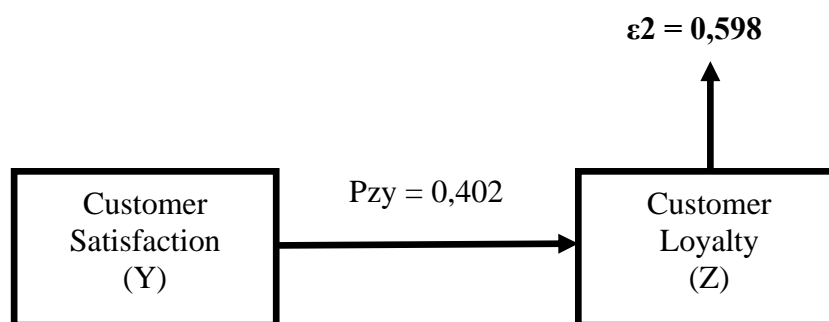
**Table 9. Partial Hypothesis Testing (T Test) Structure II**  
Coefficients<sup>a</sup>

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	9.446	1.729		5.465	.000
	CustomerSatisfaction	.777	.107	.634	7.242	.000

a. Dependent Variable: CustomerLoyalty  
Source: SPSS 26

It is obtained that T count is 7.242 by taking a significant level of 0.05 and a degree of freedom (n-1-1) = 80-1-1 = 78, obtained T table = 1.664, because T count > T table or 7.242 > 1.664 and sig of 0.000 is smaller than 0.05, the decision to reject Ho is taken. This means that there is a significant positive influence between the customer satisfaction variable (Y) on customer loyalty (Z).

Based on the results that have been described, the following is a path diagram for structure II:



**Gambar 7. Structure II Path Diagram**

The picture above illustrates the effect of customer satisfaction (Y) on customer loyalty (Z). The path equation based on this figure is as follows:

$$Z = 0,402X + 0,598 (\epsilon 2)$$

**Structure III**

Structure III testing begins with a correlation calculation using multiple correlation analysis calculations. This analysis is used to determine the degree or strength of the relationship between the electronic service quality variable (X) and the customer loyalty variable (Z). These results were obtained using the SPSS version 26 application. The following are the calculation results:

**Table 10. Partial Hypothesis Testing (T Test) Structure III**  
Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.655 <sup>a</sup>	.429	.421	4.116628

a. Predictors: (Constant), ElectronicServiceQuality  
Source: SPSS 26

Based on table 4.47, the correlation value (R) is 0.655 which is included in a strong relationship. The correlation that occurs is a positive correlation, which is vulnerable between 0.600 - 0.799. This shows that there is a strong relationship between electronic service quality (X) and customer loyalty (Z).

The results of data processing indicate the coefficient of determination R square of 0.429 or 42.9%. This illustrates that the influence of the electronic service quality variable (X) has an effect of 42.9% on customer loyalty (Z) and the remaining 57.1% is the influence of other variables not examined.

This partial hypothesis testing is carried out to test whether the electronic service quality variable (X) has a significant effect on the customer loyalty variable (Z). Partial hypotheses are explained in statistical form as listed below:

$H_0 : P_{zx} \leq 0$  : (there is no significant positive effect between electronic service quality and customer loyalty).

$H_a : P_{zx} > 0$  : (there is a significant positive influence between electronic service quality on customer loyalty).

After the test is carried out, the calculation results for each hypothesis T count, compared with T table with an error rate of 5% one tailed test and the provisions are as follows:  $H_0$  is rejected,  $H_a$  is accepted, if  $T \text{ count} > T \text{ table}$  means there is an influence.  $H_0$  is accepted,  $H_a$  is rejected, if  $T \text{ count} < T \text{ table}$  means there is no influence.

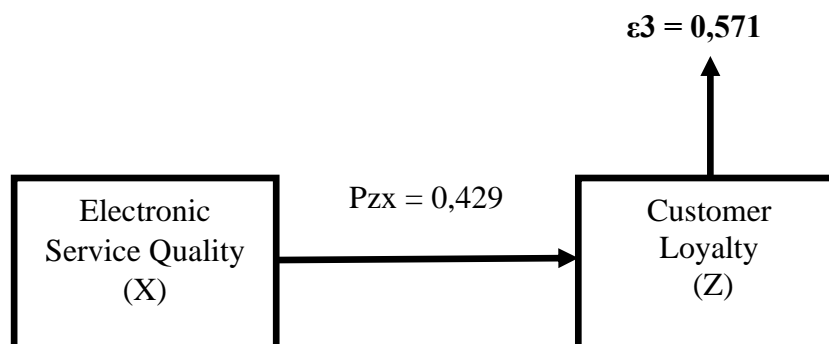
**Table 11. Partial Hypothesis Testing (T Test) Structure III**  
**Coefficients<sup>a</sup>**

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
1 (Constant)	7.735	1.857		4.166	.000
ElectronicServiceQuality	.366	.048	.655	7.648	.000

a. Dependent Variable: CustomerLoyalty  
Source: SPSS 26

Obtained T count of 7.648 by taking a significant level of 0.05 and a degree of freedom  $(n-1-1) = 80-1-1 = 78$ , obtained T table = 1.664, because  $T \text{ count} > T \text{ table}$  or  $7.648 > 1.664$  and sig of 0.000 smaller than 0.05, a decision was made to reject  $H_0$ . This means that there is a significant positive effect between the electronic service quality variable (X) on customer loyalty (Z).

Based on the results that have been described, the following is a path diagram for structure III:



**Gambar 8. Structure III Path Diagram**

The figure above illustrates the effect of electronic service quality (X) on customer loyalty (Y). The regression equation based on this figure is as follows:

$$Z = 0,429X + 0,571 (\epsilon_3)$$

**Indirect Effect**

The indirect effect is the effect of variable X on Z through variable Y. The calculation results are as follows:

$$IE_{ZYX} = X \rightarrow Y \rightarrow Z = (0,786)(0,402) = 0,316$$

The above equation can be seen that there is an effect of electronic service quality on customer loyalty through customer satisfaction.

**Direct Effect**

The direct effect in this study is the effect of variable X on Y, and variable Y on Z. The calculation results can be seen as follows:

$$DE_{YX} : X \rightarrow Y = 0,786$$

$$DE_{ZY} : Y \rightarrow Z = 0,402$$

$$DE_{ZX} : X \rightarrow Z = 0,429$$

Based on the description above, the research results can be seen that the effect of electronic service quality on customer satisfaction is 0.786, the effect of customer satisfaction on customer loyalty is 0.402, the effect of electronic service quality on customer loyalty is 0.429.

**Total Effect**

The total effect is the sum of the X variables on Y both directly and indirectly. The calculation results can be seen as follows:

$$TE_{YX} = DE_{YX} + IE_{ZYX} = (0,786) + (0,316) = 1,102$$

$$TE_{ZY} = DE_{ZY} = 0,402$$

$$TE_{ZX} = DE_{ZX} = 0,429$$

**CONCLUSION**

After analysing the research results, the following conclusions can be drawn:

1. The results of research on the LinkAja Electronic Service Quality variable are included in the unfavourable category, there are still statement indicators that score below the average, namely indicators of fast access to the LinkAja application, the LinkAja application can carry out user requests accurately, LinkAja customer service is quick to respond to user complaints, and LinkAja customer service provides accurate solutions to user complaints.
2. The results of research on the LinkAja Customer Satisfaction variable are in the unfavourable category, there are still statement indicators that score below the average, namely indicators of satisfaction with the quality of LinkAja's electronic services, and the quality of LinkAja's electronic services in accordance with user expectations.
3. The results of research on the LinkAja Customer Loyalty variable are included in the unfavourable category, there are still statement indicators that get below average scores, namely the statement indicator will not use e-wallets other than LinkAja, will use all the features available at LinkAja, will promote LinkAja and will not be interested in other e-wallet offers.
4. The results showed that electronic service quality has a significant positive effect on customer satisfaction. Electronic service quality has a very strong correlation with customer satisfaction.
5. The results showed that customer satisfaction has a significant positive effect on customer loyalty. Customer satisfaction has a strong correlation with customer loyalty.
6. The results showed that electronic service quality has a significant positive effect on customer loyalty. Electronic service quality has a strong correlation with customer loyalty.

## REFERENSI

- Adi Sulisty Nugroho. 2016. *E-Commerce Teori dan Implementasi*. Yogyakarta. EKUILIBRIA.
- Ali, H. 2018. *Marketing dan Kasus - Kasus Pilihan (Cetakan Pertama ed.)*. Yogyakarta Media Pressindo.
- Bank Indonesia. Statistik Sistem Pembayaran Uang Elektronik. Melalui [www.bi.go.id/https://www.bi.go.id/id/statistik/sistempembayaran/uang-elektronik/contents/jumlah%20uang%20elektronik.aspx](http://www.bi.go.id/https://www.bi.go.id/id/statistik/sistempembayaran/uang-elektronik/contents/jumlah%20uang%20elektronik.aspx)
- Griffin. 2013. *Perilaku Organisasi Manajemen*. Jakarta. Salemba Empat.
- Hutami, L. T., & Setyarini, E. 2018. Intensi Penggunaan *Electronic Wallet* Generasi Millennial Pada Tiga *Startup* “Unicorn” Indonesia Berdasarkan Modifikasi Tam. *Jurnal Manajemen*, 8(2), 136-145.
- Iddrisu, A., M., I. K. Nooni, Fianko, K. S., and W. Mensah. 2015. *Assessing the Impact of Service Quality on Customer Loyalty: A Case Study of The Cellular Industry of Ghana*, *British Journal of Marketing Studies*. Vol. 3., No. 6., July., pp. 15 – 30.
- Kotler, Philip and Kevin Lane Keller. 2016. *Marketing Management*. Edisi 15 Global Edition. Pearson.
- Kotler, Philip dan Gary Amstronng. 2018. *Principles of Marketing*. Edisi 15 Global Edition. Pearson.
- Lestari, I. 2020. Terhadap Niat Untuk Menggunakan Kembali Layanan Transportasi Online Di Era Pandemi Covid-19. *Equilibrium* Volume 9. No. 1. Tahun 2020 Hal 27 - 35, 9(1), 27–35.
- Napitupulu, Alexander. 2020. *ELECTRONIC PAYMENT (A CASE STUDY ON FACULTY OF ECONOMICS AND*. (n.d.).
- Ongko Iksan Widjoyo, Leonid Julivan Rumambi, dan Yohanes Sondang Kunto. 2013. Analisis Pengaruh Kualitas Layanan Terhadap Kepuasan Konsumen Pada Layanan Thru McDonald’s Basuki Rahmat di Surabaya. *Jurnal Manajemen Pemasaran*. Vol.1 No.1 (1-12).
- Sangadji, Etta Mamang & Sopiah. 2013. *Perilaku Konsumen – Pendekatan Praktis disertai Himpunan Jurnal Penelitian*. Yogyakarta. ANDI.
- Sembiring, Inka Janita, Suharyono, dan Andriani Kusumawati. 2014. Pengaruh Kualitas Produk dan Kualitas Pelayanan terhadap Kepuasan Pelanggan dalam Membentuk Loyalitas Pelanggan (Studi pada Pelanggan McDonald’s MT.Haryono Malang). *Jurnal Administrasi Bisnis*. Vol.15. No.1.
- Sugiyono. 2016. *Metode Penelitian Kuantitatif, Kualitatif dan R & D*. Bandung. CV Alfabeta.
- Sugiyono. 2017. *Metode Penelitian Kuantitatif, Kualitatif, dan R&D*. Bandung. CV Alfabeta.
- Suryani, Tatik. 2013. *Perilaku Konsumen di Era Internet*. Yogyakarta. Graha Ilmu.
- Tjiptono, F. 2014. *Pemasaran Jasa (Cetakan Ke-4 ed.)*. Yogyakarta. ANDI.
- Widiyanti, W. 2020. Pengaruh Kemanfaatan, Kemudahan Penggunaan dan Promosi terhadap Keputusan Penggunaan *E-Wallet* OVO di Depok. *Moneter – Jurnal Akuntansi Dan Keuangan*, 7(1), 54–68.