

An Influence Analysis Of Website Service Quality Based On Webqual Version 4.0 Toward Customer Satisfaction

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ABSTRACT

This research aims to analyze the significance of the effect of Usability (US), Information Quality (IQ), Service Interaction Quality (SIQ) on Customer Satisfaction (CS) of PT BTN (Persero) Sharia Semarang Branch Office, both simultaneously and partially. The population in this study is all customers of PT BTN (Persero) Sharia Semarang Branch Office who used website, while the samples in this study were 75 customers of PT BTN (Persero) Sharia Semarang Branch Office who were selected using accidental sampling (haphazard sampling) sampling and purposive sampling (judgment sampling). The data used in this study are primary data collected using a questionnaire. The analysis model used in this study is a multiple linear regression analysis model, while the analysis technique uses the simultaneous significance test (F-test), the coefficient of determination test (R²), and the partial significance test (t-test) which is processed with the SPSS 25.00 program. The results of the hypothesis verification and discussion indicate that Usability (US), Information Quality (IQ), and Service Interaction Quality (SIQ) simultaneously have a significant effect on Customer Satisfaction (CS). Furthermore Information Quality (IQ) and Service Interaction Quality (SIQ) partially related positively and significantly to Customer Satisfaction (CS) while Usability (US) partially proved positive and not significantly to Customer Satisfaction (CS) of PT BTN (Persero) Sharia Semarang Branch Office.

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INTRODUCTION

Internet marketing success requires close interaction with corporate financial groups. Therefore, marketing must work closely with the company's financial groups to ensure that

the investment will produce positive long-term benefits (Nurdiana et al., 2023; Nurjanah, 2025; Yendra, 2023). The key to getting this investment back is by developing an interactive marketing site that; (1) Encouraging and persuading a number of consumers to make a return visit and; (2) Utilizing market information across all functional departments ((McDaniel, 2001). Penetration of digital banking using internet banking via smartphones or personal computers (PCs) has increased 1.6-fold in three years which is 56% in 2017 from 36% in 2014. Account opening services through web applications are observed in sufficient quantities to help simplify account opening process. This shows that there is a positive side that can be done related to banking strategies to attract more customers. Internet users are a potential target market for banks, digital consumers who are actively buying more banking products than those who are not (Infobank, 2019).

According on Financial Services Authority Regulation Number 12/POJK.03/2018 (OJK, 2018) Concerning Digital Banking Services Provided by Commercial Banks. Banks can provide electronic banking services or digital banking services. Electronic banking services are services for bank customers to obtain information, communicate, and conduct banking transactions through electronic media. Bank's website (website) that can be accessed through electronic devices, including computers or laptops (Ikmanila & Djastuti, 2025; Nurhaliza, 2025; P. I. Sari & Yanto, 2024).

Moreover the development of information technology can be utilized by banks to improve the efficiency of operational activities and the quality of bank services to customers. The use of information technology in bank operations can also increase the risks faced by banks (Budiraharjo et al., 2025; Pratama et al., 2024). Therefore, banks need to implement risk management effectively and banks are required to have an information technology steering committee based on Financial Services Authority Regulation Number 38/POJK.03/2016 (OJK, 2016).

According to Qardhawi (Nurul A'yun, 2024) based on Rivai (2017: 173) as a guideline to find out the level of satisfaction felt by customers, a bank must see the performance of the company related to the nature of honesty and truth and trustworthiness. This is as the following HR Bukhari No 2079 (Al Fauzan, 2013).

"Sellers and buyers are free to choose as long as they have not broken the transaction. If both are right and explain the shortage of traded goods, both of them get blessings from the sale. However, if both of them cover up the disgrace of the merchandise and lie then if they make a profit, the gift of buying and selling is lost." (HR. Muttafaq 'Alaih).

According to (Tjiptono & Chandra, 2016) Quality is closely related to customer satisfaction. The internet has now become a key driver in fulfilling Customer Satisfaction both from Usability, Information (Information Quality), and Interaction (Service Interaction Quality). The internet has also produced miracles in serving consumers. Electronically meeting consumer demand, for technical support can dramatically increase consumer satisfaction (McDaniel, 2001). As an illustration of customer satisfaction manifested in the Satisfaction Index can be seen in Table 1.

Table 1. Conventional Public Bank Satisfaction Index Book 3 Years of 2019-2020

Bank name	2019 Values (%)	Ranking	Value of 2020 (%)	Ranking
Bank Bukopin	81.37	1	-	-
BTN	80.39	2	-	-
Mega Bank	78.00	3	75.00	2

Source: InfoBank Magazine, January 2019 and 2020.

Based on Table 1., it can be shows that BTN has decreased in terms of value and ranking. In the infobank magazine described BTN produced in 2020 is not ranked in the top 3. This is different from Bank Mega, which is able to increase its ranking even though its value has decreased.

Excellent service is closely related to satisfaction. Excellent service is a service with high quality standards and always follows the development of customer needs at all times, consistently and accurately (reliable). Oriented to customer satisfaction, always following the development of international standards (ISO), quality management, and high quality awareness (Rahmayanty, 2010). Here are the best UUS categories in excellent service.

Figure 1. Best UUS in Excellent Service 2018-2019 (%)

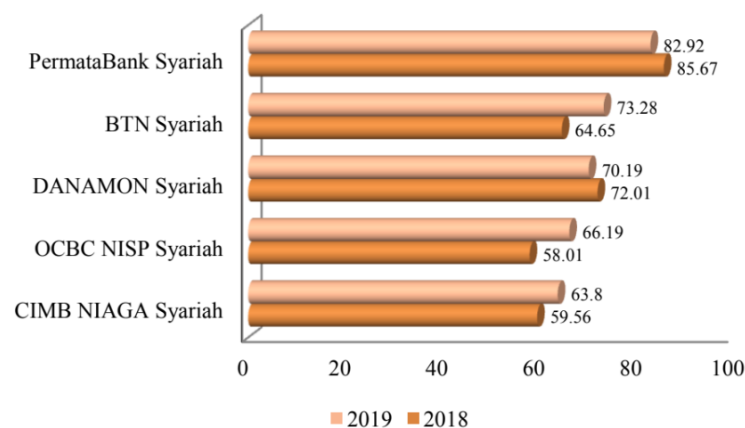
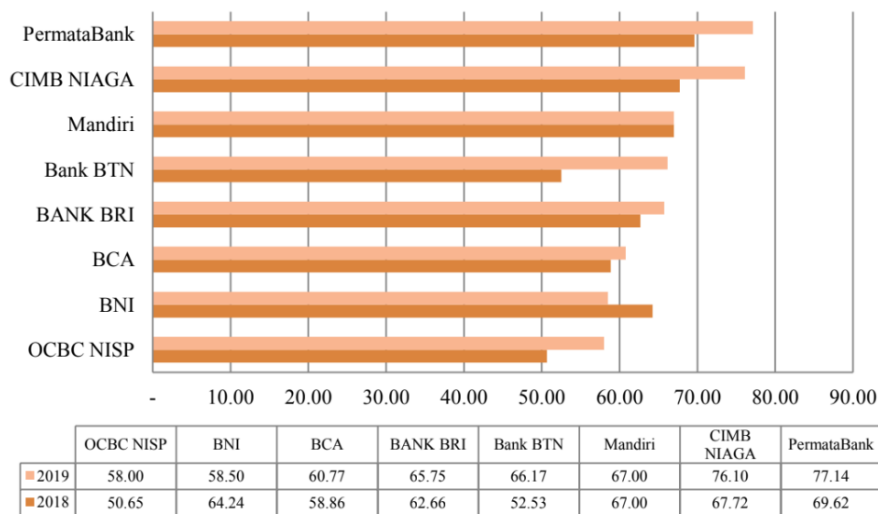


Figure 1. Infobank Magazine May 2019 Edition.

Based on Figure 1., it can be shows that PT BTN (Persero) Sharia Indonesia ranks second in terms of excellent service. In 2018, PT BTN (Persero) Sharia was in the position of 64.65%. There was an increase of 13.35%. This means that the Sharia State Savings Bank was able to provide the best service so that it was ranked second and was able to increase customer satisfaction through its prime services.

Based on Figure 2 bellow, it can be shows that PT BTN (Persero) ranks fourth in the performance of account opening through the website. In 2018, PT BTN (Persero) was in the position of 52.53%. There was an increase of 25.97%. The increase is already good and can outperform Mandiri banks, CIMB Niaga, and PermataBank, but still ranks below the three commercial banks. With the technology and infrastructure services of PT BTN (Persero) Sharia Branch Offices that have not been completed, it is necessary to improve and enhance digital-based strategic networks.

Figure 2. Opening Account Website Application Performance 8 Bank 2018-2019 (%)**Figure 2** Infobank Magazine May 2019 Edition.**Table 2. Sharia Business Unit Financial Performance 2017-2018 (in Trillions of Rupiah)**

Information	CIMB NIAGA SHARIAH	(%)	MAYBANK Sharia	(%)	BTN Sharia	(%)
Total Assets	34.38	45.40	30.17	11.24	28,39	1.38
Third-party funds	23.71	19.08	23.28	39.74	22.34	9.13
Financing	26.51	58.80	23.70	14.56	22.04	2.54
Operating Income	921,37	33.73	1.52	22.08	1.07	2.96
Net profit	701.67	43.29	803.34	27.33	215.77	55.25

Source: Infobank Research Bureau (birl), Sharia Special Edition 2019.

Based on Table 2, it can be shows that BTN Sharia DPK is lower than CIMB Niaga Sharia and Maybank Sharia. Not only DPK but also assets, Financing, Operational Opinions and low net profit. It is expected that with an increase in website services can increase DPK.

Based on some of the phenomena above, it indicates that there are still a number of problems that must be anticipated by PT Bank Tabungan Negara Sharia to increase customer satisfaction in industry competition 4.0. According to (Tjiptono & Chandra, 2016) e-satisfaction (satisfaction with the electronic environment) has been developed to identify factors that encourage customers in this case customers to visit a website and trigger them to re-use the site in question. This is a note to remember that so many new sites popping up every time. One of the measurement instruments for e-satisfaction is WebQual 4.0, consisting

of Usability; Quality Information; and Service Interaction Quality (Barnes & Vidgen, 2001). Making computer-based products and services more useful is smart business (Bias, 2005).

The results of research conducted by (Wardhana, 2015), (Syaifullah & Soemantri, 2016), (Kharisma & Anggraeni, 2018), and (Yodi, 2018) stated that the usability variable had a positive and significant effect on satisfaction. But unlike (Saudi & Charolina, 2014), (Lisa, 2016), (Fitriyana et al., 2013), and (Fauziyah & Wulandari, 2018) who stated that usability had a negative and not significant effect on satisfaction.

The quality of the information system will depend not only on the superiority of the hardware and the smoothness of the software used, but also on the accuracy and relevance of the data collected, plus it depends on the degree to which the organization successfully coordinates and motivating employees to achieve company goals (Alexandropoulou, 2003).

The results of research conducted by (Wardhana, 2015), (Syaifullah & Soemantri, 2016), (Kharisma & Anggraeni, 2018), and (Yodi, 2018) stated that the information quality variable had a positive and significant effect on satisfaction. However, different from (Lisa, 2016) and (Haryanti & Setyorini, 2019), (D. P. Sari & Pangaribuan, 2019), (Fauziyah & Wulandari, 2018) which stated that information quality had a negative and not significant effect on satisfaction.

According to (Tjiptono & Chandra, 2016) Moments of interaction between customers and companies play a crucial role in all industries, including those that have traditionally been. The results of research conducted by (Wardhana, 2015), (Syaifullah & Soemantri, 2016), (Kharisma & Anggraeni, 2018), and (Yodi, 2018) stated that the interaction quality variable had a positive and significant effect on satisfaction. However, it is different from (D. P. Sari & Pangaribuan, 2019) which states that service interaction quality has a negative and not significant effect on satisfaction.

Based on the problem of business phenomena regarding Customer Satisfaction, Website Service Quality and research gap on the website service quality that has been described, the problem formulation in this research is how to increase customer satisfaction in the industry dimension 4.0 with the Usability, Information Quality, and Service Interaction Quality approach which changes quite comprehensive both on conventional banks and Islamic banks. Based on that, this research is focused with the title "AN INFLUENCE ANALYSIS OF WEBSITE QUALITY (USABILITY, INFORMATION QUALITY, SERVICE INTERACTION QUALITY) BASED ON WEBQUAL VERSION 4.0 TOWARD CUSTOMER SATISFACTION OF PT BTN (PERSERO) SHARIA SEMARANG BRANCH OFFICE".

METHOD

This method is written in descriptive and should provide a statement regarding the methodology of the research, include the type of research, research approach, a source of data and analysis method. The author should explain the mechanism to analyze the sharia issues. This method as much as possible to give an idea to the reader through the method used, this method is optional, only for an original research article.

Study based on the shape or characteristics of the data is quantitative data with interval or ratio scale of usability, information quality, and service interaction quality. Data based on the source of collection is primary data. Primary data used in this study are data obtained from questionnaires distributed to customers of PT Bank Tabungan Negara Syariah Syariah Semarang Branch Office. Then based on the time of collection, this study uses cross-sectional data. Data collection methods used in this study were questionnaire, interview, and literature study methods. Questionnaire is a data collection technique that is done by giving a set of questions to respondents to be answered (Tri, 2016). Questionnaires, both collected directly from respondents and through electronic media such as email or delivery services such as post, can use questionnaires that have been used by researchers before, in other words, researchers do not have to compile their own questionnaires (Chandrarin, 2017). The answers to each instrument item using the Likert Scale can be described as follows:

Table 3. Likert Scale Table

	Code	Scale
Strongly agree	SS	5
Agree	S.	4
Neutral	N	3
Disagree	TS	2
Strongy Disagree	STS	1

Source: Manage by author

Population is a collection of elements that have certain characteristics that can be used to make conclusions. These elements can be people, managers, auditors, companies, events, or anything that is interesting to observe / research (Chandrarin, 2017). The population in this study were all customers of PT Bank Tabungan Negara Syariah Syariah Semarang Branch who used the website. Samples are a collection of subjects that represent the population. The sample taken must have the same characteristics as the population and must represent the population members.

In this study, the determination of the number of samples is based on the criteria stated by (Mandeville & Roscoe, 1971) that when using regression analysis techniques, the number of samples taken is determined at 25 times the number of independent variables used. Information: $n = \text{Number of independent variables}$

This study uses 3 independent variables so that based on the statement of Ferdinand (2006), a sample of 75 savings customers of PT Bank Tabungan Negara Syariah Syariah Semarang Branch was taken. The sampling technique used in this study is non-probability sampling. Non-probability sampling is a sampling technique that does not have a complete list of the study population, so there is no equal opportunity for the population members and the results of the analysis only apply to the population members studied (Sulistiyorini, 2017) While the type of probability sampling used in this study is purposive sampling, because by determining the sample criteria to be taken through the ability and good

knowledge of researchers of the population, the criteria set will be in accordance with the objectives to be achieved by researchers (Sulistiyorini, 2017).

The type or sampling method used is a combination of accidental sampling (Haphazard Sampling) and purposive sampling (Judgment Sampling). Accidental Sampling is a sampling technique by selecting people who happen to be met. Purposive sampling is a sampling technique based on specific objectives. This sample is determined based on the number of savings customers of PT Bank Tabungan Negara Syariah Syariah Semarang Branch who can represent filling out the questionnaire. The set customer criteria are as follows:

1. Has been a customer of PT Bank Tabungan Negara Syariah Syariah Semarang Branch for at least 1 year.
2. Is an active customer making transactions.
3. A funding customer in the form of savings.
4. Customers who use website services.

This research uses multiple regression analysis to solve research problems. Multiple regression analysis is used to analyze the effect of independent variables (usability, information quality, service interaction quality) on the dependent variable (customer satisfaction).

$$Y=a+b_1X_1+b_2X_2+b_3X_3+b_4X_4+e$$

Information:

Y= Dependent variable Customer Satisfaction (CS)

X1 = Independent variable, Usability (US)

X2 = Independent variable, Information Quality (IQ)

X3 = Independent variable, Service Interaction Quality (SIQ)

a = Constans

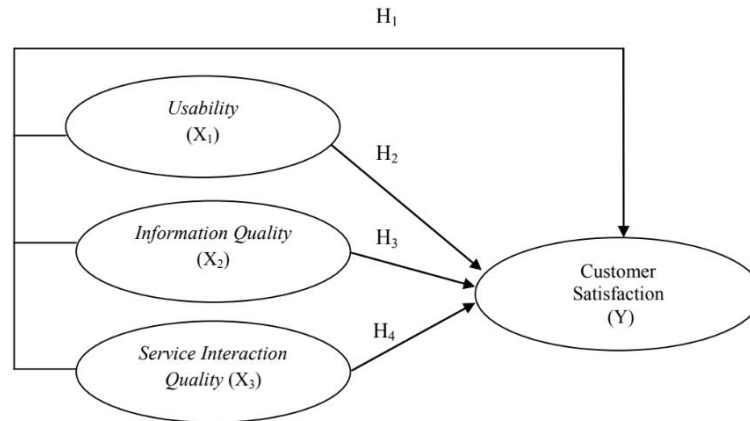
b1 = Regression coefficient of the Usability (US)

b2 = Regression coefficient of the Information Quality (IQ)

b3 = Regression coefficient of the Service Interaction Quality (SIQ)

e = error

Based on previous research and literature review that has been carried out is to find out usability, information quality, and interaction quality which are the determining variables of customer satisfaction. Then these three dimensions, want to know the effect on customer satisfaction in Islamic banks. The research model in this study can be seen in Figure 3. Below :

Figure 3. Research Model**Figure 3. Manage by Author's****Table 4. Questions For Questionnaire Distribution**

Variable	Question
Usability	
US1	Bank BTN provides a website that is easy to operate for customers of Bank BTN Syariah Branch Office Semarang.
US2	The BTN Bank website is clear and easy to understand for customers of the BTN Bank Syariah Semarang Branch Office.
US3	The BTN Bank website provides easy navigation (instructions on each page in the menu/link).
US4	The BTN Bank website has menus/links in each of its work units.
US5	The appearance of the BTN Bank website is attractive in terms of color, images, and writing.
US6	The BTN Bank website provides a positive experience in the form of increasing knowledge about bank products and services to customers of the BTN Bank Syariah Semarang Branch Office.
Information Quality	
IQ1	The BTN Bank website provides clear (easy to understand) and accurate (precise and correct) information to customers of the BTN Bank Syariah Semarang Branch Office.
IQ2	The BTN Bank website provides reliable information for customers of the BTN Bank Syariah Semarang Branch Office.
IQ3	The BTN Bank website provides up-to-date information to customers of the BTN Bank Syariah Semarang Branch Office..
IQ4	The BTN Bank website provides useful information directly to the needs of BTN Bank Syariah Semarang Branch Office customers.
IQ5	The BTN Bank website has a proportional level of information detail.
IQ6	The BTN Bank website provides information presented in a proportional format (according to the product you use).
Service Interaction Quality	
SIQ1	Bank BTN's website has a good reputation (does not contain negative things).
SIQ2	The BTN Bank website is able to create a community (family) feel for customers of the BTN Bank Syariah Semarang Branch Office.

SIQ3	The BTN Bank website makes it easier to communicate to community groups (families, jobs, and professions) so that it can attract the interest and attention of customers of the BTN Bank Syariah Branch Office in Semarang.
Customer Satisfaction	
CS1	Customers are satisfied with the use of the BTN Bank website system because it provides benefits to customers of the BTN Bank Syariah Semarang Branch Office.
CS2	Customers are satisfied with the Bank BTN website service because it provides the information needed by Bank BTN Syariah Semarang Branch Office customers..
CS3	Customers are satisfied with the products on the Bank BTN website because they can be accessed and navigated (explored according to the instructions) easily without any problems.

RESULTS AND DISCUSSION

Characteristics

Sampling in this study uses types or sampling methods are a combination of accidental sampling (Haphazard Sampling) and purposive sampling (Judgment Sampling). Accidental Sampling is a sampling technique by selecting people who happen to be met. Purposive sampling is a sampling technique based on specific objectives (Sulistiyorini, 2017). This sample is determined based on the number of savings customers of PT Bank Tabungan Negara Syariah Syariah Semarang Branch who can represent filling out the questionnaire.

Table 5. Characteristics of Respondents

Characteristics of Respondents by	Criteria	Number of Respondents	Percentage	
Gender	Men	32	43%	
	Woman	43	57%	
	Total	75	100%	
Characteristics of Respondents by Age	17-26 years old	29	39%	
	27-36 years old	23	31%	
	37-46 years old	14	19%	
	47-56 years old	8	11%	
	> 56 years old	1	1%	
	Total	75	100%	
Characteristics of Respondents by Education	Junior High School	1	1%	
	Senior High school	29	39%	
	Diploma	17	23%	
	Bachelor	26	35%	
	Magister / Doctor	2	3%	
	Total	75	100%	
	Labor	1	1%	
	Cleaning	1	1%	
	Lecturer	1	1%	
	Housewife	1	1%	
	Notary Public	1	1%	
	Student	11	15%	
	Civil Servants / Employees	49	65%	
	Security	3	4%	
	Admin staff	1	1%	
	Staff Notary	1	1%	
	Entrepreneur	5	7%	
	Total	75	100%	
	Length of Being a Savings Customer	1-2 years	26	35%
		2-3 years	12	16%
3-4 years		7	9%	
4-5 years		7	9%	
> 5 years		23	31%	
Total		75	100%	

Source : Manage by Authors

Validity test

Test Validity (Feasibility) is a test to determine whether or not feasible, indicators as benchmarks of research variables developed by researchers, through the distribution of questionnaires in the field. In other words the validity test is a feasibility test for a research instrument (questionnaire) to measure the research variables developed by researchers (Sulistiyorini, 2017). Significance test is done by comparing the value of r arithmetic with r table for degree of freedom ($df = n-2$), in this case n is the number of samples, if r arithmetic $>$ r table and a positive value then the item or question or indicator is declared valid. In this study, the number of samples $n = 75$, $df = 73$, and $\alpha = 0.05$. It can be

concluded that each question indicator is valid. The results of the validity test can be seen in the table.

Table 6. Usability Validity Test Results Based on the r table Approach

Indicator	R count	R table	Information
X1	0.862	0.2272	Valid
X2	0.863	0.2272	Valid
X3	0.859	0.2272	Valid
X4	0.735	0.2272	Valid
X5	0.780	0.2272	Valid
X6	0.767	0.2272	Valid

Source: Primary data processed with SPSS 25, 2020.

Based on Table 6 it can be seen that understandable (X2) has the highest value that is equal to 0.863, while for the lowest value there is a use (X4) that is equal to 0.735. It can be concluded from Table 4.3, that all questions for the usability variable show valid values, because it is seen from the count that exceeds rtable.

Table 7. Information Quality Validity Test Results Based on the rtable Approach

Indicator	R count	R table	Information
X7	0.818	0.2272	Valid
X8	0.824	0.2272	Valid
X9	0.812	0.2272	Valid
X10	0.839	0.2272	Valid
X11	0.762	0.2272	Valid
X12	0.818	0.2272	Valid

Source: Primary data processed with SPSS 25, 2020.

Based on Table 7. it can be seen that Relevant (X10) has the highest value that is equal to 0.839, while for the lowest value found in Detail (X11) which is equal to 0.762. It can be concluded from Table 5, that all questions for the information quality variable show valid values, because they can be seen from r count that exceeds rtable.

Table 8. Service Interaction Quality Test Validity Results Based on the rtable Approach

Indicator	R count	R table	Information
X13	0.848	0.2272	Valid
X14	0.844	0.2272	Valid
X15	0.858	0.2272	Valid

Source: Primary data processed with SPSS 25, 2020.

Based on Table 8. it can be seen that Attract Interest (X15) has the highest value that is equal to 0.858, while for the lowest value is found in Community (X14) which is equal to 0.844. It can be concluded from Table 8, that all questions for service interaction quality variables show valid values, because it is seen from the count that exceeds r table.

Table 9. Test Results of Customer Satisfaction Validity Based on the rtable Approach

Indicator	rcount	rtable	Information
Y1	0.819	0.2272	Valid
Y2	0.897	0.2272	Valid
Y3	0.906	0.2272	Valid

Source: Primary data processed with SPSS 25, 2020.

Based on Table 9. it can be seen that the level of satisfaction (Y3) has the highest value that is equal to 0.906, while for the lowest value there is the benefit of use (Y1) that is equal to 0.819. It can be concluded from Table 4.6, that all questions for customer satisfaction variables show valid values, because it can be seen from the count that exceeds rtable.

Reliability Test

Reliability is actually a tool to measure a questionnaire which is an indicator of a variable or construct. A questionnaire is said to be reliable if someone's answer to the statement is consistent or stable from time to time. SPSS provides facilities to measure reliability with the Cronbach Alpha (α) statistical test. A construct or variable is said to be reliable if it gives a Cronbach alpha value > 0.70 (Nunnally & Bernstein, 1944) in (Ghozali, 2018).

Table 10. Usability Test Results

Reliability Statistics			
Cronbach's Alpha	Cronbach's Alpha Based on Standardized Items	N of Items	
,895	,896	6	

Item-Total Statistics			
Indikator	Cronbach's Alpa If Item Deleted	Minimum Standards	Information
X1.1	0.865	0.70	Reliable
X1.2	0.866	0.70	Reliable
X1.3	0.865	0.70	Reliable
X1.4	0.892	0.70	Reliable
X1.5	0.885	0.70	Reliable
X1.6	0.883	0.70	Reliable

Source: Primary data processed with SPSS 25, 2020.

Based on Table 10. it can be seen the results of the calculation of the reliability test usability variable. To find out the benchmarks of the usability variable can be seen in the reliability statistics table which shows the Cronbach's Alpha value of 0.895. Each value on each indicator can be seen from the Cronbach's Alpha if Item Deleted column, which shows that all Alpha values obtained are reliable, because these values exceed the Crobach's Alpha standard (0.70). From Table 8. it can be concluded that the highest reliable value is use (X1.4) which is equal to 0.892, while for the lowest reliable value is Easy (X1.1) and Navigate (X1.3) that is equal to 0.865.

Table 11. Reliability Test Results Table Quality Information

Reliability Statistics			
Cronbach's Alpha	Cronbach's Alpha Based on Standardized Items	N of Items	
,896	,897	6	
Item-Total Statistics			
Indicator	Cronbach's Alpha If Item Deleted	Minimum Standards	Information
X2.1	0.875	0.70	Reliable
X2.2	0.876	0.70	Reliable
X2.3	0.878	0.70	Reliable
X2.4	0.872	0.70	Reliable
X2.5	0.888	0.70	Reliable
X2.6	0.875	0.70	Reliable

Source: Primary data processed with SPSS 25, 2020.

Based on Table 11. it can be seen the results of the calculation of the reliability test of information quality variables. To find out the benchmark of information quality variables can be seen in the reliability statistics table which shows the Cronbach's Alpha value of 0.896. Each value on each indicator can be seen from the Cronbach's Alpha if Item Deleted column, which shows that all Alpha values obtained are reliable, because these values exceed the Cronbach's Alpha standard (0.70). From Table 9. it can be concluded that the highest reliable value is detail (X2.5) which is equal to 0.888, while for the lowest reliable value is Relevant (X2.4) and that is equal to 0.872.

Table 12. Reliability Test Results Service Interaction Quality

Reliability Statistics			
Cronbach's Alpha	Cronbach's Alpha Based on Standardized Items	N of Items	
,808	,808	3	
Indicator	Cronbach's Alpha If Item Deleted	Minimum Standards	Information
X3.1	0.731	0.70	Reliable
X3.2	0.750	0.70	Reliable
X3.3	0.729	0.70	Reliable

Source: Primary data processed with SPSS 25, 2020.

Based on Table 12. it can be seen the results of the calculation of the reliability variable service interaction quality test. To find out the service interaction quality benchmark, it can be seen in the reliability statistics table that shows the Cronbach's Alpha value of 0.808. Each value on each indicator can be seen from the Cronbach's Alpha if Item Deleted column, which shows that all Alpha values obtained are reliable, because these values exceed the Cronbach's Alpha standard (0.70). From Table 10. it can be concluded that the highest reliable value is community (X3.2) which is equal to 0.750, while for the lowest reliable value is attract interaction (X3.3) that is equal to 0.729.

Table 13. Customer Satisfaction Test Results

Reliability Statistics			
Cronbach's Alpha	Cronbach's Alpha Based on Standardized Items	N of Items	
,846	,845	3	
Indicator	Cronbach's Alpha If Item Deleted	Minimum Standards	Information
Y1.1	0.871	0.70	Reliable
Y1.2	0.736	0.70	Reliable
Y1.3	0.733	0.70	Reliable

Source: Primary data processed with SPSS 25, 2020.

Based on Table 13. can be seen the results of the calculation of the reliability test variable Customer Satisfaction. To find out the benchmark of Customer Satisfaction variable, it can be seen in the reliability statistics table that shows the Cronbach's Alpha value of 0.846. Each value on each indicator can be seen from the Cronbach's Alpha if Item Deleted column, which shows that all Alpha values obtained are reliable, because these values exceed the Cronbach's Alpha standard (0.70). From Table 11. it can be concluded that the highest reliable value is the usefulness benefit (Y1.1) that is equal to 0.871, while for the lowest reliable value is the satisfaction level (Y1.3) that is equal to 0.733.

Normality test

Normality is the difference between the predicted value and the actual score or the error will be distributed symmetrically around the means equal to zero. If normality occurs, residuals will be normally distributed and independently. The normality of a variable is generally detected by graphs or statistical tests. Graph analysis includes histograms and normal P-Plots, while statistical analysis uses the Kolmogorov-Smirnov Non-Parametric Test (KS) (Ghozali, 2018).

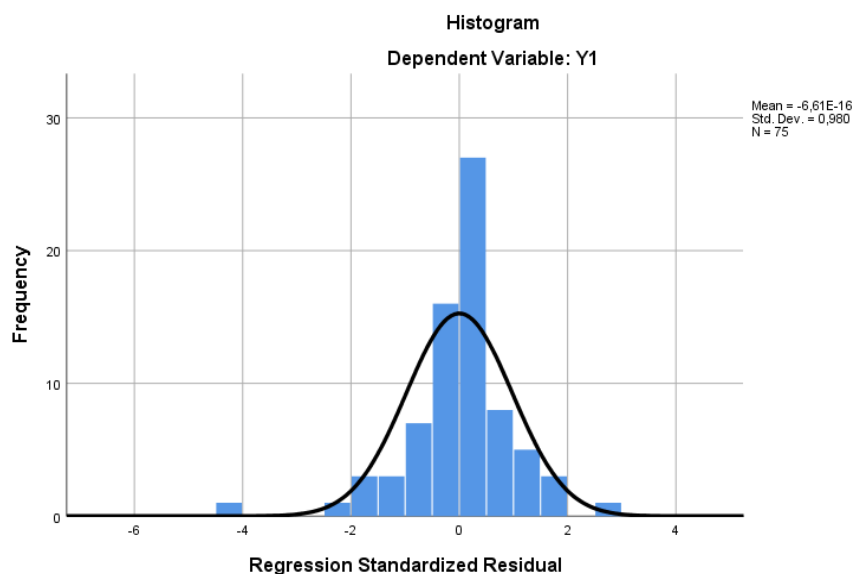
Figure 3. Histogram Graph

Figure 3 : Primary data processed with SPSS 25, 2020

Figure 4. Normal Probability-Plot Chart

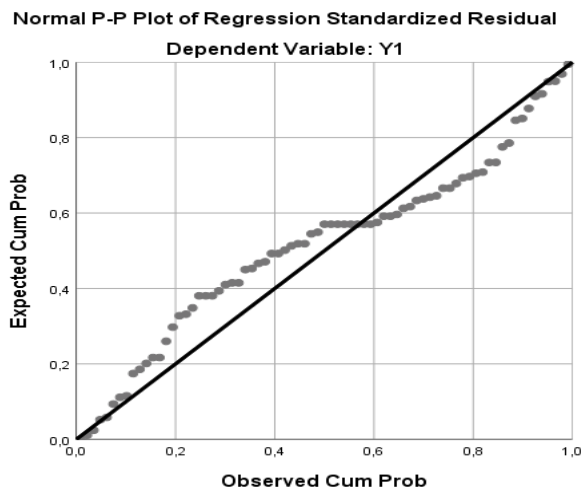


Figure 4. Primary data processed with SPSS 25, 2020.

In the Figure shows that the histogram shows the normal distribution, and in the picture shows that the data is spread around the diagonal line, the regression line model meets the normality assumption.

Table 14. Kolmogorov Smirnov (KS) Test Results

One-Sample Kolmogorov-Smirnov Test			
			Unstandardized Residual
N			75
Normal Parameters ^a , b	The mean		0000000
	Std. Deviation		1.26301678
Most Extreme Differences	Absolute		,138
	Positive		,115
	Negative		-138
Statistical Test			,138
Asymp. Sig. (2-tailed)			,001c
Monte Carlo Sig. (2m Sig. tailed)			,106d
99% Confidence Interval		Lower Bound	,098
		Upper Bound	,114

a. Test distribution is Normal.

b. Calculated from data.

c. Lilliefors Significance Correction.

d. Based on 10000 sampled tables with starting seed 299883525.

Source: Primary data processed with SPSS 25, 2020.

On the results of the Kolmogorov-Smirnov (KS) non-parametric statistical test in Table 12. known significance value of 0.001 and not significant at 0.05 (because monte carlo p =

0.106 > from 0.05). So H_0 which says that residuals are normally distributed or in other words residuals that are normally distributed cannot be rejected. This shows that the data in this study are normally distributed.

Classic assumption test

Testing this classic assumption is to provide certainty that the multiple linear regression model estimated to have accuracy in estimation, unbiased and consistent. Estimated multiple linear regression models obtained using the OLS (Ordinary Least Square) method are required to meet the BLUE (Best Linear Unbias Estimator) requirements, which are regression models that produce the best unbiased linear estimator. These BLUE requirements include, among other independent variables, no relationship or influence with each other (multicollinearity test), the regression model has the same variance (the sum of the squares of the difference in observational data values from the mean values, then divided by the number of observations).

Autocorrelation Test

Table 15. Durbin Watson Test Results (DW test)

Model Summary ^b					
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	,784a	,614	,598	1,289	1,925

a. Predictors: (Constant), X3, X2, X1
b. Dependent Variable: Y1

Source: Primary data processed with SPSS 25, 2020.

Based on the summary model in Table 15, shows a DW value of 1.925. This value will be compared with the table value, where the number of samples (n) = 75 and the number of dependent variables (k) = 3, then the Durbin Watson table will be obtained $du = 1.7092$. Therefore the value of Watson durbin (DW) is more than the upper limit (du) of 1.7092 and less than $4-1.7092$ ($4-du$) or in other words $1.7092 < 1.925 < 2.2908$ it can be concluded that there are no positive and negative correlations or no autocorrelation in this regression model.

Multicollinearity Test

Table 16. Multicollonearity Test Results

Coefficients ^a							
Model	Unstandardized Coefficients		Standardized Coefficients Beta	t	Sig.	Collinearity Statistics	
	B	Std. Error				Tolerance	VIF
(Constant)	1,035	1,083		956	342		
X1	,070	,100	,125	698	488	,170	5,868
X2	,254	,098	,450	578	012	,179	5,601
X3	,268	,113	,267	370	021	,428	2,337

a. Dependent Variable: Y1

Source: Primary data processed with SPSS 25, 2020.

Based on Table 16, it can be seen that the variables consisting of usability, information quality, and service interaction quality indicate the absence of tolerance and VIF values on each independent variable, so there is no multicollinearity. In the calculation of the Tolerance value, there is no independent variable that has a Tolerance value ≤ 0.10 . Likewise with the results of the calculation of VIF values, there are no independent variables that have a VIF value ≥ 10 . So it can be concluded that there is no multicollinearity.

Heteroscedasticity Test

Heteroscedasticity Test Results can be seen in Figure 5.

Figure 5. Scatterplot graph

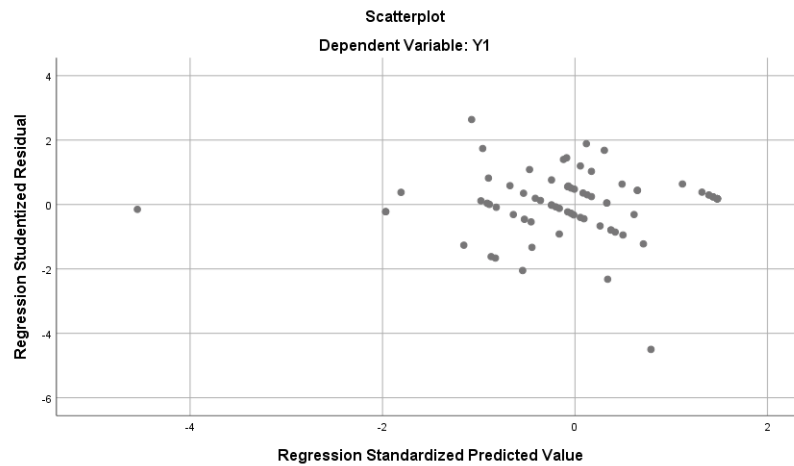


Figure 5. Primary data processed with SPSS 25, 2020.

Table 17. Park Test Results

Coefficients ^a					
Model	Unstandardized Coefficients		Standardized Coefficients		ig.
	B	Std. Error	Beta		
(Constant)	-2.401	9.878			.243 809
LN _{X1}	3.531	7.478	.140		.472 638
LN _{X2}	-1.127	7.159	-.047		.157 875
LN _{X3}	-1.471	4.275	-.070		.344 732

a. Dependent Variable: LNRES_1

Source: Primary data processed with SPSS 25, 2020.

Table 18. Glejser Test Results

Coefficients^a

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
(Constant)	1,132	,799		,416	161
X1	,025	,074	,096	,336	738
X2	-,015	,073	-,058	-,207	836
X3	-,042	,084	-,091	-,502	617

a. Dependent Variable: ABS_RES1

Source: Primary data processed with SPSS 25, 2020.

Based on Table 18, it can be seen that all significant values (sig.) Of the independent variable are greater than 0.05. This shows that in this study there were no symptoms of heteroscedasticity.

Multiple Linear Regression Analysis

Table 19. Results of Analysis of Multiple Linear Results

Model	Unstandardized Coefficients	
	B	Std. Error
(Constant)	1,035	1,083
US	,070	,100
IQ	,254	,098
SIQ	,268	,113

Dependent Variable: CS

Source: Primary data processed with SPSS 25, 2020.

Based on Table 19, Can be arranged multiple linear regression equations as follows:

$$CS = 1,035 + 0,070 US + 0,254IQ + 0,268SIQ + e$$

Based on the multiple linear regression equation above the interpretation of each variable is as follows; constant of 1.035 This shows that if the variable usability, information quality, and service interaction quality are constant, the value of customer satisfaction is positive at 1.035; Usability Coefficient = 0.070. This shows that the usability variable has a positive effect on customer satisfaction at BTN Syariah Syariah branch office in Semarang. Every time there is an increase in the usability variable by 1 (one) unit, the customer satisfaction of PT BTN Syariah Syariah branch office will increase by 0.070, assuming the other variables remain; Information Quality Coefficient = 0.25. This shows that the information quality variable has a positive effect on customer satisfaction at PT BTN Syariah Syariah branch office in Semarang. Every time there is an increase in the information quality variable of 1 (one) unit, the customer satisfaction of PT BTN Syariah Syariah branch office will increase by 0.254, assuming the other variables remain; Service Interaction Quality Coefficient = 0.268.

This shows that the variable service interaction quality has a positive effect on customer satisfaction at PT BTN Syariah Syariah branch office in Semarang. Every time there is an increase in the service Interaction quality variable by 1 (one) unit, the customer

satisfaction of PT BTN Syariah Syariah Semarang branch office will increase by 0.268, assuming the other variables are fixed.

Proof of Hypothesis

Simultaneous Significance Test (F Test)

Table 20. Statistical Test Results F

ANOVAa					
Model	Sum of Squares	f	Mean Square	F	ig.
Regression	188,141		62,714	37,720	000b
Residual	118,046	1	1,663		
Total	306,187	74			

a. Dependent Variable: CS

b. Predictors: (Constant), SIQ, IQ, US

Source: Primary data processed with SPSS 25, 2020.

Proof of hypothesis 1 (one) is done by the statistical test F. Based on Table 20., Resulting Fcount = 37.720 > Ftable = 2.73 or significance = 0.000 < 0.05, meaning there is a significant influence between the variable information quality, and service interaction quality simultaneously to customer satisfaction. Thus hypothesis 1 (one) which states "Allegedly the variables of usability, information quality, and service interaction quality simultaneously have a significant effect on customer satisfaction of PT BTN Syariah Branch Office Semarang" declared accepted.

Determination Coefficient Test (R2)

Table 21. Determination Coefficient Test Results (R2)

Model Summaryb				
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	,784a	,614	,598	1,289

a. Predictors: (Constant), SIQ, IQ, US

b. Dependent Variable: CS

Source: Primary data processed with SPSS 25, 2020.

Based on the test results of the coefficient of determination in Table 21., The resulting Adjusted R Square value of 0.598 or 59.8%. This means that the variable usability, information quality, and service interaction quality contribute to customer satisfaction by 59.8% while the remaining 40.2% is influenced by other variables not examined in this study or not included in the model.

Partial Significance Test (t Test)

Table 22. Statistical Test Results t

Coefficientsa				
Model	Unstandardized Coefficients		Standardized Coefficients	ig.
	B	Std. Error	Beta	
(Constant)	1,035	1,083		956 342

US	,070	,100	,125	698	488
IQ	,254	,098	,450	,578	012
SIQ	,268	,113	,267	2,370	,021

a. Dependent Variable: CS

Source: Primary data processed with SPSS 25, 2020.

Proof of hypothesis 2 (two) is done by t test statistics. Based on Table 22., Generated tcount for the variable usability = 0.698 <ttable = 1.99394 or significance = 0.488> 0.05, which means there is no significant effect between usability partially on customer satisfaction. Thus the second hypothesis stating "Allegedly the usability variable partially has a significant effect on customer satisfaction of PT BTN Syariah Syariah Branch Office in Semarang" was declared rejected.

Proof of hypothesis 3 (three) is done by statistical test t. Based on Table 22., Generated tcount for the information quality variable = 2.578> ttable = 1.99394 or significance = 0.02 <0.05 which means there is a significant influence between information quality partially on customer satisfaction. Thus hypothesis 3 which states "It is suspected that the information quality variable partially has a significant effect on customer satisfaction of PT BTN Syariah Syariah Branch Office in Semarang" is accepted.

Proving the place hypothesis is done by t test statistics. Based on Table 20., Generated tcount for variable service interaction quality = 2.370> ttable = 1.99394 which means there is a significant influence between service interaction quality partially on customer satisfaction. Thus hypothesis 4 (four) which states "Allegedly the service interaction quality variable partially has a significant effect on customer satisfaction Semarang Syariah Branch Office" is declared accepted.

CONCLUSION

Based on the analysis and discussion, the following conclusions are obtained: 1) Usability (US), Information Quality (IQ), and Service Interaction Quality (SIQ) simultaneously have a significant influence toward the Customer Satisfaction (CS) of PT BTN (Persero) Sharia Semarang Branch Office. 2) Usability (US) partially has a positive and insignificant influence toward the Customer Satisfaction (CS) of PT BTN (Persero) Sharia Semarang Branch Office. 3) Information Quality (IQ) partially has a positive and significant influence toward the Customer Satisfaction (CS) of PT BTN (Persero) Sharia Semarang Branch Office. 4) Service Interaction Quality (SIQ) partially has a positive and significant influence toward Customer Satisfaction (CS) of PT BTN (Persero) Sharia Semarang Branch Office.

For further research, the distribution of questionnaires was further multiplied to support accurate results. It is expected to develop indicators or variables of WebQual 4.0 solutions so that they are not only limited to 3 (three) variables., theoretical and literary references about e-commerce, websites and digital marketing can be expanded in the industrial era 4.0 so that research is getting better. For PT BTN (Persero) Sharia Semarang Branch Office, related to Customer Satisfaction it is hoped that it can optimize the quality of Information Quality (clear, reliable, up to date, useful,, detailed, proportional format) and

Service Interaction Quality (good reputation avoid negative things, family nuances, attract customer interest and attention).

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