

The Influence of Knowledge, Benefit and Risk on Customer Interest in Using The BSI Qris Electronic Payment System at BSI KCP Indrapura

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Abstract

Introduction to The Problem: The use of QR-Code is currently quite widely used for payments and is starting to gain considerable traction in Indonesia. Talking about QR Payment payments, Bank Indonesia also innovated a QR-Code-based payment system called QRIS.

Purpose/Objective Study: The research aims to analyze the significant influence of knowledge, benefit and risk on customer interest in using the BSI QRIS electronic payment system at BSI KCP Indrapura.

Design/Methodology/Approach: Research methods with quantitative methods described in multiple linear regression analysis models. Primary data by distributing questionnaires to respondents as a sample from August 2022 to December 2022. Sampling design with simple random sampling technique. Using the Slovin formula, the number of respondents who became a sample was 90 people for further analysis.

Findings: The results of the research are as follows: (1) The estimation model shows an R^2 value of 0.770 which represents the value of the coefficient of determination. This means that 77% of the dependent variable variation is able to be explained by the independent variable in this model. The remaining 23% is explained by other causes that are not included in the model; 2) The regression model on the independent variable simultaneously influences the dependent variable, so that the independent variable regression model can be used to predict the dependent variable; and (3) This research resulted in the output that there is a significant influence between the benefit on customer interest in using the BSI QRIS electronic payment system at BSI KCP Indrapura. However, it is not knowledge and risk that does not show a significant influence, so it can be concluded that the two have no relationship at all to customer interest in using the BSI QRIS electronic payment system at BSI KCP Indrapura.

Paper Type: Research Article.

Keywords: Knowledge; Benefit; Risk; BSI QRIS; QR-Code.

INTRODUCTION

Through the use of one QR-Code standard, providers of goods and services (merchants) do not need to have various types of QR-Codes from different issuers (Setiawan & Mahyuni, 2020). Because currently, with QRIS, all payment applications from any organizer, both banks and non-banks, that are used by the public can be used in all stores, merchants, stalls, parking, tourist tickets and donations with the QRIS logo. Although QRIS providers at

merchants are different from application providers used by the public. Merchants only need to open an account or account with one of the QRIS organizers who have been licensed by Bank Indonesia. Furthermore, merchants can already accept payments from the public using QR from any application that organizes it (Bank Indonesia, 2019).

The use of QR-Code is currently quite widely used for payments and is starting to gain considerable traction in Indonesia. Talking about QR Payment payments, Bank Indonesia also innovated a QR-Code-based payment system called QRIS (Quick Response Code for Indonesia Standard). Basically, QRIS has been ratified in Indonesia from 2019, right on August 17, 2019. In accordance with the Vision of the Indonesian Payment System (SPI), the purpose of establishing QRIS is in accordance with the realization of Bank Indonesia's second initiative, namely infrastructure development in retail payments which is carried out in real time, seamless and available 24/7 (every day at all times). In the development of this second initiative, key deliverables developed in addition to QRIS and ahead of QRIS, among others, in the form of BI-Fast, integrated Payment Interfaces and also National Payment Gateways (or hereinafter referred to as GPN). The determination of QRIS is also in line with the NPG order which leads to the implementation of an efficient, safe, smooth, reliable payment system, prioritizing the expansion of access and consumer protection and being able to process all transactions related to digital payments (Tobing et al., 2021) in the form of digital technology.

Digital technology has disrupted conventional functions, affected the joints of the economy and demanded change and adaptation without exception to the payment system sector. The pattern of people's shopping trends through e-commerce and/or marketplace platforms from year to year grows in an exponential trend which can also create a network effect for UMKM, platform providers and payment service providers. The presence of this digital platform is a new shopping place that is able to provide various needs of the community more efficiently, easily, practically and mobile to be reached with smart phone devices (Atmaja & Paulus, 2022). The use of digital technology is very important (Marlina & Bimo, 2018).

In its current development, the payment systems that have emerged are server-based and chip-based. Recently, the use of server-based payment system services is being widely used by the people of Indonesia. The server-based form used lately is QR-Code or also called Quick Response Code. Quick Response Code is a matrix code in the form of a 2 (two) dimensional picture that has components or arrangements consisting of square pattern sides on 3 (three) sides (upper right, top left and bottom left sides) and also a black module with a square pattern, pixels and points that are able to store data in the form of characters, symbols and alphanumeric (Aini et al., 2018). Although it is really regrettable because not many people have used cashless payment transactions through QRIS which are facilitated by mobile banking services (Wardani & Masdiantini, 2022).

In practice, this is perfectly fine. Because, there could be many people who are enthusiastic about using mobile banking services. However, the problem may occur on mobile phones that are not compatible with the mobile banking application and the QRIS mobile banking service may not be available. There is also a possibility for some people who feel that they do not need mobile banking services and are indifferent to it. Usually the indifferent ones are mostly parents because they think it is not necessary to use mobile banking services. Interested customers usually want to learn more about mobile banking services. The enthusiasts are customers who have businesses, such as online stores or who are working and need a bank (Ningsih & Nasution, 2023).

In fact, since its launch on January 1, 2020 until July 3, 2020, Bank Indonesia assessed that QRIS usage reached 190,706, up 47% since March 22. Merchants are reaching 333,992, aka an increase of 26%, SMEs reaching 685,328 up to 125%, MSMEs reaching 2,603,516 up to 9% and donation merchants reaching 9,288 up to 132% (Silalahi et al., 2022).

In Indonesia itself, efforts to create a cashless society that is accustomed to the cashless payment system still encounter quite a lot of obstacles. This can be seen from the relatively low number of MSMEs as business people with large numbers who adopt QRIS as a means of payment (Mahyuni & Setiawan, 2021). In fact, cashless transactions are considered more effective as a means of payment transactions and are the main drivers of current economic growth (Kurniawati et al., 2021). The lack of knowledge of cashless payment services is also a factor that explains the low adoption of cashless payment systems (Saksonova & Kuzmina-Merlino, 2017). In addition, knowledge of various alternative digital payment methods also determines the interest in using cashless payment instruments (Ferdiana & Darma, 2019). Information about the use of QRIS has not been widely spread, so there are still quite a lot of people who are not familiar with QRIS and its use (Arianti et al., 2019). Cashless payments in addition to reducing the use of cash can also reduce security risks (Shy, 2021) and the positive perception of the benefits of using QR-Code explains the interest in using QR-Code (Lee & Shin, 2018).

Nevertheless, Bank Syariah Indonesia (BSI) has presented a mobile banking application that can facilitate transactions that have been equipped with the QRIS feature. The existence of this feature serves to make it easier for customers to make various transactions and donations without the need to come to a branch office (Saibil et al., 2022). Without direct contact with other parties (Musyaffin et al., 2021). Therefore, BSI always strengthens its digital business after the implementation of a single system, namely the migration process and network integration. So, BSI will be able to explore the potential of digital businesses more aggressively and have new products, such as QRIS, which is a payment network that uses QR-Code to help merchants accept payments from all QR-based applications that make it easier for customers to transact. With this integration, BSI will be able to make operations easy, fast by providing many features both transactions, savings and financing. Thus, customers can be served entirely in one BSI system which makes it easier for BSI customers (Rizkiawan et al., 2022).

Therefore, this research is interesting to research and quite important. The relevance of several previous studies to the author's research include: Competitive Advantage Strategy through Digitalization of Product Services at Bank Syariah Indonesia KCP Rogojampi (Samsuri, 2022); Strategy to Improve Service Quality through Banking Digitalization at BSI Trade Center Kediri City (Larassati & Fauzi, 2022); Customer Decision Analysis Using E-Banking Services at Bank Syariah Indonesia in Langsa City (Dayyan & Bestari, 2022); Analysis of the Effectiveness of Using QRIS (Quick Response-Code Indonesian Standard) to Support Paperless in PT. Bank Syariah Indonesia KCP Medan Padang Bulan (Sahriana & Rokan, 2022); Strategy Analysis BSI KCP Stabat Proklamasi in Increasing Customer Interest Using QRIS-Based Payments (Amanda & Tambunan, 2022); Behavior of Using "QRIS BRI BRIMO" in Merchants as a Means of Digital Payment Transactions (Wibowo & Rimadias, 2022); and Customer Perceptions of North Sumatra State Islamic University towards BSI Mobile Banking Feature Services (Nasution et al., 2023).

The author's research relationship with the relevance of previous research both examined the BSI QRIS electronic payment system. However, the author's research differs from the relevance of previous research in terms of data, variables, methodology and object (location of the study). Therefore, the purpose of this study is to see a significant influence

between knowledge, benefits and risks on customer interest in using the BSI QRIS electronic payment system at BSI KCP Indrapura.

METHOD

Research is the channeling of human curiosity in the scientific level. One would be convinced that there is a cause for every effect of every apparent symptom scientifically searchable. This is because the research is objective because the conclusions obtained will only be drawn based on convincing evidence and collected through clear, systematic and controlled procedures (Sunggono, 2015). The research method is the main style in obtaining goals and proving the answers to the problems posed by the researcher (Arikunto, 2019). The research method that the author uses in this case is by quantitative methods. The data is in the form of numbers analyzed on the basis of statistical procedures (Noor, 2016).

In order for the data obtained to be complete, perfect and subjective, the author's primary data is obtained directly from the client as the respondent who is the sample. The respondents were customers who used the BSI QRIS electronic payment system at BSI KCP Indrapura by distributing questionnaires. Questionnaire deployment from August 2022 to December 2022. BSI KCP Indrapura as the object of research.

After that, then this questionnaire is collected again for further research (Gulo, 2002). For secondary data, the author obtains from books, reports, journals and others obtained or collected by researchers from various existing sources (Rusiadi et al., 2014). The part taken from the population is called a sample (Sudjana, 2014).

Using the Slovin formula, the number of respondents who became a sample was 90 people.

$$n = \frac{N}{1 + N \cdot e^2} = \frac{866}{1 + (866) (0,1)^2} = \frac{866}{9,66} = 89,64 \approx 90$$

Information:

N = Population

n = Lots of Samples

e = Error Term 10% (0,1)

Furthermore, the design of sampling techniques with probability sampling due to similar expectations to be selected (Kuncoro, 2014) using simple random sampling. This technique is used because sampling of members of a population is carried out randomly without regard to the strata present in that population (Sugiyono, 2014). Table 1 shows the operational definition of variable.

Table 1. Operational Definition Of Variable

Variabel	Operational Definition Of Variable	Measuring Instrument	Scale
Knowledge (X ₁)	Knowledge is basically the result of the process of seeing, hearing, feeling and thinking on which humans are based on behaving and acting on a problem	To measure the variable X ₁ , the researcher went to 90 respondents who were sampled to be given a closed questionnaire whose answers had been provided. Thus, respondents only need to choose answers from 8 (eight) questions asked by affixing a checkmark (√). A strongly agreeable answer (SS) is worth 5; agree (S) is	Likert

Benefit (X ₂)	As the extent to which a person believes that using a technology will improve his job performance	worth 4; undecided (RR) is worth 3; disagree (TS) is worth 2; and strongly disagree (STS) is worth 1 To measure the variable X ₂ , the researcher went to 90 respondents who were sampled to be given a closed questionnaire whose answers had been provided. Thus, respondents only need to choose answers from 8 (eight) questions asked by affixing a checkmark (√). A strongly agreeable answer (SS) is worth 5; agree (S) is worth 4; undecided (RR) is worth 3; disagree (TS) is worth 2; and strongly disagree (STS) is worth 1	Likert
Risk (X ₃)	The form of a state of uncertainty about a situation that will occur later (future) with decisions taken based on various considerations at this time	To measure the variable X ₃ , the researcher went to 90 respondents who were sampled to be given a closed questionnaire whose answers had been provided. Thus, respondents only need to choose answers from 8 (eight) questions asked by affixing a checkmark (√). A strongly agreeable answer (SS) is worth 5; agree (S) is worth 4; undecided (RR) is worth 3; disagree (TS) is worth 2; and strongly disagree (STS) is worth 1	Likert
Customer Interest in Using BSI QRIS Electronic Payment System (Y)	A sense of customer preference and interest in something or activity without anyone telling them to use the Electronic Payment System (QRIS)	To measure the variable Y, the researcher went to 90 respondents who were sampled to be given a closed questionnaire whose answers had been provided. Thus, respondents only need to choose answers from 8 (eight) questions asked by affixing a checkmark (√). A strongly agreeable answer (SS) is worth 5; agree (S) is worth 4; undecided (RR) is worth 3; disagree (TS) is worth 2; and strongly disagree (STS) is worth 1	Likert

Source: Data processed (2022)

The research model can be spelled out in the equation of multiple linear regression analysis with the equation:

$$Y = a + b_1X_1 + b_2X_2 + b_3X_3 + \varepsilon \dots\dots\dots (1)$$

Information:

- Y = Customer Interest in Using BSI QRIS Electronic Payment System
- a = Constant (Intercept)
- b₁,b₂,b₃ = Regression Coefficient
- X₁ = Knowledge
- X₂ = Benefit
- X₃ = Risk
- ε = Standard error

RESULTS AND DISCUSSION

In statistical testing, the coefficient of determination (R²) is used to measure how far the model's ability to describe the variation of dependent variable is. The value of the coefficient of determination is between zero and one. The F test is called a simultaneous test aimed at testing whether there is a linear relationship between variables. The t-test is called a partial test aimed at testing whether a variable is independent to influence the dependent variable. Table 1 shows a summary of the regressions.

Research Results

R² Accuracy Test Results

Based on Table 2 the R² value is 0,770 which represents the value of the coefficient of determination. This means that 77% of the dependent variable variation is able to be explained by the independent variable in this model. The remaining 23% is explained by other causes that are not included in the model.

F Test Results (Simultaneous Test)

The analysis and conclusions from Table 2 obtained a calculated F of 94,83 greater than the F of the table of 2,71 (94,83 > 2,71) and a Sig. value of 0,000 smaller than 0,05 (0,000 < 0,05). In conclusion H₀ is unacceptable and H_a is acceptable. This means that regression model on independent variable simultaneously influence dependent variable, so the independent variable regression model can be used to predict dependent variable.

t Test Results (Partial Test)

The results of the t test (partial test) in the regression test summary in Table 2 are as follows:

1. The variable X₁ has a calculated t value of 1,066 smaller than the table t of 1,98 (1,066 < 1,98) or a Sig. value of 0,289 greater than 0,05 (0,289 > 0,05). The conclusion is that H₀ is acceptable and H_a is unacceptable. This means that the variable X₁ has no influence and is not significant to the variable Y.
2. The variable X₂ has a calculated t value of 16,85 greater than the table t of 1,98 (16,85 > 1,98) or a Sig. value of 0,000 less than 0,05 (0,000 < 0,05). In conclusion H₀ is unacceptable and H_a is acceptable. This means that the variable X₂ has a significant influence on the variable Y.
3. The variable X₃ has a calculated t value of 1,117 smaller than the table t of 1,98 (1,117 < 1,98) or a Sig. value of 0,267 greater than 0,05 (0,267 > 0,05). The conclusion is that H₀ is acceptable and H_a is unacceptable. This means that the variable X₃ has no influence and is not significant to the variable Y.

Table 2. Regression Summary

Model	B	t	Sig.
Constant	0,246	0,070	0,944
X ₁	0,051	1,066	0,289
X ₂	0,846	16,85	0,000
X ₃	0,054	1,117	0,267
F = 94,83; Sig. = 0,000			
R = 0,877; R ² = 0,770			

Source: Data processed (2022)

Discussion

By looking at the results of the t test, the interpretation of this multiple linear regression equation is as follows:

$$Y = 0,246 + 0,051 X_1 + 0,846 X_2 + 0,054 X_3$$

1. The constant 0,246 indicates that if knowledge (X₁), benefits (X₂) and risks (X₃) are constant, then the interest of BSI KCP Indrapura customers who use the BSI QRIS electronic payment system is able to generate a profit for BSI KCP Indrapura of 0,246%. One of the advantages of BSI QRIS is that it provides convenience and comfort to BSI mobile user customers in transacting using BSI QR quickly, easily and safely. BSI QRIS is an easy and secure digital payment solution. The advantages offered by QRIS are also an attraction for people to use in the midst of today's digital era (BSI, 2023). QRIS digital payment services are one of the main drivers of sustainable growth of the banking industry (Sumadi, 2020). Every time you use a QR Code, you must apply QRIS which aims to make it easier for anyone to make transactions (Bank Indonesia, 2019). QRIS is the first step in the digital transformation of the Indonesian Payment System (SPI) which is believed to support the acceleration of digital economic and financial developments in Indonesia (Shohib et al, 2022). The legal basis of QRIS is contained in the Regulation of Members of the Board of Governors Number 21/18 /PADG/2019 concerning the Implementation of the National Quick Response Code Standard for Payments effective on August 16, 2019; and Regulation of Members of the Board of Governors Number 24/1/PADG/2022 dated February 25, 2022 concerning the Second Amendment to the Regulation of Members of the Board of Governors Number 21/18/PADG/2019 concerning the Implementation of the National Quick Response Code Standard for Payments effective march 1, 2022.
2. The hypothesis of this study is that knowledge (X₁) has an influence and is significant on customer interest in using the BSI QRIS (Y) electronic payment system. A knowledge variable regression coefficient (X₁) of 0,051 was obtained. This means that with the knowledge for BSI QRIS user customers of 1% will affect customer interest in using the BSI QRIS electronic payment system at BSI KCP Indrapura by 0,051%. Consumer knowledge in the QRIS application is information owned by consumers about various products and services as well as other knowledge related to these products and services and information related to their functions as customers (Afrida et al., 2020; and Zikri & Jannah, 2023). If customer knowledge about QRIS payment system technology is growing, it provides important benefits for many people. In addition, QRIS certainly speeds up transactions. This is because QRIS is here for the security of merchants and buyers (Nurdin et al., 2021). This is important for all PJSP marketers regarding what customers buy, how much they buy, where to buy them and when to buy them will depend on the customer's knowledge

of these things (Zulianto, 2019). The results of this study do not match the hypothesis. This is due to several factors that affect customer knowledge determined in mass media or information, education, socio-cultural and economic, environment, experience and age (Prihatno & Yuniati, 2021). Another thing is because customers still don't know how to use QRIS technology and don't understand how to use it. Fear of fraud related to the transaction (Zein, 2022).

3. The hypothesis of this study is that the benefit (X_2) has an effect and is significant on customer interest in using the BSI QRIS (Y) electronic payment system. A benefit variable regression coefficient (X_2) of 0,846 was obtained. This means that with the benefits for BSI QRIS user customers of 1% will affect customer interest in using the BSI QRIS electronic payment system at BSI KCP Indrapura by 0,846%. QR Code standardization with QRIS provides many benefits, including: (1) For payment application users: Just Scan and Pay, such as: fast and contemporary; no more hassle with cash; no need to bother thinking about whose QR is installed; and protected because all PJSP QRIS organizers are certainly licensed and supervised by Bank Indonesia; and (2) for merchants, such as: sales have the potential to increase because they can accept any QR-based payment; improving branding; contemporary; more practical because it is enough to use one QRIS; reducing cash management costs; avoid counterfeit money; there is no need to provide change; transactions are recorded automatically and can be viewed at any time; the separation of money for business and personal; facilitate reconciliation and potentially prevent fraud from bookkeeping cash transactions; and building credit profile information to make it easier to obtain credit in the future (Bank Indonesia, 2019). The results of this study are according to the hypothesis. The payment system is inseparable from the progress of money in its role. The benefits are completing business from various economic activities that are tried by people or institutions in the public. To realize an easy, safe and efficient payment system, Bank Indonesia continuously must make improvements and develop the QRIS payment system so that the benefits are said to be effective to user customers (Dwijayant et al., 2022). The purpose of launching the QRIS electronic payment system is to improve the digitalization system in Indonesia in helping customers and facilitating all daily activities and work. This goal is also expected to provide quite effective benefits in optimizing many things, so that QRIS user customers do not need to spend a lot of time and energy (Nainggolan et al., 2022).
4. The hypothesis of this study is that risk (X_3) has an effect and is significant on customer interest in using the BSI QRIS (Y) electronic payment system. A risk variable regression coefficient (X_3) of 0,054 was obtained. This means that with the risk for BSI QRIS user customers of 1% will affect customer interest in using the BSI QRIS electronic payment system at BSI KCP Indrapura by 0,054%. Risk is a state of uncertainty that a person considers to decide whether or not to make digital payment transactions online (Ningsih et al., 2021). This risk is a negative perception that refers to negative results and the possibility of it becoming real (Sudiatmika & Martini, 2022). Although QRIS facilitates digital payments by using server-based electronic money applications, electronic wallets and also mobile banking (Kurniawati et al., 2021). The results of this study do not match the hypothesis. This is because risk in the banking context is a potential event both anticipated and unanticipated which negatively affects bank income and capital (Karim, 2018). All risks represent unauthorized actions (McLeod & Schell, 2011). Another thing is

because customers still complain about transaction limits, usage fees, internet constraints in transacting with QRIS and doubts about using QRIS. Trust is lacking due to transaction security, especially customers living in rural areas. Customers consider it more convenient and easier to transact with cash. In addition, because the mastery of digital technology is still lacking. Another reason, because there are still limited numbers of merchants who accept payments with QRIS (Karniawati et al., 2021). So, customers often transact manually by depositing cash to tellers and through ATM (Saragih, 2022) for the risk of caution from doubts every transaction.

CONCLUSION

The results of the study are as follows: (1) The estimation model shows an R^2 value of 0,770 which represents the value of the coefficient of determination. This means that 77% of the dependent variable variation is able to be explained by the independent variable in this model. The remaining 23% is explained by other causes that are not included in the model; (2) The regression model on the independent variable simultaneously influence the dependent variable, so that the independent variable regression model can be used to predict the dependent variable; and (3) This research resulted in the output that there is a significant influence between the benefit on customer interest in using the BSI QRIS electronic payment system at BSI KCP Indrapura. However, it is not on knowledge and risk that does not show a significant influence, so it can be concluded that the two have no relationship at all to customer interest in using the BSI QRIS electronic payment system at BSI KCP Indrapura.

Although the findings are interesting as well as workable. However, this research needs further deepening, so that this research is more meaningful. For these reasons, it is recommended that subsequent researchers continue this research. Of course, this research does not have to be exactly the same as the previous research. There are several aspects that can be made a difference including data, variables, research methodology and research objects. Of course, still pay attention and base thinking with the rules of scientific thinking.

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