



# Correlation between perceived service quality and patient satisfaction with behavioral intention at a hospital in Surabaya

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## Abstract

The patients' behavioral intention to continue the visit and return to the hospital for further treatment affect the number of patient visits at Dr. Ramelan Marine Hospital. Several factors that influence the patients' behavioral intention include service quality and patient satisfaction. This study aims to determine the correlation between perceived service quality and patient satisfaction with the inpatients' behavioral intention. This study was classified as a quantitative correlational. The subject for this study was 100 inpatients in Ramelan Marine Hospital. The primary data were collected by utilizing questionnaires include the perceived service quality scale, patient satisfaction scale, and behavioral intention scale. Data were analyzed employing the regression method. This study results indicated that: 1) there was a correlation between perceived service quality and patient satisfaction with behavioral intention, the value of  $R^2 = 0.386$ ; 2) the perceived service quality had a significant correlation with behavioral intention ( $r=0.322$ ,  $p<0.05$ ); 3) patient satisfaction had a significant correlation with behavioral intention ( $r= 407$ ,  $p<0,05$ ). The conclusion of this study was the perceived service quality and patient satisfaction have a substantial correlation with behavioral intention. Hence, improvement in service quality and patient satisfaction needs to be conducted immediately. It is expected for further research to provide interventions in improving behavioral intention.

**Keywords:** behavioral intention, patient satisfaction, service quality

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## INTRODUCTION

Health is a fundamental human right and One element of welfare gained by each citizen. Definition of health, according to Law No. 36 of 2009 concerning Health, is a state of complete physical, mental, and social well-being to lead a socially and economically productive life. Everyone has the right to obtain safe, quality, and affordable health services (Chabibah, 2018). Permissible health body quality is recorded by the health bath facility, along with the rapid development of various aspects of social, economic, educational, and technological life, which increase the high demands of the community. Health Service Quality reflects the perfection level of health services to meet the patients' needs and expectations, eventually Customer Satisfaction (Supriyanto & Wulandari, 2011). Hospital service quality affects many things, includes the patients' behavioral intention. The patients' behavioral intention is a proportion that connects the patients with their future actions, whether they will choose the hospital services or not. This action is a result of patients'

perception of the hospital services. As the level of competition increases, hospitals are now shifting towards profit-oriented. The increasing number of hospitals creates a competition of customer visits within each hospital. Hospitals must at least be supported by an adequate amount of patient visits for operational costs to survive this competition. The patients' behavioral intention to continue the visit and return for further treatment will affect the number of patient visits. Behavioral intention is an important aspect to measure organizational success. It also represents the probability of customers return for future treatment and write positive comments and recommendations. Positive behavioral intention is indicated by two indicators, including a willingness to return and word of mouth effects (Lin, 2016; Anzaku, et al, 2017).

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The behavioral intention has five dimensions of measurement, consisting of loyalty, switch, pay more, external response, and internal response (Zeithaml, Berry, & Parasuraman, 1996). The patients' behavioral intention is influenced by many aspects, including service quality and patient satisfaction (Aliman, & Mohamad, 2013). Health services quality refers to the perfection level of health services, which can lead to patient satisfaction and perform the procedures under the established ethical codes and professional service standards (Octavia, & Anwar, 2012). The concept of hospital service quality is generally perceived based on the patients' consideration who receive services provided by the hospital (Amin, & Nasharuddin, 2013). Excellent service quality will convince patients to revisit or return for future treatment (Maqsood, et al. 2017). These conditions indicate the patients' behavior towards the service provider. Quality services that meet customer expectations will establish the patients' loyalty to the service provider. Perceived service quality consists of five dimensions measurement, including admission, medical assistance, overall service, discharge, and social responsibility (Aagja, & Garg, 2010).

Another factor that also influences the patients' behavioral intention is patient satisfaction. Satisfied patients are a precious asset for the hospital. If the patients satisfied with the service provided by the hospital, they would continue to use the services for future choice. Patients who are convinced tend to recommend others for that particular hospital (Amin, & Nasharuddin, 2013). On the other hand, if the patients feel dissatisfied with the service provided, they will tell others twice as high about their bad experiences in the hospital. Patient satisfaction is one of the main goals considered by the hospital for long term relationships with patients. To create patient satisfaction, the hospital must establish and manage a system for obtaining more patients and the ability to retain patients. Patient satisfaction was a comparison result of patient expectations and the perceived quality of service performance (2016). The number of hospital patient visits is influenced by behavioral intention, while the behavioral intention is also influenced by many factors, including quality of service and patient satisfaction. This study aims to determine the correlation between perceived service quality and patient satisfaction with the patient's behavioral intention.

## MATERIALS AND METHOD

### Study Design and Setting

This study was categorized as a quantitative correlational and conducted to find out the correlation between independent variables (perceived service quality and patient satisfaction) and dependent variables

(behavioral intention). This study was carried out at Ramelan Marine Hospital in June-July 2019.

### Study Participants

The samples for this study were 100 hospitalized patients in the Inpatient Rooms at Dr. Ramelan Marine Hospital Surabaya. The sampling method employed in this study was purposive sampling. The Inclusion criteria in determining the sample included inpatients in June-July 2019, aged 17-60 years old, did not have a stroke, and were not hospitalized because of an accident.

### Data Collection

Data collected utilizing three questionnaires to measure the dependent variable and the independent variable, including Behavioral Intention Questionnaire, Perceived Service Quality, and Patient Satisfaction Questionnaire. The behavioral intention questionnaire consisted of 13 items that measure five dimensions include Loyalty, Switch, pay more, external response, internal response (Zeithaml, Berry, & Parasuraman, 1996). Perceived service quality questionnaire was adapted from PubHosQual consisting of 18 items that measured five dimensions, including admission, medical service, overall service, discharge, and social responsibility (Amin, & Nasharuddin, 2013). Patient Satisfaction questionnaire was unidimensional and consisted of ten items (Maqsood, et al. 2017). The questionnaire was measured by utilizing the Likert scale 1-4 for each question item. Ethical clearance for this study was applied to the Health Research Ethics Commission of Ramelan Marine Hospital.

### Data Analysis

Multiple regression used to analyze data. Data analysis was conducted to determine the value of  $R^2$  as a practical contribution of perceived service quality and patient satisfaction to the behavioral intention. Multiple regression is also employed to determine the correlation between perceived service quality and patient satisfaction and behavioral intention.

## RESULT

The respondents of this study were 100 inpatients, consisting of 59 people (59%) women and 41 people (41%) men. Majority of participants aged around 51-55 years were 69 people (69%) (see **Table 1**).

**Table 1** defines that most patients have twice admission in the Dr. Ramelan Marine Hospital Surabaya. It indicated that there was a tendency for patients to revisit the same hospital for future treatment. Regression analysis was carried out to determine the correlation between perceived service quality and patient satisfaction with behavioral intention. Regression test results with a p-value of lower than 0.05 are shown in **Table 2**.

**Table 1.** Patients' Times of Admission

| Times of Admission | Frequency<br>n = 100 | Percentage |
|--------------------|----------------------|------------|
| First times        | 32                   | 32%        |
| Two times          | 54                   | 54%        |
| Three times        | 12                   | 12%        |
| Three times above  | 2                    | 2%         |

**Table 2.** Regression Analysis Result

| Correlation IV-DV | R     | R Square | P-value (Sig) |
|-------------------|-------|----------|---------------|
| PSQ, PS - BI      | 0.427 | 0.386    | 0.000         |

**Table 3.** Partial Correlation Analysis Result

| Correlation IV-DV | Partial correlation | Sig   |
|-------------------|---------------------|-------|
| PSQ - BI          | 0.322               | 0.023 |
| PS - BI           |                     | 0.000 |

Based on **Table 2** there was a significant correlation between perceived service quality and patient satisfaction with behavioral intention. This considerable relationship shows that patients who considered the hospital services quality to be good enough and felt satisfied with the services received would have a behavioral intention to return to the hospital for future treatment. The value of R square ( $R^2$ ) = 0.386 indicated that perceived service quality and patient satisfaction had an effective contribution to behavioral intention by 38,6%. A partial correlation test was utilized to discover the correlation between each independent variable with each dependent variable.

**Table 3** reveals that perceived service quality had a significant correlation with behavioral intention ( $r=0.322$ ,  $p<0.05$ ), and patient satisfaction has a significant correlation with behavioral intention ( $r=0.407$ ,  $p<0.05$ ).

## DISCUSSION

The patients' behavioral intention was a critical aspect for the hospital since it related to the patients' behavioral intention to revisit for future treatment in the same hospital. Behavioral intention to revisit would undoubtedly affect the number of patient visits in the hospital. Behavioral intention was a signal whether patients would be loyal to the hospital or cut off contact with service providers (Amin, & Nasharuddin, 2013). Regression test results identified that there was a significant correlation between perceived service quality and patient satisfaction with behavioral intention.

This study results were under several previous studies, which stated that service quality positively influenced behavioral intention (Aliman, & Mohamad, 2013). A SERVQUAL questionnaire was employed to measure service quality, and the results showed that there were three dimensions of service quality, namely tangibles, assurance, and empathy that indicated a significant relationship with behavioral intention. Another study also described that there was a significant effect between service quality with behavioral intention (Amin, & Nasharuddin, 2013). On the other hand, there were

some different results from other studies that service quality could affect the patients' behavioral intention (Maqsood et al. 2017).

The study results indicated that there was a significant correlation between perceived service quality and patient satisfaction with behavioral intention. Increasing the services quality and patient satisfaction was an effort to enhance the patients' behavioral intention. Behavioral intention must be considered to affect the number of behavioral intention visits, and it also could affect the hospital. Behavioral intention became beneficial for the hospital if the patient presented positive comments and recommendations to others regarding the services that they received and had a revisit intention for future treatment. Meanwhile, the behavioral intention of patients would not be profitable if they spread their negative experiences at the hospital. Therefore, the interaction between patients and service providers was one of the main factors in determining patient loyalty. If the patient satisfied with the excellent service quality in a particular hospital, the patient would gradually revisit the hospital and recommend it to others.

Its competitiveness determined hospital sustainability against competitors. Quality of service and patient satisfaction were potential competitiveness that could make hospitals survive in competition and make patients have the intention for revisits (repurchase) shortly. Improving the quality of service was an effort to increase patients' behavioral intention. Patients who come to the hospital to receive treatment expected to obtain better services. If the services were beyond their expectation, then it would benefit the hospital service quality. Conversely, if the service they received did not meet their expectation, then the patients would perceive inadequate services quality (Panjaitan, & Yuliati, 2016).

In this study, perceived service quality had five dimensions, including admission, medical service, overall service, discharge process, and social responsiveness. Improving the quality of service was conducted by implementing admission and treatment procedure under the Standart Operating Procedure (SOP). Quality service also could be increased by providing services in a friendly and solutive manner. Complaints that often arise related to service quality were the length of waiting time for the admission and discharge processes. This aspect needed to be improved by reviewing the service flow and conducting time-motion studies to analyze work effectiveness.

Another aspect that also affects behavioral intention was patient satisfaction. Patient satisfaction was a patients' response to the fulfilment of their needs. The patient would feel satisfied when the health provider was capable of providing comfort level beyond their expectations. It could be improved by enhancing both the service and physical facilities in the hospital. Patient satisfaction with its correlation with behavioral intention was how the first impression could establish the

customers' positive attitude and make them revisit the hospital for further treatment. This study was limited to the patients in first, second, and third class only, so the researcher could not compare the patients' behavioral intention from VIP class.

## CONCLUSION

There is a significant correlation between perceived service quality and patient satisfaction with behavioral intention. Hence, improvement in service quality and patient satisfaction needs to be conducted immediately.

Further research is expected to provide interventions to improve behavioral intention.

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