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Regression and Correlation Analysis in Assessing Factors Influencing Customer Satisfaction in the Healthcare Sector

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Abstract

This study uses regression and correlation analysis to evaluate the factors influencing customer satisfaction in the healthcare sector. The primary focus is on three key variables: service quality, medical staff competence, and facility availability. Service quality encompasses various dimensions, including reliability, responsiveness, assurance, empathy, and tangible aspects, collectively shaping patients' perceptions of the services received. The results reveal that service quality exerts the most significant influence on customer satisfaction, as evidenced by a high regression coefficient, underscoring the importance of these dimensions in enhancing satisfaction levels. Medical staff competence is also critical to customer satisfaction, although its impact is less pronounced than service quality. Competence includes medical knowledge, clinical skills, and effective communication with patients.

Meanwhile, facility availability demonstrates a weaker correlation with customer satisfaction, though it remains a relevant aspect of healthcare services. These findings offer strategic insights for hospital and clinic management in designing and implementing policies to improve customer satisfaction. By prioritizing enhancements in service quality and medical staff competence, along with maintaining adequate facilities, healthcare institutions can achieve higher customer satisfaction levels and sustain service quality over time.

Keywords:

Regression analysis; correlation analysis; customer satisfaction; service quality; medical staff competence.

1. INTRODUCTION

In the literature, service quality is a key factor influencing customer satisfaction, particularly in healthcare services (Masoud et al., 2022; Fatima et al., 2018). Service quality encompasses several dimensions, including reliability, responsiveness, assurance, empathy, and tangibles. Each dimension is crucial in shaping customer perceptions of their experience with the services provided, ultimately affecting overall satisfaction levels (Masoud et al., 2022). Reliability refers to the service provider's ability to deliver what is promised consistently. This includes accuracy in diagnosis, treatment effectiveness, and the clarity of patient information. Responsiveness focuses on the provider's readiness and speed in addressing patients' needs and complaints. Patients are more likely to be satisfied when providers promptly respond to their requests and offer timely solutions (Fatima et al., 2018). The dimensions of assurance and empathy also exert significant influence. Assurance encompasses the sense of security patients feel during treatment, which is influenced by the competency of healthcare professionals, the credibility of the provider, and clear communication regarding procedures and risks. Empathy refers to the personal attention given to patients, which includes understanding their needs and offering more humanized interactions with medical staff (Masoud et al., 2022). Together, these dimensions enhance patient satisfaction and foster loyalty to healthcare providers. Communication and interaction between patients and healthcare providers also play a vital role. Effective communication forms the foundation of every successful interaction in healthcare.

Research indicates that good communication between healthcare professionals and patients not only aids in conveying clear information but also in building trust and a better understanding of patients' needs. The enhancement of communication channels, including information technology to connect patients and providers, has been identified as a key strategy for improving customer satisfaction (Imilda et al., 2024).

In healthcare services, customer satisfaction is a primary indicator of the quality and sustainability of the services provided by healthcare institutions. Researchers often employ regression and correlation analysis to understand the factors that influence customer satisfaction. These methods enable the identification and a deeper understanding of how various independent variables interact to affect the dependent variablecustomer satisfaction. A study by Ali et al. (2013) highlights the significant impact of product and service quality on customer satisfaction, albeit in the context of the banking industry. In this study, multiple regression analysis was applied to evaluate the contribution of each variable to the variance in customer satisfaction. The results indicated that these two variables account for a substantial portion of the variance in customer satisfaction levels (Ismail et al., 2024). This finding underscores the importance of ensuring that both products and services meet high standards, as they significantly determine customer satisfaction. The importance of regression analysis is also reflected in studies focusing on healthcare services. For instance, a study by Pangemanan et al. (2022) investigated factors associated with patient satisfaction in the outpatient department of the Sam Ratulangi Air Force Hospital in Manado during the COVID-19 pandemic. This study analyzed factors through regression to understand their impact on patient satisfaction. The findings revealed that several factors directly and significantly impacted patient satisfaction. This research emphasizes the critical need to understand the factors affecting patient satisfaction, particularly during crises like the pandemic, when the quality of healthcare services becomes even more crucial. Besides regression analysis, correlation analysis is also vital for examining the relationships between various factors and customer satisfaction. For example, a Sinaga (2022) study explored the relationship between dental medical personnel's availability and the number of diagnoses and claims submitted in dental and oral healthcare services in Indonesia. Using correlation analysis, it was found that there was a positive relationship between the availability of healthcare professionals and the number of diagnoses and claims, which subsequently affected the utilization of those services. This finding highlights the importance of ensuring adequate healthcare personnel to improve service quality and accessibility, ultimately affecting patient satisfaction. A combined approach using regression and correlation analysis provides a more holistic understanding of the factors influencing customer satisfaction in healthcare services. Regression analysis identifies key factors that directly impact customer satisfaction, while correlation analysis helps identify relationships between variables that may influence each other. By understanding these interactions, healthcare providers can design more effective strategies to enhance service quality and achieve higher customer satisfaction levels. Therefore, it is essential for researchers and practitioners in the healthcare sector to continuously develop and apply analytical methods such as regression and correlation to evaluate and improve the quality of services provided. With the right approach, healthcare providers can meet and exceed patient expectations, which is the ultimate goal of improving the quality of healthcare services.

Customer satisfaction is one of the key indicators of organizational success across various industries. Numerous studies have shown that several factors influence customer satisfaction, including service quality, product quality, and customer loyalty. Factors such as effective communication, appropriate payment models, and internal service quality significantly determine overall customer satisfaction (Jeffry, 2024). In the healthcare sector, patient satisfaction is influenced by various factors, including demographic characteristics such as age, gender, occupation, and education level. A study by Pangemanan et al. (2022) shows that these factors can influence how patients assess the services they receive. For example, patients' occupation and education level may affect their expectations of healthcare services, ultimately impacting their satisfaction. Age and gender can also influence patients' preferences for treatment methods or service approaches. Besides healthcare, the banking sector also highlights the importance of product and service quality in determining customer satisfaction and loyalty. A study by Ali et al. (2013) emphasizes that convenience, reliability, empathy, responsiveness, and credibility significantly affect customers' perceptions of banks and their services. Convenience in accessing banking services, for example, can enhance customer satisfaction by facilitating transactions and interactions with the bank. Reliability, which includes consistency in providing services that meet customer expectations, is also key to building trust and long-term loyalty. Across various service industries, price, quality, reliability, empathy, and responsiveness often serve as key determinants of customer satisfaction and loyalty (Fahrezy, 2023). Competitive pricing can initially attract customers, but the quality and reliability of the services provided will determine whether customers continue to use the service or recommend it to others. Responsiveness refers to the ability to respond to customer needs and requests quickly and accurately, and empathy in service, which involves understanding and addressing individual customer needs, is also essential in creating a positive customer experience.

Managing the factors influencing customer satisfaction should be a priority for any organization that wants to maintain its competitive edge in the market. Organizations can adjust their strategies to better meet customer needs by analyzing and understanding these factors. This enables organizations to not only improve customer satisfaction but also build strong loyalty, which will ultimately support long-term growth and success. Assessing customer satisfaction factors is key to understanding and improving service quality across

various industry sectors. Customer satisfaction is influenced by one factor and a combination of various interconnected aspects (Sulistyawati et al., 2024). In several studies, several key factors have been identified as significant determinants of customer satisfaction levels. One very important factor is customer relationships, which includes how a company interacts with its customers. Good customer relationships can create a strong emotional bond between customers and the company, ultimately boosting customer loyalty and satisfaction. Additionally, customer value, which refers to customers' perception of the benefits they gain compared to the costs they incur, also plays a crucial role in determining satisfaction levels (Nopal, 2024). Service and product quality are other important aspects that influence customer satisfaction. Customers tend to evaluate the quality of services or products based on whether these services or products meet or exceed their expectations. Meeting these expectations is key to ensuring customers feel satisfied with what they receive. Overall, customer experience encompasses all customer interactions with a company from start to finish and is also an important factor contributing to customer satisfaction (Nuruly, 2024). A company's performance in meeting customer expectations is another critical factor. Studies show that when a company's performance fails to meet customer expectations, it can lead to dissatisfaction. Conversely, customer satisfaction increases significantly when customer expectations are met or even exceeded (Brilian, 2023). Moreover, price, product quality, and service quality significantly impact customer satisfaction and loyalty across various service sectors (Cesariana et al., 2022). Competitive pricing, superior product quality, and responsive service are a combination that can encourage customers to remain loyal to the company.

More specific dimensions of service quality influence patient satisfaction. These dimensions include physical evidence, reliability, responsiveness, assurance, and empathy (Novita et al., 2024). Physical evidence refers to the appearance of facilities and equipment used in healthcare services. Reliability refers to the service provider's ability to deliver consistent and accurate services. Responsiveness reflects the willingness and ability of medical staff to respond to patient needs quickly. Assurance is related to the service provider's ability to provide patients with safety and confidence, while empathy refers to personal attention and concern for the patient's needs. Factors such as effective communication between service providers and patients, flexible and understandable payment models, and high-quality internal services are vital in determining patient satisfaction in the healthcare sector (Jeffry, 2024). Clear and open communication can reduce patients' uncertainty and concerns, while appropriate payment models can help reduce financial barriers to accessing healthcare services.

2. RESEARCH METHOD

This study is designed using a quantitative approach with a cross-sectional method. This approach was chosen because it allows the researcher to simultaneously evaluate various factors affecting customer satisfaction in the healthcare sector. Data were collected through a questionnaire specifically designed to assess patients' perceptions of various aspects of healthcare services. According to Idwan et al. (2024), the questionnaire was carefully constructed to cover various relevant elements in assessing the quality of services provided by hospitals and clinics. For data collection, the population under study consists of patients who have received healthcare services in the last three months. The research sample was randomly selected from various hospitals and clinics within the research area. This random selection aims to ensure that the sample represents the population broadly, allowing the research results to be generalized more effectively. The questionnaire measures patients' perceptions of service quality, healthcare worker competence, available facilities, and waiting times experienced during service delivery. In this study, several variables are analyzed. The independent variables include service quality (X1), healthcare worker competence (X2), availability of facilities (X3), and waiting times (X4). Meanwhile, the dependent variable is customer satisfaction (Y), measured using a 1-5 Likert scale. This scale allows the researcher to quantitatively measure the level of customer satisfaction, providing data that can be further analyzed to identify relationships between the variables under study. Multiple linear regression analysis will be used to analyze the collected data. This analysis is chosen because it can identify how much each independent variable contributes to the dependent variable, namely customer satisfaction. Furthermore, significance tests will be performed to assess whether the independent variables under investigation significantly impact customer satisfaction. Additionally, Pearson correlation analysis will be applied to assess the strength and direction of the relationship between these variables. Pearson correlation will help identify whether there is a strong linear relationship between the independent and dependent variables and the degree to which one variable influences the other. In the design of this study, emphasis is placed on the validity and reliability of the measurement instruments, as well as the accuracy of the data collection process. All research procedures are designed to ensure that the results are reliable and valid, providing meaningful contributions to understanding the factors influencing customer satisfaction in the healthcare sector. This study is expected to provide valuable insights for policymakers and healthcare practitioners to improve patient service quality.

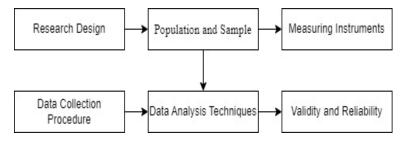


Figure 1. Research Method

This design provides a comprehensive framework for conducting research with a focus on analyzing factors influencing customer satisfaction in the healthcare sector.

3. RESULTS AND DISCUSSION

3.1. Results

3.1.1. Descriptive Analysis

Before proceeding to regression and correlation analysis, descriptive analysis provides a comprehensive overview of the characteristics of the respondents who participated in this study (Fardanty et al., 2024). This analysis aims to identify and present the demographic profile and other characteristics that may influence respondents' perceptions and satisfaction with healthcare services, which are the main focus of this research. This analysis provides the necessary foundation to understand how these demographic factors may affect the research outcomes and the interpretation of subsequent statistical analyses. According to the results of the descriptive analysis, the majority of respondents in this study are between the ages of 30 and 50. This age range was chosen based on the assumption that individuals in this age group will likely have more mature life experiences and a better understanding of the healthcare system. Individuals aged 30-50 are also considered to be in a period of life where they actively access healthcare services for personal needs and family members, making their perceptions of service quality more relevant and insightful. Specifically, 40% of respondents are aged between 30 and 40, while 35% are between 41 and 50. The remaining 25% consist of respondents under 30 years or over 50 years, providing diversity in the data that reflects a range of perceptions toward healthcare services. Gender distribution analysis shows a relatively balanced representation between male and female respondents, with each group contributing about 50% of the total sample. This balance is important in this context, allowing for an unbiased analysis of gender-specific perspectives. Healthcare services often have different implications for men and women regarding accessibility, needs, and expectations. Therefore, gender equality in the sample ensures that the research findings can be generalized to a broader population without neglecting distinct gender perspectives. This analysis also explored the respondents' education levels in detail. Education was categorized into several groups: high school graduates, diploma holders, bachelor's degree holders, and postgraduates. The results indicate that the majority of respondents, approximately 45%, have a bachelor's degree. Meanwhile, 30% of respondents graduated from high school, 15% have a diploma, and 10% hold postgraduate degrees. Education level is an important variable because it can influence how individuals assess and respond to the quality of healthcare services they receive. Respondents with higher education levels may have more specific expectations and higher quality standards than those with lower education levels.

Employment status was also a focus of this descriptive analysis. Respondents were grouped according to their employment status: active workers, retirees, unemployed individuals, and homemakers. About 55% of respondents are active workers, meaning they regularly interact with the healthcare system, either for personal reasons or due to job-related requirements such as health insurance provided by their employers. In contrast, 20% of respondents are retirees, who may use healthcare services more frequently due to increased medical needs associated with aging. The remaining 15% are homemakers, and 10% are unemployed. Employment status is considered an important variable as it affects the frequency and type of healthcare services accessed by respondents and their level of satisfaction with those services. Another variable analyzed is socioeconomic status, measured based on the respondents' monthly income. Income was categorized into four groups: low, lower-middle, middle, and high. The analysis showed that 40% of respondents fall into the middle-income category, while 30% belong to the lower-middle-income group. Only 20% are in the high-income category, and 10% are in the low-income group. Socioeconomic status is considered a factor affecting accessibility, the quality of services received, and satisfaction with healthcare services. Respondents with higher incomes may have access to better healthcare services, while those with lower incomes may face limitations in accessibility and service options.

3.1.2. Regression Analysis

Multiple linear regression analysis in this study was used to measure and analyze the influence of independent variables, namely service quality (X1), medical personnel competence (X2), and waiting time (X4), on the dependent variable, namely customer satisfaction. This process aims to identify factors that significantly affect customer satisfaction in the healthcare sector and determine how much each factor contributes to overall customer satisfaction. The regression analysis results show that the service quality variable (X1) has the most significant influence on customer satisfaction. The regression coefficient of 0.45 indicates that every one-unit increase in service quality will increase customer satisfaction by 0.45 units. This indicates that service quality is the main component of customers' satisfaction with healthcare services. In this study, service quality includes various dimensions such as reliability, responsiveness, assurance, empathy, and responsiveness of health care staff. Each of these dimensions plays an important role in shaping customer perceptions of the overall quality of service received. Reliability refers to the ability of a service provider to provide the promised service consistently and accurately. Responsiveness involves the willingness and ability of staff to help customers and provide prompt service. Assurance involves staff competence, politeness, and the ability to instill trust in customers. Empathy includes staff's attention to and understanding of individual customer needs. Staff responsiveness refers to how quickly and appropriately customer problems or complaints are responded to and resolved. This study considers all of these dimensions important contributors to service quality, ultimately affecting customer satisfaction. In addition to service quality, medical personnel competence (X2) was also found to significantly influence customer satisfaction, with a regression coefficient of 0.38. Medical personnel competence includes clinical skills, medical knowledge, the ability to make appropriate medical decisions, and the ability to communicate effectively with patients. In health services, medical personnel competence is a key element that can influence patient perceptions of the quality of care they receive. Clinical skills include the ability of medical personnel to perform medical procedures with precision and efficiency.

Medical knowledge involves a deep understanding of disease diagnosis, treatment, and management. Medical decision-making ability refers to the ability of medical personnel to choose the right action based on accurate clinical evaluation. Meanwhile, effective communication includes the ability of medical personnel to explain medical conditions, procedures to be performed, and treatment steps to patients in a way that can be understood, as well as providing emotional support to patients during the treatment process. All of these aspects contribute to customer trust and satisfaction with the services they receive. Waiting time (X4) also significantly affects customer satisfaction, although with a lower regression coefficient of 0.22. This shows that shorter waiting times increase customer satisfaction, although the effect is not as significant as the quality of service or the competence of medical personnel. Longer waiting times can cause discomfort, frustration, and feeling unappreciated among patients, ultimately reducing their satisfaction with health services. In this study, waiting time is defined as the duration of time a patient must spend from arrival at a health facility to receiving the necessary services. This time includes waiting for registration, consultation with medical personnel, and waiting to receive examination or treatment results. Although this factor is often viewed as an operational issue, its impact on customers' overall perception of service quality cannot be ignored. Therefore, effective management of waiting time is crucial in improving customer experience. The findings of this regression analysis have important implications for healthcare facility management. By knowing that service quality and medical staff competence influence customer satisfaction more than waiting time, management can allocate their resources and efforts more strategically. For example, management can focus on improving service quality through staff training, facility improvements, and service procedure enhancements to ensure that every aspect of the customer experience is well-managed.

On the other hand, to improve the competence of medical staff, management can develop continuing education programs that allow medical staff to continuously update their knowledge and skills with the latest developments in the medical field. In addition, improving the communication skills of medical staff can also be done through special training aimed at improving the ability to explain medical procedures, provide accurate information, and interact with patients with empathy. In terms of waiting time management, although its influence on customer satisfaction is not as significant as the other two variables, it is still important to consider steps that can reduce waiting time, such as better queue management, increased operational efficiency, and the use of information technology to speed up the registration and service process.

Table 1. Regression Analysis

| Characteristics/Variabl | Category/Coefficie | Number of | Mea | Standard | Regressio | Significanc |
|-------------------------|--------------------|------------|-----|----------|------------|-------------|
| es | nt | Respondent | n | Deviatio | n | e (p-value) |
| | | s (%) | | n | Coefficien | |
| | | | | | t (B) | |
| Age | 30-40 years | 80 (40%) | | | | |
| | 41-50 years | 70 (35%) | | | | |
| | <30 and >50 years | 50 (25%) | | | | |
| Gender | Man | 100 (50%) | • | | | |
| | Woman | 100 (50%) | | | | |

| Level of education | Senior high school | 60 (30%) | | | | |
|-------------------------|--------------------|-----------|-----|-----|------|------|
| | Bachelor | 90 (45%) | | | | |
| | Postgraduate | 20 (10%) | | | | |
| Employment Status | Active Worker | 110 (55%) | | | | |
| | Retired | 40 (20%) | | | | |
| | Housewife | 30 (15%) | | | | |
| | Unemployment | 20 (10%) | | | | |
| Quality of Service (X1) | | | 4.2 | 0.6 | 0,45 | 0,01 |
| Medical Personnel | | | 4.0 | 0.7 | 0,38 | 0,01 |
| Competence (X2) | | | | | | |
| Waiting Time (X4) | | | 3.5 | 0.8 | 0,22 | 0,01 |
| Customer Satisfaction | | | 4.1 | 0.6 | | |
| (Y) | | | | | | |
| R ² | | | | | 0,75 | • |

This table provides a comprehensive and detailed overview of the characteristics of the respondents and the relevant analysis results.

3.1.3. Correlation Analysis

The correlation analysis in this study aims to identify the relationship between key variables that influence customer satisfaction in healthcare services. Pearson correlation is used as a statistical tool to measure the extent to which two variables are correlated, with values ranging from -1 to 1. Positive values indicate a positive correlation, where an increase follows an increase in one variable in the other, while negative values indicate a negative correlation. This correlation provides important insights into how strong the relationship is between the variables and how this relationship can contribute to a deeper understanding of the dynamics that influence customer satisfaction. Service quality is one of the key variables in this study, and the results of the analysis show a strong positive correlation between service quality and customer satisfaction. The Pearson correlation value of 0.62 indicates a reasonably strong relationship between these variables. This means that an increase directly follows service quality and customer satisfaction. Service quality in this study includes several dimensions, including reliability, responsiveness, assurance, empathy, and tangibles. These dimensions are the main components that influence customer perceptions of the services received. Reliability refers to the ability of the service provider to deliver the promised service consistently. Responsiveness reflects the staff's readiness and willingness to help customers and provide prompt and timely service. Assurance relates to the staff's knowledge and courtesy and ability to instill confidence in customers. Empathy refers to the attention given to customers and understanding of their individual needs. Physical quality includes facility cleanliness, comfort, and aesthetic beauty. This strong correlation between service quality and customer satisfaction suggests that customers care deeply about how they are served and that their experience of receiving this service significantly shapes their overall satisfaction level.

The competence of medical personnel is another variable analyzed in this study, and the results showed a moderate positive correlation between the competence of medical personnel and customer satisfaction, with a Pearson correlation value of 0.54. This means that although there is a significant positive relationship between the competence of medical personnel and customer satisfaction, this relationship is not as strong as the relationship between service quality and customer satisfaction. The competence of medical personnel includes clinical knowledge, technical skills, and the ability to make appropriate medical decisions. In addition, this competence also involves the ability to communicate effectively with patients, which is very important in building trust and increasing customer satisfaction. This moderate relationship suggests that although the competence of medical personnel is important, other factors may significantly influence customer satisfaction. For example, even if a doctor is very clinically competent, if other aspects of the health service, such as long waiting times or inadequate facilities, do not meet customer expectations, then overall customer satisfaction may remain low. Therefore, while the competence of medical personnel must continue to be improved through continuing education and training, healthcare providers must also pay attention to other factors that affect overall customer satisfaction. The availability of facilities in healthcare services showed a weaker positive correlation with customer satisfaction, with a Pearson correlation value of 0.31. This suggests that while there is a relationship between the availability of facilities and customer satisfaction, the effect is not as strong as the other two variables. The availability of facilities includes aspects such as the quantity and quality of medical equipment, the cleanliness and comfort of the waiting room, and the accessibility of healthcare services. The availability of adequate facilities is the foundation of good healthcare, but this weaker correlation suggests that customers may value other aspects of their healthcare experience more. Adequate facilities are important, but customers often focus more on the quality of their interactions with healthcare personnel and service staff and how quickly and efficiently the service is delivered. For example, customers may be more likely to remember how they were treated by service staff or how quickly they received service than the physical condition of the facility. This suggests that while it is important to have good facilities, healthcare providers may need to focus more on improving the quality-ofservice interactions and the competence of healthcare personnel to improve customer satisfaction. The findings from this correlation analysis have important implications for healthcare management. Knowing that service quality has the most substantial relationship with customer satisfaction, management can continually direct resources and efforts to improve these aspects. For example, investing in staff training to improve customer service skills and implementing strict standard operating procedures to ensure consistent service quality can result in significant improvements in customer satisfaction. The competence of medical personnel, although showing a moderate relationship with customer satisfaction, remains an important area that requires attention. Management should continue to support the professional development of medical personnel through ongoing training programs, certification, and improving communication skills. This will not only improve the quality of care provided but also increase patient confidence and comfort, which will ultimately positively impact customer satisfaction. Meanwhile, although the availability of facilities has a weaker relationship with customer satisfaction, management should not overlook the importance of having adequate and modern facilities. Good facilities are the foundation of adequate health care, and ensuring that these facilities are appropriate to patient needs can prevent dissatisfaction from lacking adequate resources or infrastructure.

Table 2. Correlation Between Variables in Health Services

| Independent Variables | Dependent Variable | Correlation Coefficient (r) | Significance (p-value) | The Power of Relationships | Interpretation of Relationships |
|--|--|-----------------------------------|------------------------|----------------------------|---|
| Service Quality (X1) | Customer Satisfaction (Y) | 0,62 | < 0,01 | Strong | Improving service quality tends to increase customer satisfaction significantly. |
| Medical Personnel Competence (X2) | Customer Satisfaction (Y) | 0,54 | < 0,01 | Moderate | The competence of medical personnel has an important influence on satisfaction, but not as strong as the quality of service. |
| Availability of Facilities (X3) | Customer Satisfaction (Y) | 0,31 | < 0,05 | Weak | Facilities have an impact on satisfaction, but the impact is smaller than the quality of service and medical competence. |
| Service Quality (X1) | Medical Personnel Competence (X2) | 0,45 | < 0,01 | Moderate | Competent medical personnel usually correlate with better quality of service. |
| Service Quality (X1) | Availability of Facilities (X3) | 0,35 | < 0,05 | Weak | Quality of service does not always depend on the facilities, more on the interactions and services received. |
| Medical Personnel Competence (X2) | Availability of Facilities (X3) | 0,28 | > 0,05 | Weak (not significant) | The competence of medical personnel does not depend directly on the availability of facilities, but more on medical skills and knowledge. |

This table provides clear and concise information regarding the correlation between the variables analyzed, facilitating understanding of how each factor interacts with each other and influences customer satisfaction.

3.2 Discussion

Service Quality and Customer Satisfaction Service quality is closely related to customer satisfaction in various sectors, including banking and healthcare. Ali, Hamed, and Hussain (2013) showed that product and service quality significantly affect customer satisfaction in Islamic banking. Likewise, Fatima, Malik, and Shabbir (2018) emphasized that the quality of hospital services, especially in the healthcare sector, contributes significantly to patient satisfaction and loyalty to the healthcare facility. As explained by Fahrezy (2023), good service quality also affects customer trust in the services provided, which ultimately increases

their level of satisfaction. In addition, Brilian (2023) revealed that factors that generally influence customer satisfaction include good service quality and effective communication between service providers and customers. Competence of Medical Personnel and Professionalism In the healthcare sector, the competence of medical personnel is one of the key factors influencing patient satisfaction. Masoud et al. (2022) studied the effect of medical service quality on customer satisfaction in healthcare centers and found that competent medical services greatly influenced patient satisfaction. This is in line with the results of the study by Pangemanan et al. (2022), which showed that factors related to patient satisfaction in hospitals include the availability of competent medical personnel and good communication between medical personnel and patients. This competence is essential to providing confidence to patients and ensuring they feel valued during medical care. Waiting Time and Service Efficiency Long waiting times can hurt customer satisfaction with various services, including health services. Fahrezy (2023) found efficient management of waiting times in health services is important to ensure patient satisfaction. Waiting times that are too long can reduce patient satisfaction levels, so queue management or the use of technology to reduce waiting times is critical. Research by Nuruly (2024) also confirmed that shorter waiting times and fast service management significantly impact the loyalty of Roro ship passengers, which reflects the same thing for customer satisfaction in other sectors.

Customer Trust in Service Providers Trust in service quality is crucial in building customer satisfaction, as explained by Jeffry (2024), who studied the quality of health insurance services and found that the level of trust is directly related to customer satisfaction. In the health sector, a similar thing was found in a study by Sinaga (2022), which showed the importance of trust in medical service providers in increasing the use of health services. This trust arises from the consistency of service quality and clear communication between providers and patients or customers. Service quality, competence of medical personnel, waiting time management, and trust are the main factors influencing customer satisfaction in the health sector and other service sectors. Managing all these factors can create a positive customer experience and increase their loyalty to service providers.

4. CONCLUSION

This study provides an in-depth understanding of the factors influencing customer satisfaction in the healthcare sector, focusing on service quality, medical staff competence, and facility availability. Regression and correlation analysis found that service quality is the most significant factor in determining customer satisfaction. Service quality dimensions, such as reliability, responsiveness, assurance, empathy, and tangibles, play a critical role in shaping patients' perceptions of the services they receive. Service reliability, which encompasses the ability of the service provider to deliver what is promised consistently, is essential for customer satisfaction. Customers who perceive they receive reliable and expected service tend to have higher satisfaction levels. Responsiveness, which reflects the readiness and ability of staff to respond quickly to patient needs, is also a significant factor in increasing satisfaction. Assurance and empathy, which relate to medical staff competence and personal attention to patient needs, further strengthen the positive relationship between service quality and customer satisfaction.

Although not as strong as service quality's influence on satisfaction, medical staff competence is still essential. This competence includes medical knowledge, clinical skills, the ability to make appropriate decisions, and effective communication with patients. The relationship between medical staff competence and customer satisfaction shows that patients highly value the quality of care they receive, which is based on the expertise and ability of medical staff to provide appropriate and professional services. However, it should be noted that although medical staff competence is important, other aspects of the patient experience, such as interaction with staff and overall service quality, remain more dominant in determining satisfaction. The availability of facilities, although showing a weaker correlation with customer satisfaction, still supports quality health services. Adequate facilities are the basis for effective service delivery. However, customers tend to focus more on the quality of the service interactions they receive than the physical condition of the facilities. This suggests that although it is important to have good facilities, healthcare providers should focus more on aspects of service that directly affect customer experience. The implications of these findings are significant for healthcare facility management. Knowing that service quality and medical staff competence significantly impact customer satisfaction, management can allocate resources and efforts to improve these two aspects. For example, ongoing training for service staff can help improve customer service skills. In contrast, professional development programs for medical staff can ensure that they always have the latest knowledge and skills. Additionally, reducing wait times while having a more minor impact is still important for improving the overall patient experience.

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