# The Impact of Hospital Image, Service Quality, and Cost Perception on Satisfaction And Trust

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#### Abstract

The purpose of this study was to investigate the impact of hospital image, service quality, and cost perception on patient satisfaction and trust. The sample of this study were 240 patients taken at Andi Makkasau Parepare Hospital, Indonesia. The data were collected using questionnaires to various categories of patients. Then, the data were analyzed using SEM (Structural Equation Modeling). As the results, this study indicated that hospital image had no impact on patient satisfaction and that quality of service and cost perception affected patient satisfaction. Furthermore, the hospital image, service quality, cost perception, and patient satisfaction gave positive impact on the patients' trust .

Keywords: Hospital Image, Service Quality, Cost Perception, Satisfaction, Trust

#### INTRODUCTION

Health-care service is one of important services to the community. Obviously, every person needs a healthy condition to accomplish their daily activities well. Thus, the community perceive for an optimal health service in order to develop their satisfactory health care as well as to guarantee their trust for revisiting the health care provider. Accordingly, previous researches evidenced that a hospital's brand image and patients' cost perceptions have strong influence to patients' satisfaction and trust (Lin & Lu, 2010; Theodoridis & Chatzipanagiotou, 2009; Yieh et al, 2007; Bloemer and Ruyter; 1997). In contrast, Wu (2011) argues that the hospital image has no significant effect on patient satisfaction. While Zeithaml (2009) and Fitriani (2014) find that patient satisfaction, quality of service, and image have close relationship with trust. Differently, Wu (2011) gives evidence that quality of service does not significantly affect patient trust. There various understanding on those variables. Therefore, this study intends to investigate the impact of hospital image, service quality, and cost perception on patient satisfaction and trust in an Indonesian hospial.

#### **Organizational Image**

# THEORITICAL REVIEW

Image is an invaluable entity for an organization or a company. According to Sutisna (2002: 332), there are five benefits from the positive image. First, the organizational image conveys shared expectations through external marketing campaign. The positive image on a product makes a company easier to communicate effectively and easier to understand through word of mouth communication. Second, the organizational image is considered as a filter that has a perception on the company's activities. Third, an image relates to a consumer's experience and perceived expectations. Fourth, image has a great effect on management or internal impact. And last, positive brand image can utilize a company to develop a product line againts the old product.

### **Cost Perception**

In this study, the concept of health costs is based on price approach. Cost and price are similar in meaning, but has different in practical concept. Price merely refers to product, while cost refers to service. Kotler and Armstrong (2012: 312) define the price as the amount of money paid for a product or service, or the amount of value that consumers exchange for the benefit of owning or utilizing a product or service. In the service context, Lovelock and Wirtz (2007: 630) define prices as the utilization of money, time and efforts that consumers spend in buying and utilizing services.

#### **Service Quality**

Quality has been defined variously by many experts. Kotler and Keller (2012: 131) conceptualize quality as the totality of features and characteristics on products or services to satisfy a customer's needs. Meanwhile,

Tjiptono (2008: 51) defines quality as a dynamic condition associated with products, services, people, processes, and environments that fulfill or exceed a customer's expectations.

### **Customer Satisfaction**

Satisfaction relates to customers' satisfactory feeling on a product or a service. According to Kotler and Keller (2012: 164), "satisfaction reflects a person's judgment of a product's perceived performance (or outcome) in relationship to expectation". Thus, satisfaction can be indicated as the customers acceptable or sufficient feeling as a result of comparing between the expectation of customers and their perceived performance on a product. In other words, if a product performance fails to meet the customers' expectation so that they will be not satisfied with the product. If the product performance exceeds customers' expectation so they will be more satisfied.

### Trust

Trust is considered valuable for an organization or a company. Referring to Robbins and Judge (2007: 392), trust is a positive assumption that a people will not hurt others through words, actions or decisions. Meanwhile Colquitt et al. (2009: 219) define trust as a desire to rely on authority based on the positive belief in accomplishing an action and the attention of authority.

# The Impact of Image on Satisfaction

Customer satisfaction refers to a degree in which consumers feel delighted or disappointed about a product. The consumers will express pleasant or satisfactory with a product if they have a good perception on it. In particular, satisfaction can be indicated if customers perceive for a product or a service with three indicators for a positive brand image, including producer image, product image, and user image. Thus, this study proposed the first hyphothesis as follow:

H-1 : The hospital image has a significant impact on patient satisfaction.

# The Impact of Service Quality on Satisfaction

Oviously, a service can not be seen, kissed and touched. So physical aspect is important as the measurement for a service. In particular, customers will use their sense of sight to judge a service quality in an organization or a company. According to Zeithaml et al. (2005), service quality can be measured from five things, namely tangible, responsiveness, reliability, assurance, and empathy. Hence, this study proposed the second hyphothesis as follow:

H-2 : The hospital services quality has a significant impact on patient's satisfaction.

# The Impact of Cost Perception to Satisfaction

Zeithaml in Tjiptono (2008: 203) explains that the cheaper price of a service can lead for its greater value. When the value perceived by consumers is higher on a product or service, so the consumers can feel satisfactory by consuming the product or service. Instead, Prasetio (2012) and Sugianto (2013) show that the significant partial effect of price is customer satisfaction. Otherwise, this study proposed the third hyphothesis as follow:

H-3 : Cost perception has a significant impact on patient's satisfaction.

# The Impact of Image on Trust

The consumers generally buy a product due to particular brands. They tend to trust a well-known product brand and to believe a positive brand image. Such consideration is commonly influenced by other consumers who bring out specific information about the product or service and who have experienced using the product or service. Therefore, a brand is an important element for the company since a good brand relates to its reputation. Furthermore, this study proposed the fourth hyphothesis as follow:

H-4 : The hospital image has a significant impact on the patient's trust.

# The Impact of Satisfaction on Trust

The consistency of service quality can provide long-term benefits for a company. Customers' positive perception towards a company can generate their satisfaction in using its product or service (Lupiyoadi, 2012: 176). Thus, this study proposed the fifth hyphothesis as follow:

H-5 : The hospital service quality has a significant impact on the patient's trust.

# The Impact of Cost Perception on Trust

The cost determination is essential for a company. The appointed price must cover all costs and provide benefits for both parties. Accordingly, Ellen and Lee (2003) conclude that dynamic pricing affects the customers'

trust on a product or a service. However, Yieh et al. (2007) find that prices have no effect on trust. Hence, this study proposed the sixth hyphothesis as follow:

H-6 : The cost perception has a significant impact on the patient's trust.

# The Impact of Satisfaction on Trust

Satisfaction will ultimately create a long-term relationship between the company and the consumer as a pattern of trust from consumers. Elrado et al. (2014) in his research proves satisfaction has a significant effect on trust variables. Kurniawan (2012) also proves satisfaction affecting consumer confidence. Kartikasari et al. (2014) adds satisfaction mediating the effect of service quality on trust. Then, this study proposed the seventh hyphothesis as follow:

H-7 : The satisfaction has a significant effect on patient trust.

#### **Research Methods**

This study applied questionnaires to obtain information about respondents' perspectives on the impact of hospital image, service quality, and cost perception on patient satisfaction and trust. The instrument included a number of written questions about what they felt and knew personally on those variables. In this study, the population were all patients of Andi Makkasau Public Hospital in Parepare, Indonesia. The sampling technique utilized purposive sampling, so the numbers of samples were 240 patients. Moreover, the analytical technique that was used to answer the hypothesis in this study was SEM (Structural Equation Modeling). The analysis results will be presented below.

Structural Equation Modeling (SEM) Analysis

This study investigated hospital patients' perspectives on the impact of hospital image, service quality, and cost perception on patient satisfaction and trust. Prior data calculation, the assumption test was conducted to ensure that the built structural model can be applied to test the variables in this study.

Criteria	Model Test Results	Critical Value	Notes				
Probability X <sup>2</sup> Chi square	0.056	≥ 0.05	Fit				
Cmin/DF	1.135	≤ 2.00	Fit				
RMSEA	0.024	≤ 0.08	Fit				
GFI	0.908	≥ 0.90	Fit				
AGFI	0.889	≥ 0.90	Marginal fit				
TLI	0.981	≥ 0.95	Fit				
CFI	0.983	≥ 0.95	Fit				

Table 1 Goodness of Fit value and Cut off Value Structural Model

As the result, the SEM calculation show that all goodness of fit criteria in non outlier data gave good index (fit), except AGFI criterion which gives value less than 0.90. However, Ferdinand (2002: 58) explains that the value of AGFI in the range 0.80 to 0.90 referred to as marginal fit or adequate model. Thus, the model developed in this study was acceptable. Furthermore, the results of hypothesis testing are described in the diagram below:

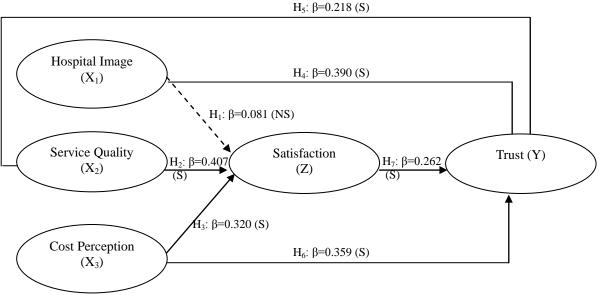


Figure 1. Diagram of Hypothesis Test Result

Table 2 Gausality Regression weight rest									
Causality Relationship		Std. Estimate	SE	CR	P value	Notes			
Hospital Image (X <sub>1</sub> )	→ Patient Satisfaction (Z)	0.081	0.162	1.121	0.262	No impact			
Service Quality (X <sub>2</sub> )	→ Patient Satisfaction (Z)	0.407	0.103	4.758	0.000	impact			
Cost Perception (X <sub>3</sub> )	→ Patient Satisfaction (Z)	0.320	0.098	3.734	0.000	impact			
Hospital Appearance (X <sub>1</sub> )	→ Patient Trust (Y)	0.390	0.177	4.526	0.000	impact			
Service Quality (X <sub>2</sub> )	→ Patient Trust (Y)	0.218	0.091	2.677	0.007	impact			
Cost Perception (X <sub>3</sub> )	→ Patient Trust (Y)	0.359	0.095	4.006	0.000	impact			
Patient Satisfaction (Z)	→ Patient Trust (Y)	0.262	0.085	2.857	0.004	impact			

 Table 2 Causality Regression Weight Test

# DISCUSSION

This study was to investigate the impact of hospital image, service quality, and cost perception on patient satisfaction and trust. The sample of this study were 240 patients taken at Andi Makkasau Public Hospital, Parepare. Based on the test results, this study found that the greater degree of hospital image could not significantly improve the patients' satisfaction on its given services. This finding is inconsistent with a previous research conducted by Bloemer and Ruyter (1997). They indicate that image can bring significant effect on satisfaction. While another research (Theodoridis and Chatzipanagiotou, 2009) also finds that image is associated with price factor that, in turn, affects customer satisfaction.

In addition, this study gave an evidence that the developed hospital services quality will increase its patients' satisfaction. This finding is consistent with Kitapci et al. (2014) proving the positive relationship between the quality dimension of hospital services and the customer satisfaction. Moreover, Dabri (2014) also proves that the service quality can impact satisfaction. The service quality is linked to the efforts to fulfill the customers needs and desires as well as to meet the accuracy of customer expectations. Therefore, the services in accordance with expectations have been widely recognized to affect immediate satisfaction. Then, the empathy is rated by the patient as the lowest service quality aspect. This study argued that the emphaty indicator needs to be considered as a priority and to be fixed by the hospital management immediately.

In this study, the patients' perception on more appropriate cost could increase their satisfaction. Price has an important role for consumers in making a decision. It also helps consumers to obtain products or services with the best benefits in relation to the strength of purchasing power. Thus it can be understood that price is the amount of money needed to obtain a statement of value for a product or service in accordance with the quality and benefits. The price is also influenced with psychological factors and other factors that affect the price itself. If the quality and received benefits are valuable in proportion to the paid price, so this is consistent with the expectations of the consumer. This is indicated by the customers' satisfaction that lead for their buying decision. Accordingly, this finding is consistent with Ellen and Lee (2003) who show the impact of dynamic pricing on trust.

Obviously, all investigated patients tend to find treatment at the hospital with positive image. They visit a hospital through a trust-building process. Therefore, this study argued that the management of Andi Makkasau Public Hospital Parepare needs to improve its capacity, to increase its attention to the patients, to understand the patients' attitude, and to give solutions for all patients' problems with the hospital services. As the result, the patients are able to generate their trust toward the hospital brand image.

Finally, the results of causality test indicated that the better image for a hospital service quality will improve its patients' trust to the hospital. The consistency of service quality provide long-term benefits for the company by creating a positive perception of customer to the company. In turn, the positivity can lead establishing the patients' satisfaction. Furthermore, those who are satisfied with the hospital services will trust the hospital. They will also reuse the hospital services in the future. In conclusion, satisfaction will ultimately create a long-term relationship between the hospital and the patients through the existence of trust from the patients.

# CONCLUSION

The study aimed to test the impact of hospital image, service quality, and cost perception on patient satisfaction and trust in Andi Makkasau Parepare Hospital, Indonesia. Therefore, this study concludes that the hospital image does not guarantee to increase its patients' satisfaction. Otherwise, the variables that can increase patient satisfaction at a hospital are service quality and cost perception. So having excellent degree of service quality and more appropriate cost perception can improve patients' trust for a hospital. Then, the patients who are satisfied with a hospital service quality will affect their level of trust in the hospital. In particular, the patients' higher degree of satisfaction means their stronger trust on the hospital.

Furthermore, the results of this study bring practical implications that patient satisfaction can be improved only through excellent service quality and appropriate cost perception. While the patients' trust can also be enhanced through strong hospital appearance, excellent service quality, appropriate cost perception, and patients' greater satisfaction. Then, the patients who are able to assess stronger hospital performance, who

achieve a good service quality, and who feel the cost appropriateness will generate the patients' satisfaction and increase their trust to the hospital.

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