

***The Effect of Perceived Value, Brand Image, Satisfaction, Trust, and  
Commitment on Loyalty at XYZ Hospitals, Tangerang***

*Anggreini Oktavia Trisno\*, Margaretha Pink Berlianto\**

*\*Faculty of Management, Universitas Pelita Harapan*

*\*email: anggreinioktavia10@gmail.com*

**ABSTRACT**

*Patient loyalty is a significant aspect of marketing strategies in the health industry, including hospitals. Loyal patients will return for treatment and recommend the hospital to others, reducing marketing expenditure. Several factors can influence this attribute, such as satisfaction, perceived value, commitment, trust, and brand image. Therefore, this study aims to determine the effect of the independent variable, perceived value and brand image, on the dependent variable, such as loyalty.*

*Data were collected by distributing questionnaires via a google form to 261 respondents treated at XYZ Hospital, selected using a simple random sampling technique. The data collected were analyzed using partial least square-structural equation modeling (PLS-SEM) with the SmartPLS application. The results showed that brand image, commitment, and satisfaction have a positive impact on loyalty, brand image has a positive impact on satisfaction, perceived value has a positive impact on trust and satisfaction, and satisfaction has a positive impact on trust and commitment. Moreover, perceived value and trust do not positively impact the study.*

**Keywords:** *Loyalty, Perceived Value, Brand Image, Satisfaction, Trust*

**INTRODUCTION**

On March 11, 2020, the World Health Organization (WHO) declared COVID-19 a pandemic due to the increasing number of positive cases spread worldwide.<sup>1</sup> The COVID-19 pandemic has put the health industry under immense pressure and strict supervision, with a significant increase in patients and a decrease in medical services for other diseases. People avoided visiting health facilities due to the risk of being infected with the virus, which was relatively high in hospitals.<sup>2-4</sup>

All countries have implemented the New Normal, including Indonesia, enabling people to carry out daily activities while maintaining the recommended health

protocols. Implementing the New Normal encouraged people to be careful while conducting outdoor activities. Furthermore, people are eager to seek treatment in hospitals or other health facilities. Patient loyalty is an important element that can be influenced by satisfaction due to the patient's perception of the service quality provided by the hospital. When patients are satisfied with the treatment received, they will return and ultimately recommend the hospital to others.

Health care has shifted from a paternalistic to a patient-centered care approach. Therefore, healthcare providers must collaborate with patients, create an environment to gain positive experiences,

and build relationships. This passion-centered approach will enable healthcare providers to understand patients' needs better and engage them to achieve positive service outcomes. Patients have demonstrated the need for satisfaction and the right to demand the expected service. Satisfaction is obtained when the performance of services and healthcare providers meets or exceeds patients' expectations. It is one of the variables of concern used in marketing because it relates to value co-creation for service providers and customers.<sup>5</sup>

MacStravic reported that patients' loyalty is highly significant in a hospital's marketing strategy because they are sources of repeat business, potential users for new services, and positive spokespersons who provide recommendations to others. The existence of loyal patients reduces hospital advertising costs.<sup>6</sup>

Patients' assessment of health services is subjective, and recipients cannot describe the quality of these services, hence, there needs to be a proper expectation. Furthermore, patient evaluation is only a measure of perceived quality-based outcomes, not an objective item. The quality of health services is also intangible because of the variety of services provided. *Perceived service quality* is a consumer assessment that compares consumers' expectations with their perceptions of actual performance.<sup>7</sup>

Several studies focus on comparing satisfaction and loyalty in public and private hospitals.<sup>8-12</sup> The results of these studies indicate a strong, moderate correlation between the two variables.<sup>9</sup> This shows that healthcare providers must recognize the patients' needs capable of affecting their satisfaction and loyalty to improve service quality. Therefore, this study was conducted in a private hospital, due to the essential need for patient satisfaction and loyalty in the long term.

Apart from satisfaction, perceived value, a form of subjective evaluation by consumers of the products or services

received, is another factor that affects loyalty. This attribute can increase when consumers obtain satisfaction due to their good perceived value for the services provided. Moreover, strengthening the relationship between healthcare providers and patients can also increase satisfaction, perceived value, and loyalty.<sup>11,13</sup>

Trust in the health services provided by the hospital encourages established patients to revisit it for treatment. These are attitudinal and behavioral loyalties, encouraging patients to say positive things about the hospital to others. This can benefit hospitals due to its ability to reduce advertisement costs and attract new patients.<sup>14</sup> Commitment is one of the factors that affect the relationship with consumers, thereby making them committed or uncommitted. The relationship between the patient and the hospital can last for a long time, with commitment as a significant factor in loyalty. However, satisfaction does not always prompt a patient's commitment to the hospital.<sup>15,16</sup>

This study was conducted at XYZ Hospital, a private health center in Indonesia accredited by the Hospital Accreditation Commission (*KARS*). It is also the first hospital to have Joint Commission International (*JCI*) accreditation four times in Indonesia. The private hospital was chosen because previous studies on patient satisfaction and loyalty mostly focused on public hospitals and those owned by universities. The government does not fund private hospitals, hence, it gained profit by focusing on the quality of services provided, consequently allowing the patients to choose a hospital for treatment based on their perception of the facilities and its advantages. Some studies indicate that patients prefer private hospitals because they require services to get satisfied. For this reason, they prefer to spend more money to get the quality of services provided.<sup>17</sup>

Previous studies stated a relationship between patient satisfaction, commitment,

and perceived value to loyalty, as well as a relationship between satisfaction and commitment.<sup>11,18,19</sup> However, other studies indicate no relationship between patient satisfaction, commitment, and perceived value on loyalty.<sup>11,14,20</sup> In the study by Sha Liu et al., there is no direct relationship between patient satisfaction and loyalty.<sup>14</sup> This is different from the study by Dian A. Fitriani et al., which has p-value results between satisfaction and patient loyalty.<sup>11</sup> In addition, Dian A. Fitriani et al. investigated a relationship between perceived value, patient satisfaction, and patient loyalty. This study showed that perceived value had no direct impact on patient loyalty, with a p-value of 0.416.<sup>11</sup> Meanwhile, according to Debajani Sahoo and Achyut Telang, based on the study conducted at the bank points, perceived value has a direct relationship with loyalty.<sup>19</sup>

Another study by Antonio Carrizo M and Silva, conducted at a health facility in the cardiology department, discovered that the relationship between commitment and loyalty, as well as satisfaction and commitment, were rejected.<sup>20</sup> According to Ayhan Durmus et al., regarding satisfaction towards commitment, the results indicate a positive impact between the two variables.<sup>18</sup> Previous studies have different opinions regarding the perceived value, patient satisfaction, commitment, and loyalty. This study was conducted to determine the effect of perceived value, trust, patient satisfaction, and commitment to loyalty.

## RESEARCH METHOD

This is a quantitative study with a cross-sectional survey type used to test the hypothesis. Furthermore, a correlational method was used to determine the relationship between the dependent (loyalty) and independent (perceived value and brand) variables. This study was conducted to determine the independent variable's positive influence, perceived

value, and brand image on the dependent (loyalty).

The population was all those who had received outpatient treatment at the hospital. There are several criteria for selecting the respondents who will fill out the questionnaire, such as being more than or equal to 18 years old at the time of treatment, having been treated at least twice at the hospital, and having the primary disease is non-psychiatric. The sample was patients who had received outpatient treatment at XYZ Hospital in September 2022, selected using a non-probability and simple random sampling technique. The sample-to-item ratio, by multiplying five by forty to obtain the minimum number of 200 respondents.

Data were collected by distributing questionnaires directly to respondents through google form. The questionnaire comprises questions regarding the demographic profile of the respondents related to outpatient services at XYZ Hospital. It comprises forty statements, of which five answer choices have been provided based on a Likert scale describing the respondents' opinions on the existing statements.

The instruments used to conduct this study are described as follows: Perceived value is the patient's assessment of the health services received.<sup>23</sup> It comprises 14 indicators, including QV3: In my opinion, this hospital has an excellent standard of quality. QV5: Based on its quality, it will exist for the long term. QV6: This hospital provides services consistently. EV2: when I get sick, I will go to this hospital for treatment. EV3: I feel relaxed when I get treatment at this hospital. EV5: I feel comfortable getting treatment at this hospital. PV1: This hospital charges a fair price. PV2: it provides treatment according to the price. PV3: It provides excellent service for the price. PV4: The price charged is economically efficient. SV1: Being a patient at this hospital makes one feel welcome. SV2: Being a patient at this hospital improves the way others perceive

me. SV3: Being a patient in this hospital makes a good impression on others. SV4: Being a patient in this hospital can increase my acceptance in any social circle.<sup>24</sup>

Commitment is the participants' intention to maintain the relationship.<sup>16</sup> There are five indicators, including COM1: I will conduct my health treatment at this hospital in the future, COM2: I have a very strong commitment to this hospital, COM3: I want to maintain a relationship with this hospital, COM4: I am loyal to it, and COM5: My relationship with the hospital is important.<sup>25</sup>

Satisfaction is consumer perceptions by emotionally evaluating the quality and relationships in exchange (*trading*).<sup>26</sup> There are three indicators, including SAT1: I am satisfied with the health services provided at this hospital, SAT2: The health services performance exceeds my expectations, and SAT3: The health services performance is in accordance with my wishes.<sup>27</sup>

Trust is the consumer's desire to continue the relationship with the seller because of a positive attitude, accompanied by the consumer's willingness.<sup>16</sup> There are three indicators, including TRU1: I believe this hospital provides the best health care for me, TRU2: In my opinion, it is consistent in providing quality health services, and TRU3: I trust this hospital as a whole.<sup>28</sup>

Brand image is the perception of consumers towards a brand.<sup>29</sup> There are four indicators: BI1: This hospital is honest with patients, BI2: It has a clean environment, BI3: It has a relaxed environment, and BI4: It has a positive image.<sup>29</sup>

Loyalty is the patient's desire to return to health care providers, say positive

things about health services, and recommend them to others.<sup>16</sup> There are four indicators, including LOY1: I will say positive things about this hospital to others, LOY2: I recommend it to people who ask me for advice, LOY3: I will return to this hospital for treatment when needed, and LOY4: I consider it as my first choice.<sup>30</sup>

After the data collection process, the next step is statistical data analysis to answer study questions or test the existing hypotheses. This study uses a multivariate analysis method because several variables were estimated to have a relationship and correlation. The data analysis method in this study uses Partial Least Squares Structural Equation Modeling (PLS-SEM) with the Smart PLS version 3.2.9. PLS-SEM is an analytical method currently famous for estimating the path model with latent variables and their relationships. This study is a research study that considering a number of ethical approach that appropriate with the method of the study (002M/EC-Jan/I/2023).

## RESULT AND DISCUSSION

This is a quantitative study on perceived value, trust, commitment, brand image, and satisfaction towards loyalty in a private hospital located in Tangerang. Approximately 261 respondents willing to fill out a survey in September 2022 were included in the inclusion criteria. The value of outer loadings, which represent the existing construct, should be greater than 0.708,<sup>31</sup> although other studies accepted values >0.400.<sup>32,33</sup> A composite reliability value >0.70 indicates good reliability while judging from the Average Variance Extracted (AVE) value, it must be >0.5 to meet the convergence validity.<sup>31</sup>

**Table 1** Outer Loadings, Composite Reliability (CR), and AVE

Model Construct & Measurement Item	Loading	Model Construct & Measurement Item	Loading
Perceived Value (CR=0.947; AVE=0,564)		Commitment (CR=0.945; AVE=0.774)	
EV3	0.880	COM1	0.847
EV4	0.837	COM2	0.905

<b>EV5</b>	0.823	COM3	0.912
<b>PV1</b>	0.563	COM4	0.915
<b>PV2</b>	0.789	COM5	0.815
<b>PV3</b>	0.793	Brand Image (CR=0.889; AVE=0.729)	
<b>PV4</b>	0.499	BI2	0.857
<b>QV3</b>	0.770	BI4	0.788
<b>QV5</b>	0.639	BI5	0.912
<b>QV6</b>	0.789	Satisfaction (CR=0.929; AVE=0.814)	
<b>SV1</b>	0.810	SAT1	0.895
<b>SV2</b>	0.760	SAT2	0.895
<b>SV3</b>	0.748	SAT3	0.916
<b>SV4</b>	0.711	Loyalty (CR=0.921; AVE=0.744)	
<b>Trust (CR=0.958; AVE=0.884)</b>		LOY1	0.907
<b>TRU1</b>	0.932	LOY2	0.893
<b>TRU2</b>	0.942	LOY3	0.872
<b>TRU3</b>	0.946	LOY4	0.772

**Notes: CR=Composite Reliability; AVE=Average Variance Extracted**

Table 1 consists of the outer loadings results of all indicators of the variables and the results of discriminant validity. All indicators have a value >0.400, indicating that they are acceptable and reliable. Meanwhile, composite reliability >0.7, and an AVE value of >0.5, indicate that they meet convergence validity.

Table 2 shows the heterotrait-monotrait Ratio (HTMT) to assess discriminant validity, which must be  $\leq 0.90$ . In this study, all values in the table are  $\leq 0.90$ , indicating adequate discriminant validity.<sup>31</sup>

**Table 2 HTMT**

	<b>Brand Image</b>	<b>Commitment</b>	<b>Loyalty</b>	<b>Perceived Value</b>	<b>Satisfaction</b>	<b>Trust</b>
<b>Brand Image</b>						
<b>Commitment</b>	0.738					
<b>Loyalty</b>	0.851	0.882				
<b>Perceived Value</b>	0.893	0.762	0.806			
<b>Satisfaction</b>	0.900	0.811	0.890	0.887		
<b>Trust</b>	0.863	0.709	0.802	0.882	0.878	

Table 3 consists of VIF values used to assess collinearity statistics. In this study, there is a VIF value <5.0, indicating that

there is no problem with the collinearity statistic.<sup>31</sup>

**Table 3 Collinearity Statistic**

<b>Variables</b>	<b>Commitment</b>	<b>Loyalty</b>	<b>Satisfaction</b>	<b>Trust</b>
<b>Brand Image</b>	-	3.279	2.742	-
<b>Commitment</b>	-	2.370	-	-
<b>Loyalty</b>	-	-	-	-

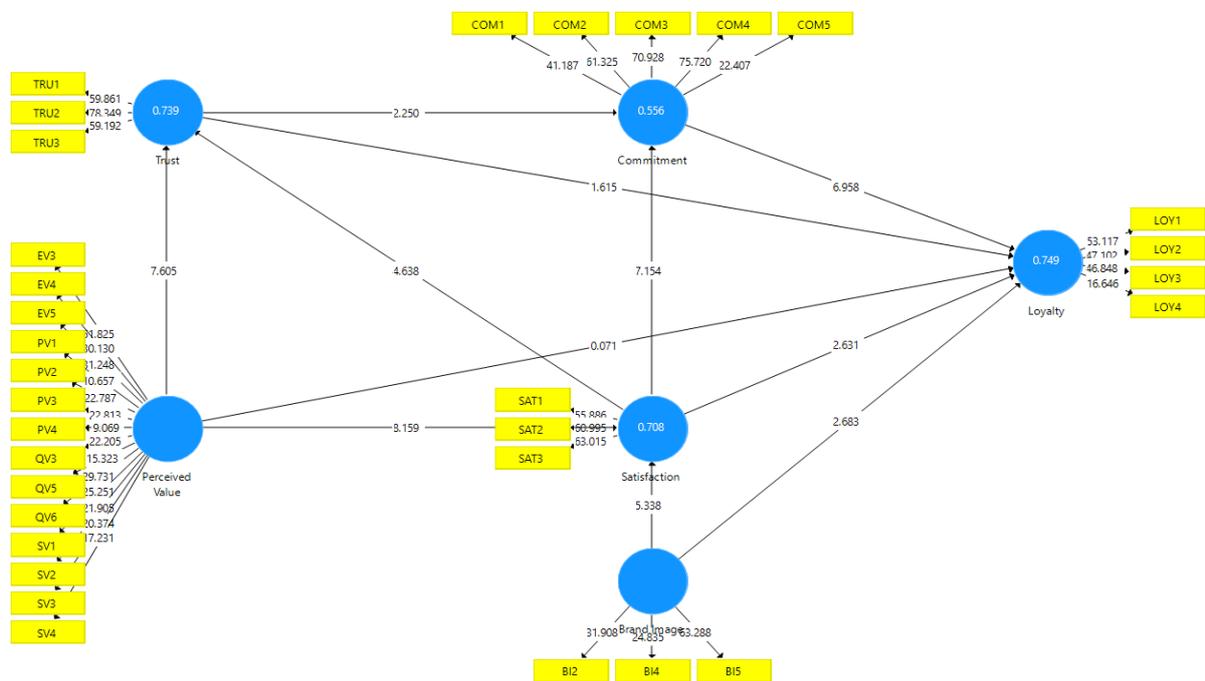
<b>Perceived Value</b>	-	4.731	2.742	2.960
<b>Satisfaction</b>	2.784	4.248	-	2.960
<b>Trust</b>	2.784	3.945	-	-

Table 4 shows the results of R square, which has three levels, namely 0.75, 0.50, and 0.25, categorized as substantial, moderate, and weak, respectively.<sup>31</sup> The higher the value of R square, the greater the number of predictor constructs. The results of all variables used in this study were at a moderate level. Five variables affect loyalty as much as 74.9%, while the other 25.1%

are influenced by factors not examined in this study.

**Table 4 R Square**

Variable	R square	Remarks
<b>Commitment</b>	0.556	Moderate
<b>Loyalty</b>	0.749	Moderate
<b>Satisfaction</b>	0.708	Moderate
<b>Trust</b>	0.739	Moderate



**Figure 1 Study Model**

Figure 1 shows six existing variables, their indicators, the direction of the existing hypotheses, the R-value, and t-statistics. A model from a previous study by Sha Liu et al. was modified and used in this study.<sup>14</sup>

Therefore, it must have a value higher than the t-table, which is 1.645, to show a positive impact on the variable. P-value < 0.05 indicates a significant relationship between variables.<sup>31</sup>

The table below shows the results of bootstrapping using a one-tail t-statistic.

**Table 5 Bootstrapping**

Path	Coefficient	t-value	P value	Conclusion
<b>Brand image → loyalty</b>	0.168	2.683	0.004	Supported
<b>Brand image → satisfaction</b>	0.356	5.338	0.000	Supported
<b>Perceived value → loyalty</b>	0.005	0.071	0.471	Not supported
<b>Perceived value → satisfaction</b>	0.530	8.159	0.000	Supported
<b>Perceived value → trust</b>	0.538	7.605	0.000	Supported

Path	Coefficient	t-value	P value	Conclusion
Satisfaction → commitment	0.576	7.154	0.000	Supported
Satisfaction → loyalty	0.251	2.631	0.004	Supported
Satisfaction → trust	0.362	4.638	0.000	Supported
Commitment → loyalty	0.418	6.958	0.000	Supported
Trust → commitment	0.199	2.250	0.012	Supported
Trust → loyalty	0.123	1.615	0.053	Not supported

Table 5 shows that there are nine supported pathways on t-value and p-value, including brand image to loyalty, brand image to satisfaction, commitment to loyalty, perceived value to satisfaction, perceived value to trust, satisfaction to commitment, and satisfaction to loyalty, satisfaction to trust, and trust to commitment. Two pathways are not supported, namely perceived value to loyalty and trust to loyalty, because their t-statistic value is less than the limit, i.e., 0.071 and 1.615, with a p-value greater than the limit, i.e., 0.471 and 0.053.

Study conducted by Dayan M et al. in the health industry in the United Arab Emirates state hospital showed that hospital image positively impacted patient loyalty.<sup>12</sup> Another study by Pinar Ozkan et al. supports the positive impact of bank image and loyalty carried out in the banking industry in Turkey.<sup>21</sup>

Assila Anis Asnawi et al. study in the health industry at a public hospital in Terangganu, Malaysia, revealed that hospital image positively affects patient satisfaction.<sup>10</sup> Another study by Dayan, M, et al. conducted in United Arab Emirates state government hospitals, showed that hospital image positively impacts patient satisfaction.<sup>12</sup>

However, this study provides results that are not significant and do not have a positive impact between perceived value and loyalty. It is similar to Dian A. Fitriani et al.'s study, indicating that perceived value did not directly impact patient loyalty.<sup>11</sup> This is different from several previous studies, which positively impacted the two variables in the health sector and telecommunications.<sup>13,34</sup> It is influenced by the differences in the industries used, such

as telecommunications in the healthcare industry in Turkey.

Perceived value has a significant positive effect on satisfaction. Other studies also support its positive relationship in the health sector and the café business sector<sup>11,13,35</sup>. Satisfaction will increase, assuming the perceived value rises.

Perceived value has a significant effect on trust, as supported by previous study in healthcare and the telecommunications industries and online learning platforms.<sup>8,34,36</sup> This indicates that the increase in perceived value raises trust in the hospital. There is a positive and significant relationship between satisfaction and commitment, which is supported by other study in the fields of healthcare in Turkey, and the plywood industry in Indonesia.<sup>18,37,38</sup>

Furthermore, there is a positive impact between satisfaction and loyalty. Other studies in several fields also support the positive impact between satisfaction and loyalty, such as in health, banking, e-commerce, cafe business, and the hospitality industry. Study conducted by Wenyi Lin carried out in the health industry at a dental clinic in Dongguan, Guangdong Province, China, states that satisfaction positively impacts loyalty.<sup>39</sup> Dayan M et al. conducted another similar study in the health industry in The United Arab Emirates state government hospital and obtained the same results.<sup>12</sup> Additionally, a survey by Pinar Özkan et al. conducted in the banking industry in Turkey supports a positive relationship between satisfaction and loyalty.<sup>21</sup>

Patient satisfaction has a positive and significant impact on trust, with a p-value of 0.000 and a t-statistic of 5.104. This is in

accordance with other studies in the healthcare industry, which support the positive impact between the two variables.<sup>8,14,18</sup>

The relationship between commitment and loyalty has a p-value of 0.000 and a t-statistic of 6.958. Commitment has a positive and significant relationship with loyalty in this study, as supported by other health, branded retail, and plywood studies.<sup>15,38,40</sup>

This study obtained supported results on the relationship of trust and commitment with a p-value of 0.012 and a t statistic of 2.249. This is in accordance with other studies, which also support a positive and significant relationship between trust and commitment conducted in the telecommunications and aviation sectors.<sup>34,41</sup>

The positive relationship between trust and loyalty in this study was rejected because the p-value and t-statistic were 0.095 and 1.313, respectively. These values differ from other studies which accept the relationship between the two variables, such as in the health sector and e-commerce.<sup>18,42</sup> Furthermore, this study does not support this relationship due to differences in industry and the country where it was conducted. Other studies on the coal industry also reject the relationship between the two variables. A study in the health industry at Karya Bhakti Dipa Jakarta Clinic, Indonesia, showed that trust does not significantly impact loyalty. The study revealed that it takes commitment and a sense of responsibility toward the patient to generate trust.<sup>43,44</sup>

## CONCLUSION

In conclusion, brand image, commitment, and satisfaction positively affected patient loyalty. This is in addition to perceived value, which has a positive effect on satisfaction and trust. Brand image positively affects satisfaction, which positively affects trust and commitment. Furthermore, trust positively affects commitment, while perceived value and

trust have a positive and insignificant effect on loyalty. This study can be feedback for hospitals in increasing patient loyalty. A subsequent study is needed to determine the independent and mediating variables affecting patient loyalty and hospital service quality.

All hospital staff must conduct training to improve and understand the quality of health and non-health services. Training is also essential to provide services according to the wishes and expectations of patients. This can help improve the hospital's image and increase patient satisfaction and loyalty while recommending it to others.

## ACKNOWLEDGMENT

The authors are grateful to all the persons and institutions who contributed to this study, such as the XYZ Hospital, supervisor, and friends. The authors are also grateful to UPH, who helped issue letters and provide information.

## REFERENCES

1. World Health Organization. International Labour Organization. Coronavirus Disease ( Covid-19) Outbreak : Rights, Roles and Responsibilities of Health Workers, Including Key Considerations for Occupational Safety and Health. World Heal Organ [Internet]. 2019;1–3. Available from: [https://www.who.int/docs/default-source/coronaviruse/who-rights-roles-respon-hw-covid-19.pdf?sfvrsn=bcabd401\\_0](https://www.who.int/docs/default-source/coronaviruse/who-rights-roles-respon-hw-covid-19.pdf?sfvrsn=bcabd401_0)
2. Deloitte. 2022 Global Health Care Outlook: Are we finally seeing the long-promised transformation? Deloitte [Internet]. 2021;1–52. Available from: <https://www2.deloitte.com/content/dam/Deloitte/global/Documents/Life-Sciences-Health-Care/gx-health-care-outlook-Final.pdf>
3. Roy S. Economic Impact of Covid-19 Pandemic. Preprint [Internet].

- 2020;29(07):1–19. Available from: [https://www.researchgate.net/publication/343222400\\_ECONOMIC\\_IMPACT\\_OF\\_COVID-19\\_PANDEMIC](https://www.researchgate.net/publication/343222400_ECONOMIC_IMPACT_OF_COVID-19_PANDEMIC)
4. World Health Organization, International Labour Organization. Preventing and mitigating COVID-19 at work [Internet]. Preventing and Mitigating COVID-19 at Work: Policy Brief. 2021. p. 1–21. Available from: <https://www.who.int/publications/i/item/WHO-2019-nCoV-workplace-actions-policy-brief-2021-1>
  5. Osei-Frimpong K, Asante K, Nkrumah M, Owusu-Frimpong N. Developing customer loyalty in healthcare. In: Health Service Marketing Management in Africa [Internet]. Routledge; 2019. p. 179–97. Available from: [https://www.researchgate.net/publication/337826576\\_Developing\\_Customer\\_Loyalty\\_in\\_Healthcare](https://www.researchgate.net/publication/337826576_Developing_Customer_Loyalty_in_Healthcare)
  6. MacStravic RS. Loyalty of hospital patients: A vital marketing objective. *Health Care Manage Rev* [Internet]. 1987;12(2):23–30. Available from: <https://pubmed.ncbi.nlm.nih.gov/3583719/#:~:text=Hospitals must strive for patient,word-of-mouth advertising.>
  7. Sanil M, Eminer F. An integrative model of patients' perceived value of healthcare service quality in North Cyprus. *Arch Public Heal* [Internet]. 2021;79(1):1–16. Available from: [https://doi.org/10.1186/s13690-021-00738-6%0A\(2021\)](https://doi.org/10.1186/s13690-021-00738-6%0A(2021))
  8. Nguyen NX, Tran K, Nguyen TA. Impact of service quality on inpatients' satisfaction, perceived value, and customer loyalty: A mixed-methods study from a developing country. *Patient Prefer Adherence* [Internet]. 2021;15(November):2523–38. Available from: <https://doi.org/10.2147/PPA.S333586>
  9. Setyawan FEB, Supriyanto S, Ernawaty E, Lestari R. Understanding patient satisfaction and loyalty in public and private primary health care. *J Public health Res.* 2020;9(2):140–3.
  10. Asnawi AA, Awang Z, Afthanorhan A, Mohamad M, Karim F. The influence of hospital image and service quality on patients' satisfaction and loyalty. *Manag Sci Lett.* 2019;9(6):911–20.
  11. Fitriani DA, Pasinringi SA, Irwandy I, Amqam H. The Effect of Perceived Value Toward Loyalty Through Patient Satisfaction in Hasanuddin University Hospital. *Enferm Clin* [Internet]. 2020;30(S2):408–11. Available from: <https://doi.org/10.1016/j.enfcli.2019.11.008>
  12. Dayan, M., Al Kuwaiti, I.A., Husain, Z., Ng, P.Y. and Dayan A. Factors influencing patient loyalty to outpatient medical services: an empirical analysis of the UAE's government healthcare system. *Int J Qual Reliab Manag* [Internet]. 2021;1–46. Available from: <https://doi.org/10.1108/IJQRM-11-2020-0373>
  13. Özer L, Başgöze P, Karahan A. The Association Between Perceived Value and Patient Loyalty in Public University Hospitals in Turkey. *Total Qual Manag Bus Excell.* 2016;28(7–8):1–19.
  14. Liu S, Li G, Liu N, Hongwei W. The Impact of Patient Satisfaction on Patient Loyalty with the Mediating Effect of Patient Trust. *Inq (United States).* 2021;58:1–11.
  15. Afridi SA, Haider M, Shahjehan A. Customers' Loyalty through Healthcare Quality; Mediating Role of Customers' Commitment: A Comparative Study of Public and Private Hospitals. *City Univ Res J* [Internet]. 2020;10(1):27-46. Available from: [https://www.researchgate.net/publication/340887316\\_Customers'\\_Loyalty\\_through\\_Healthcare\\_Quality\\_Mediating\\_Role\\_of\\_Customers'\\_Commitment\\_A\\_Comparative\\_Study\\_of\\_Public\\_and\\_Private\\_Hospitals](https://www.researchgate.net/publication/340887316_Customers'_Loyalty_through_Healthcare_Quality_Mediating_Role_of_Customers'_Commitment_A_Comparative_Study_of_Public_and_Private_Hospitals)

16. Huang I-C, Du P-L, Lin L-S, Liu T-Y, Lin T-F, Huang W-C. The Effect of Perceived Value, Trust, and Commitment on Patient Loyalty in Taiwan. *Inq (United States)* [Internet]. 2021;58:1–9. Available from: <https://doi.org/10.1177/00469580211007217>
17. Fatima T, Malik SA, Shabbir A. Hospital healthcare service quality, patient satisfaction and loyalty: An investigation in context of private healthcare systems. *Int J Qual Reliab Manag* [Internet]. 2018;35(6):1195–214. Available from: <https://doi.org/10.1108/IJQRM-02-2017-0031>
18. Durmuş A, Akbolat M. The Impact of Patient Satisfaction on Patient Commitment and the Mediating Role of Patient Trust. *J Patient Exp*. 2020;7(6):1642–7.
19. Sahoo D, Telang A. Exploring the Value Dimensions and Their Impact on Customer Loyalty in Indian Banking Services. *Theor Econ Lett*. 2019;09(06):1938–54.
20. Moreira AC, Silva PM. The Trust-Commitment Challenge in Service Quality-Loyalty Relationships. *Int J Health Care Qual Assur*. 2015;28(3):253–66.
21. Özkan P, Süer S, Keser İK, Kocakoç İD. The effect of service quality and customer satisfaction on customer loyalty: The mediation of perceived value of services, corporate image, and corporate reputation. *Int J Bank Mark* [Internet]. 2020;38(2):384–405. Available from: <https://doi.org/10.1108/IJBM-03-2019-0096>
22. Juliana, Pramezwarly A, Patricia V, Lewinsky S, Dhammika Putra H. Understanding the Determinants of Hotel Consumer Trust : A Perspective Commitment-Trust Theory. *Int J Soc Manag Stud* [Internet]. 2021;02(02):114–21. Available from: <http://www.ijosmas.org>
23. Wartiningsih M, Supriyanto S, Widati S, Ernawaty E, Lestari R. Health promoting hospital: A practical strategy to improve patient loyalty in public sector. *J Public health Res*. 2020;9(2):165–8.
24. Sweeney JC, Soutar GN. Consumer perceived value: The development of a multiple item scale. *J Retail* [Internet]. 2001;77(2):203–20. Available from: <https://www.sciencedirect.com/science/article/abs/pii/S0022435901000410>
25. Akekue-Alex, Nennaaton. Kalu SE. Antecedents of Relationship Quality on Commitment in The Health-care Sector in Port Harcourt, Nigeria. *Br J Mark Stud* [Internet]. 2017;5(4):17–31. Available from: [www.eajournals.org](http://www.eajournals.org)
26. Huang CH, Wu HH, Lee YC, Li L. What Role Does Patient Gratitude Play in the Relationship Between Relationship Quality and Patient Loyalty? *Inquiry*. 2019;56(1018):1–8.
27. Sumaedi S, Bakti IGMY, Rakhmawati T, Astrini NJ, Widiyanti T, Yarmen M. The empirical study on patient loyalty: The role of trust, perceived value, and satisfaction (a case study from Bekasi, Indonesia). *Clin Gov An Int J*. 2014;19(3):269–83.
28. Kantsperger R, Kunz WH. Consumer trust in service companies: a multiple mediating analysis. *Manag Serv Qual An Int J* [Internet]. 2010;20(1):4–25. Available from: <https://www.emerald.com/insight/content/doi/10.1108/09604521011011603/full/html>
29. Chahal H, Bala M. Significant components of service brand equity in healthcare sector. *Int J Health Care Qual Assur*. 2012;25(December):343–62.
30. Choi BJ, Kim HS. The impact of outcome quality, interaction quality, and peer-to-peer quality on customer satisfaction with a hospital service. *Manag Serv Qual* [Internet]. 2013;23(3):188–204. Available from:

- <https://www.emerald.com/insight/content/doi/10.1108/09604521311312228/full/html>
31. Sarstedt M, Ringle CM, Hair JF. Partial Least Squares Structural Equation Modeling [Internet]. Homburg et. Handbook of Market Research. Switzerland: Springer Nature Switzerland AG; 2021. Available from: [https://doi.org/10.1007/978-3-319-05542-8\\_15-2](https://doi.org/10.1007/978-3-319-05542-8_15-2)
  32. Hulland J. Use of Partial Least Squares (PLS) in Strategic Management Research: a Review of Four Recent Studies. *Strateg Manag J* [Internet]. 1999;20:195–204. Available from: [https://doi.org/10.1002/\(SICI\)1097-0266\(199902\)20:2%3C195::AID-SMJ13%3E3.0.CO;2-7](https://doi.org/10.1002/(SICI)1097-0266(199902)20:2%3C195::AID-SMJ13%3E3.0.CO;2-7)
  33. Ertz M, Karakas F, Sarigöllü E. Exploring pro-environmental behaviors of consumers: An analysis of contextual factors, attitude, and behaviors. *J Bus Res* [Internet]. 2016;60:1–30. Available from: [https://www.researchgate.net/publication/304344305\\_Exploring\\_pro-environmental\\_behaviors\\_of\\_consumers\\_An\\_analysis\\_of\\_contextual\\_factors\\_attitude\\_and\\_behaviors](https://www.researchgate.net/publication/304344305_Exploring_pro-environmental_behaviors_of_consumers_An_analysis_of_contextual_factors_attitude_and_behaviors)
  34. Kungumapriya A, Malarmathi K. The Role of Service Quality, Perceived Value and Trust on Calculative Commitment and Loyalty Intention. *Chinese Bus Rev* [Internet]. 2018;17(6):287–301. Available from: [https://www.researchgate.net/publication/271929491\\_The\\_Role\\_of\\_Service\\_Quality\\_Perceived\\_Value\\_and\\_Relationship\\_Quality\\_in\\_Enhancing\\_Customer\\_Loyalty\\_in\\_the\\_Travel\\_Agency\\_Sector](https://www.researchgate.net/publication/271929491_The_Role_of_Service_Quality_Perceived_Value_and_Relationship_Quality_in_Enhancing_Customer_Loyalty_in_the_Travel_Agency_Sector)
  35. Kusumawati A, Rahayu KS. The effect of experience quality on customer perceived value and customer satisfaction and its impact on customer loyalty. *TQM J*. 2020;32(6):1525–40.
  36. Sharma VM, Klein A. Consumer perceived value, involvement, trust, susceptibility to interpersonal influence, and intention to participate in online group buying. *J Retail Consum Serv* [Internet]. 2020;52(September 2019). Available from: <https://doi.org/10.1016/j.jretconser.2019.101946>
  37. Uysal B, Yorulmaz M. How Patient Loyalty Affects Patient Satisfaction. *Athens J Heal Med Sci*. 2020;7(1):19–36.
  38. Samudro A, Sumarwan U, Simanjuntak M, Yusuf EZ. How Commitment, Satisfaction, and Cost Fluctuations Influence Customer Loyalty. *GATR J Manag Mark Rev*. 2019;4(2):115–25.
  39. Lin W, Yin W. Impacts of service quality, brand image, and perceived value on outpatient’s loyalty to China’s private dental clinics with service satisfaction as a mediator. *PLoS One* [Internet]. 2022;17(6 June):1–9. Available from: <http://dx.doi.org/10.1371/journal.pone.0269233>
  40. Khan I, Hollebeek LD, Fatma M, Islam JU, Riiivits-Arkonsuo I. Customer experience and commitment in retailing: Does customer age matter? *J Retail Consum Serv* [Internet]. 2020;57(July):1–9. Available from: <https://doi.org/10.1016/j.jretconser.2020.102219>
  41. Matikiti R, Mpinganjira M, Roberts-Lombard M. Service recovery satisfaction and customer commitment in the airline business: An emerging African market perspective. *African J Econ Manag Stud* [Internet]. 2020;11(1):91–108. Available from: [www.emeraldinsight.com/2040-0705.htm](http://www.emeraldinsight.com/2040-0705.htm)
  42. Wilson N. Trust Vs Satisfaction: Which One is More Important in Mediating the Impact of Website Quality Towards Customer Loyalty in The Indonesian E-Commerce Industry? *Adv Econ Bus Manag Res*.

- 2020;151:10–3.
43. Mubarok ES, Kurniawan A, Hidayat R, Hia AK, Bandawaty E. Determinant of Customer of Loyalty in Healthcare Industry : Mediating Role of Customer Trust. *Ilomata Int J Manag* [Internet]. 2022;3(1):44–64. Available from: <https://doi.org/10.52728/ijjm.v3i1.406>
44. Saprianto, Hudayah S, Abidin Z. The Effect of Product Quality and Corporate Image on Customer Loyalty through Customer Trust in PT . Insani Baraperkasa. *Int J Bus Manag Invent* [Internet]. 2021;7(8):1–9. Available from: [https://repository.unmul.ac.id/bitstream/handle/123456789/40163/The Effect of Product Quality and Corporate Image on Customer Loyalty through Customer Trust in PT. Insani Baraperkasa.pdf?sequence=1](https://repository.unmul.ac.id/bitstream/handle/123456789/40163/The%20Effect%20of%20Product%20Quality%20and%20Corporate%20Image%20on%20Customer%20Loyalty%20through%20Customer%20Trust%20in%20PT.%20Insani%20Baraperkasa.pdf?sequence=1)