Perception Analysis of Installation Services Quality on Patient Satisfaction at Bhayangkara Hospital Level II Medan

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Abstract
The purpose of this research is to analyze the influence of patient perception about professionalism, efficiency, patient safety and access of service to patient satisfaction at Inpatient Bhayangkara TK II Hospital Medan. The type of research used in this study is an analytical survey (explanatory research) with Cross-Sectional Study study design. The number of samples in this study were 54 patients who got service at the inpatient installation. Sampling technique by Accidental Sampling. The result of this research shows that the result of bivariate analysis to select multivariate analysis modeling candidate is statistically tested by using chi square test found that from the four variables all entered as multivariate modeling candidate. Then from the result of multivariate statistic test, it was found that p value (Sig) of professional variable (p = 0.024), efficiency (p = 0.025), access (p = 0.022) and patient safety (p = 0.048) which is significant to patient satisfaction at Inpatient Installation of Bhayangkara TK II Hospital Medan. The conclusion of the research shows that there is influence of service quality of inpatient installation which consist of profession, efficiency, access to service and patient safety to patient satisfaction. It is hoped that this research can make an actual input for health workers and the hospital. It is recommended that health workers carry out their duties according to the work SOP. Improve internal communication so that cooperation between health partners can run well in improving service quality and patient satisfaction.

Introduction
Quality of service is defined as the difference between customer expectations and reality received. Hospitals provide the same types of services, but they do not provide the same quality of service. Meanwhile, customers are now smarter to choose the alternatives offered and increase the level of service that has raised their expectations (Setyaningsih, 2013). Research on health system satisfaction, which is largely comparative in nature, has identified ways to improve health, reduce costs and implement reforms (Özaltin, 2009).

According to the 2013 Basic Health Research (Riskesdas) survey, the national use of the community for hospital services for inpatient care in Indonesia was 2.3%. The province with the highest was Yogyakarta 4.4%, while the lowest was Bengkulu, Lampung and West Kalimantan at 0.9%. The source of costs used for inpatient care at all health facilities in Indonesia is still dominated by out of pocket expenses, namely 53.5%, then Jamkesmas 15.6%, Jamkesda 6.4%, Askes / ASABRI 5.4 %, Jamsostek 3.5%, private health insurance 1.8% and corporate health benefits 4.0%. Utilization of Regional General Hospitals (RSUD) in North
Sumatra Province is also still low, under 60%, this is shown by the utilization rate of BOR beds (Bed Occupancy Rate) at 29 RSUD units in North Sumatra Province, which ranges from 9.0-86.3%. The lowest utilization of the bed was in the Sultan Sulaiman Hospital (Serdang Bedagai Regency), which was 9.0%, while the highest was at the Lubuk Pakam Regional Hospital (Deli Serdang Regency), which was 86.3% with the Ministry of Health standard of 60-80% (Kemenkes RI, 2013) To increase patient visits to the hospital, the hospital must be able to display and provide satisfaction to consumers (Irawan, 2010).

The quality of health services is supported by many factors that exist in the hospital as a system. These factors are hospital management, health personnel, financing, health facilities and technology used, as well as the interaction of activities that are driven through certain processes and procedures by utilizing existing resources to produce services or services (Robbin, 2014; Azwar, 1996).

RumahSakitBhayangkara Level II Medan is one of the Level II hospitals owned by the National Police in addition to Bandung, Surabaya and Makassar. Inpatient installation. The service has 105 sleeping places consisting of VIP, Class I, II and III rooms. One of the factors that can affect the living conditions at Bhayangkara Hospital are the facilities and infrastructure as well as the services provided by the health workers in the horizon room.

Methods

The type of research used is exploratory research (explanation) with a cross-sectional study design. The population in this study were all patients who were admitted to the inpatient unit of the Bhayangkara Level II Hospital in Medandarbulanoktober 2017 - March 2018, totaling 1,396 patients with an average of 116 patients per month. The sample in this study was determined based on the sample determination formula for survey research. The sample size was calculated using the Slovin formula as many as 54 patients.

Result and Discussion

Univariate Analysis

Characteristics of Respondents

The characteristics of the respondents in this study consisted of: age, sex, education and occupation.

Table 1. Characteristics of Respondents Based on Age, Gender, Occupation and Income

| Characteristics                          | F  | %   |
|-----------------------------------------|----|-----|
| **Age**                                 |    |     |
| 18-30 years old                         | 19 | 35,2|
| 18-31 31-40 years old                   | 15 | 27,8|
| 18-32 41-50 years old                   | 12 | 22,2|
| 18-33 >51 years old                     |  8 | 14,8|
| **Sex**                                 |    |     |
| Male                                    | 27 | 50,0|
| Female                                  | 27 | 50,0|
| **Educational Level**                   |    |     |
| Low (Elementary School/Junior School)   |  5 |  9,3|
| Moderate (High/Vocational School)       | 30 | 55,6|
| High (Diploma/Undergraduate/Master)     | 19 | 35,2|
| **Employment**                          |    |     |
| House Wife                              | 12 | 22,2|
| Entrepreneur                            | 15 | 27,8|
| Private employees                       | 15 | 27,8|
Based on table 1, it is found that the age group of respondents is the greatest at 18-30 years old as many as 19 people, while the least age group is in the age group > 51 years, which is 8 people. Then there were 27 male and female respondents. For the level of education the most at the moderate level of education were 30 people, while the least at the low level of education was 5 people. For jobs, the most number of jobs in the group of self-employed and self-employed is 15 people, while for the rest, namely House wives and Civil Servants, there are 12 people.

Table 2. Distribution of categories based on Professional Dimensions

| Category   | Amount (people) | Percentage (%) |
|------------|-----------------|----------------|
| Good       | 43              | 79.6           |
| Less Good  | 11              | 20.4           |
| Total      | 54              | 100            |

In Table 2, the distribution of measurement results in the professional dimension is then categorized. The professional dimension in the good category was 43 patients (79.6%). While in the less good category 11 patients (20.4%).

Table 3. Distribution of respondents based on the Dimension of Efficiency

| Category     | Amount (people) | Percentage (%) |
|--------------|-----------------|----------------|
| Good         | 43              | 79.6           |
| Less Good    | 11              | 20.4           |
| Total        | 54              | 100            |

In Table 3, it can be seen that the distribution of the measurement results of the efficiency dimensions is then categorized. Dimensions of efficiency in the good category were 43 patients (79.6%). While in the less good category 11 patients (20.4%).

Table 4. Distribution of respondents based on Dimensions of Access

| Category    | Amount (people) | Percentage (%) |
|-------------|-----------------|----------------|
| Good        | 43              | 79.6           |
| Less Good   | 11              | 20.4           |
| Total       | 54              | 100            |

In Table 4, it can be seen that the distribution of measurement results for the dimensions of the service is then categorized. Dimension Access in the good category was 43 patients (79.6%). While in the less good category 11 patients (20.4%).

Table 5. Distribution of respondents based on satisfaction

| Category     | Amount (People) | Percentage (%) |
|--------------|-----------------|----------------|
| Satisfied    | 42              | 77.8           |
| Less Satisfied | 12            | 22.2           |
| Total        | 54              | 100            |

In Table 5, it can be seen that the distribution of the measurement results of the Patient Satisfaction variable is then categorized. The satisfaction variable in the satisfied category was 42 patients (77.8%). Meanwhile, in the dissatisfied category, there were 12 patients (22.2%).
Bivariate Analysis

**Relationship of Profession with Patient Satisfaction**

Table 6. Distribution of the Relationship between Profession and Satisfaction

| Variable  | Satisfied | Less Satisfied | Total | p (Sig) |
|-----------|-----------|----------------|-------|---------|
|           | f | %   | f | %   | N | %     |
| Profession|     |      |    |      |    |        |
| Good      | 38 | 70,4 | 5  | 9,3  | 43 | 79,6  |
| Less Good | 4  | 7,4  | 7  | 13,0 | 11 | 20,4  |
| Total     | 42 | 77,8 | 12 | 22,2 | 54 | 100   |

Based on table 6, for the professional dimension, it is known that of the 43 patients (79.6%) who stated the professional dimension in the good category who expressed satisfaction, 38 people (70.4%) and less satisfied were 5 people (9.3%). Then, from 11 patients (20.4%) who stated the professional dimension in the less good category, 4 people (7.4%) expressed dissatisfaction and 7 people (13.0%) were dissatisfied. Based on the Chi-Square statistical test, the value of \( p = 0.001 \) means that there is a significant relationship between the professional dimension and patient satisfaction.

**Relationship Efficiency with Patient Satisfaction**

Table 7. Distribution of Efficiency-Satisfaction Relationship

| Variable  | Satisfied | Less Satisfied | Total | p (Sig) |
|-----------|-----------|----------------|-------|---------|
|           | f | %   | f | %   | N | %     |
| Efficiency|     |      |    |      |    |        |
| Good      | 39 | 72,2 | 4  | 7,4  | 43 | 79,6  |
| Less Good | 3  | 5,6  | 8  | 14,8 | 11 | 20,4  |
| Total     | 42 | 77,8 | 12 | 22,2 | 54 | 100   |

Based on table 7, for the efficiency dimension, it is known that of the 43 patients (79.6%) who were in the good category, 39 people (72.2%) expressed satisfaction and 4 (7.4%) were dissatisfied. Then, out of 11 patients (20.4%) who stated that the efficiency dimensions were less good, 3 people (5.6%) expressed satisfaction and 8 (14.8%) were dissatisfied. Based on the Chi-Square statistical test, it was obtained that the value of \( p = 0.000 \) means that there is a significant relationship between the dimensions of efficiency and patient satisfaction.

**Relationship between Esther and Service and Patient Satisfaction**

Table 8. Distribution of Access to Satisfaction Relationship

| Variable  | Satisfied | Less Satisfied | Total | p (Sig) |
|-----------|-----------|----------------|-------|---------|
|           | f | %   | f | %   | N | %     |
| Access    |     |      |    |      |    |        |
| Good      | 37 | 68,5 | 6  | 11,1 | 43 | 79,6  |
| Less Good | 5  | 9,3  | 6  | 11,1 | 11 | 20,4  |
| Total     | 42 | 77,8 | 12 | 22,2 | 54 | 100   |

Based on table 8, for the access dimension, it is known that of the 43 patients (79.6%) who stated the access dimension in the good category who expressed satisfaction, 37 people (68.5%) and less satisfied were 6 people (11.1%). Then, of the 11 patients (20.4%) who stated the dimension of access in the less good category, 5 people (9.3%) expressed dissatisfaction and 6 people (11.1%) were dissatisfied. Based on the Chi-Square statistical test, it was obtained \( p \) value = 0.013, which means that there is a significant relationship between the dimensions of access and patient satisfaction.
**Relationship between safety and patient satisfaction**

Table 9. Distribution of the Safety-Satisfaction Relationship

| Variable  | Satisfied | Less Satisfied | Total | p (Sig) |
|-----------|-----------|----------------|-------|---------|
|           | f         | %              | f    | %      | N     | %   |
| Safety    |           |                |       |         |       |     |
| Good      | 39        | 72.2           | 6    | 11.1   | 45    | 83.3 |
| Less Good | 3         | 5.6            | 6    | 11.1   | 9     | 16.7 |
| Total     | 42        | 77.8           | 12   | 22.2   | 54    | 100  |

Based on table 9, for the safety dimension, it is known that of the 45 patients (83.3%) who stated the safety dimension in the good category who expressed satisfaction were 39 people (72.2%) and 6 people were dissatisfied (11.1%). Then from 9 patients (16.7%) who stated the safety dimension in the less good category who expressed satisfaction were 3 people (5.6%) and 6 people were dissatisfied (11.1%). Based on the Chi-Square statistical test, the value of $p = 0.02$ was obtained, which means that there is a significant relationship between the safety dimension and patient satisfaction.

**Multivariate Analysis**

Used to test the relationship of more than two variables, the analysis used the precedence in which there are independent and dependent variables using a multivariate statistical test model of multiple logistic regression. Multivariate analysis was carried out to see several variables that together have an effect on satisfaction. The variables included in the multiple logistic regression test are those that have a $p$ value <0.25 where the results of the selection of these variables can be seen in the following Table 4:15.

Table 10. Independent Variable Candidate Test Results

| Variable  | Value Sig (p) | Nilai Exp.B |
|-----------|---------------|-------------|
| Profession| 0.001         | 13,300      |
| Efficiency| 0.000         | 26,000      |
| Access    | 0.008         | 7,400       |
| Safety    | 0.002         | 13,000      |

Based on table 10, it can be seen that of the four independent variables that were tested by the candidate, it was found that the four independent variables had a $p$ value <0.25. Thus, the variables that entered the multivariate test were professional variables, efficiency, access and safety.

When viewed from the Exp B value obtained, the Exp B value for Professionalism is 13,300, then Profession has the possibility of 13.3 times affecting patient satisfaction. The Exp B Efficiency value is 26,000, so Efficiency has the possibility of 26 times affecting patient satisfaction. Value of Exp B Access to service is 7,400, so that access to service has the possibility of 7.4 times affecting the patient’s return visit interest. Then the Exp B Safety value is 13,000 then Safety has the possibility of 13 times affecting patient satisfaction.

Table 11. Logistic Regression Test Results Stage I, namely the Effect of Professional, Efficiency, Access and Safety variables on patient satisfaction in the Inpatient Installation of Bhayangkara Hospital TK II Medan.

| Variable | B | p value | Exp (B) | 95% CI |
|----------|---|---------|---------|--------|
|          |   |         |         | Lower  |
|          |   |         |         | Upper  |
Table 11 shows that the logistic regression test with the enter method at the first stage showed that the access variable had the greatest significant value and had no effect on patient satisfaction in the Inpatient Installation of Bhayangkara Hospital: Level II Medan. The second stage of the access variable is excluded because it has a p value of 0.335 > 0.05, the results are as follows:

Table 12. Logistic Regression Test Results Stage II, namely the influence of professional, efficiency and safety variables on patient satisfaction in the Inpatient Installation of Bhayangkara Hospital Level II Medan.

| Variable          | B     | p value | Exp (B) | 95% CI        |
|-------------------|-------|---------|---------|---------------|
|                   |       |         |         | Lower | Upper         |
| Stage II          |       |         |         |       |               |
| Profession        | 2.551 | 0.050   | 12.816  | 1,001 | 164,078       |
| Efficiency        | 3.463 | 0.005   | 31.928  | 2.773 | 367,559       |
| Patient_safety    | 3.315 | 0.015   | 27.514  | 1.923 | 393,723       |
| Constant          | -13.037 | 0.001  | 0.000   |       |               |

Table 12 shows that the logistic regression test with the enter method at the second stage showed that the professional variable had the greatest significance value and had no effect on patient satisfaction in the Inpatient Installation of Bhayangkara Hospital Level II Medan. The third stage of the professional variable is excluded because it has a p value of 0.050 > 0.05, the results are as follows:

Table 13. Logistic Regression Test Results Stage III, namely the effect of efficiency and safety variables on patient satisfaction in the Inpatient Installation of Bhayangkara Hospital Level II Medan.

| Variable          | B     | p value | Exp (B) | 95% CI        |
|-------------------|-------|---------|---------|---------------|
|                   |       |         |         | Lower | Upper         |
| Stage III         |       |         |         |       |               |
| Efficiency        | 3.373 | 0.001   | 29.161  | 4.111 | 206,828       |
| Patient Safety    | 2.720 | 0.011   | 15.178  | 1.855 | 124,191       |
| Constant          | -9.077 | 0.000  | 0.000   |       |               |

Table 13 shows that the logistic regression test with the enter method at the third stage showed that the efficiency and patient safety variables were significant variables and had an effect on patient satisfaction in the Inpatient Installation of Bhayangkara Hospital TK II Medan. The efficiency variable has a sig value of 0.001 with Exp (B) = 29.161, the patient safety variable has a sig value of 0.011 with Exp (B) = 15.178. The variable that has the greatest (most dominant) effect on patient satisfaction is the efficiency variable which has the highest Exp (B) value, namely 29.161 with a regression coefficient (B) of 3.373 compared to the patient safety variable. The value of Exp (B) 29.161 on efficiency means that the efficiency of service has an effect of 29 times in providing satisfaction to the patient.

The Influence of Profession on Satisfaction

The results of the linear regression analysis show that the professional dimension is the dimension that has the most influence on patient satisfaction at Bhayangkara Medan Hospital. Because for the patient that the doctor knows best about the process of healing the disease in
the patient. So that the better the doctor's service is felt by the patient, the higher the level of satisfaction of the patient. Doctors who are able to provide and provide clear and detailed information regarding the treatment being carried out by the patient will satisfy the patient, who in the next stage will attract the interest of the customer to reuse when he needs the same services.

**Effect of Efficiency on Return Visit Interest**

Hospital service efficiency is the ability of the hospital to provide accurate and reliable services as promised. In addition, it also means that the hospital in question fulfills its promise, for example conveying its explanation according to the agreed schedule. "In short, the definition of reliability in Tjiptono is the ability to provide prompt, accurate and satisfying services.

**The effect of patient safety on satisfaction**

The results of statistical tests show that the safety dimension has a significant effect on patient satisfaction at the Bhayangkara Level II Hospital in Medan. Most of the patients stated that they have taken preventive measures for patients who are at risk of falling out of bed and the doctor has also explained the purpose of the examination or treatment in advance. wearing protective equipment is like wearing a pocket before taking action.

**The Influence of Service Access to Satisfaction**

The results of statistical tests on the results show that the access dimension has a significant effect on patient satisfaction at the Bhayangkara Level II Hospital, Medan. Access to services at the inpatient service indicates that the patient states that the required doctor is available. Then the medical tools and several types of supporting examinations such as the required laboratory and radiology are also available. But some of the tools and conditions of the existing facilities Some are a bit old. Then the patient also stated that the living environment in the hospital was also good. This shows that support services in the hospital both laboratory and radiological examinations are available for the patient. Then the medical equipment in the flat bed room is also available in the hospital to provide care for the patient. But some of the medical equipment in hospitals is indeed some equipment that has been in condition for a long time. Then some medical equipment is also limited in number, considering that there are also quite a lot of patients in the hospital.

**Conclusion**

In achieving the goal of patient satisfaction-oriented service, it is necessary to pay attention to things that play an important role in determining the patient's perceptions of quality, including covering facilities, the role of doctors, medical personnel and nurses.

**References**

Azwar, A. (1996). Pengantar administrasi kesehatan. Available from: http://repo.unikadelasalle.ac.id/index.php?p=show_detail&id=11923&keywords=

Dwidarti, S. J. (2016). Analisis Pengaruh Kualitas Pelayanan Terhadap Kepuasan Dan Implikasinya Pada Loyalitas Pasien Rawat Inap Di Rsud Cicalengka Kabupaten Bandung (Doctoral dissertation, UNPAS).

Irawan, H. (2010). Prinsip Kepuasan Pelanggan, PT Elex Media Komputindo.

Kemenkes, RI. (2013) Buku Pegangan Sosialisasi Jaminan Kesehatan Nasional (JKN) dalam Sistem Jaminan Sosial Nasional. Kementerian Kesehatan RI, Jakarta 2013.

Özaltin, E. (2009). World Health Organization WHO Regional websites. *Bulletin of the World Health Organization*, 87, 271-278.
Robbin, S., (2014) Perilaku Organisasi, (Edisi ke-16 terjemahan), Penerbit: Salemba Empat, Jakarta.

Setyaningsih, I. (2013). Analisis kualitas pelayanan rumah sakit terhadap pasien menggunakan pendekatan lean servperf (Lean Service dan Service Performance)(Studi kasus rumah sakit X). Spektrum Industri, 11(2).