

# The Effect of the Case Manager's Role to Patient Satisfaction

## A Systematic Review

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**Keywords:** Case manager, Patient satisfaction, Service quality.

**Abstract:** Introduction: In Indonesia the implementation of the nursing case manager in the hospital has not been very clear and how the implementation. The role of case managers include utility assessment, patient planning, facilitation and advocacy, service coordination, process evaluation, post-discharge follow-up. One indication of the role of the case manager in the inpatient ward is the long elapsed hospital day (ALOS) and the patient complains. Methods: The literature search is performed in several major databases such as proquest, sciencedirect, doaj, sagepub, medline, and google scholar with the time limits used are January 2008 to December 2018. Results: A total of fifteen studies raised in this study, all of which have almost the same objectives of how to implement case manager in increasing patient satisfaction in each population. From fifteen randomly selected respondents chose respondents. Conclusion: Significantly with patient satisfaction, so it can be concluded that patient satisfaction actually refers to appearance or form of service, that more perfect appearance of service, hence more perfect also quality or quality.

## 1 BACKGROUND

Nursing service is a form of professional service as an integral part of health service that has big leverage to health development (PPNI, 2012). Nursing as a profession that is part of the society will continue to change in line with the development of society, one of which is the demands of the public need for quality health services, so nurses are expected to improve and develop professional skills to provide the best nursing services to the community (Nursalam, 2011). The role of professional nurses in the national health system is to create a good health system, so that the health service will be in accordance with the needs and demands of society. Meanwhile, on the other hand, the cost of health services in accordance with the economic capacity of the community. However, the nurse has not performed the role optimally. Herein lies the problem, the provision of health services, including nursing services in accordance with the needs of society is not easy. Not surprisingly, at this time many public complaints found to health care or nursing in Indonesia (Nursalam, 2015).

Nurses are the largest human resources in hospital health services, where nurses work 24 hours a day in rotation and continuously to provide

comprehensive and professional nursing care and are ready to help patients at all times. Nurses have a vital position where it is always direct contact and has the most time in interacting with the client so that the high quality of health service in the hospital is greatly influenced by nursing service because 90% of hospital health services are provided by nurses (Damayanti 2001); where the quality or quality of health services provided will affect patient satisfaction (Kucukarslan & Nadkarni, 2008). The patient's dissatisfaction with the nursing service can be influenced by several factors such as: product or service quality, price or cost that must be paid by the patient to the service received, place ie place or facility given, promotion that is match between product or services received with information provided, processes or mechanisms of service and people ie power or resources that provide services (Wiyono, 2007). Measurement of health service user satisfaction is one of the indicators to know the quality of health services.

Satisfaction and dissatisfaction of customers on a given product will affect behavioral patterns such as buying interest in product (Kotler, 2004). The results of the descriptive analysis found 39% of complaints resulting from staff behavior, 26% complaints due to clinical and other patient behavior, 16% complaints

due to physical environment and facilities, Length of Stay (LOS) and high cost issues, with stroke and cerebrovascular diseases (Haw Camila, 2008). Based on interviews with nurses and heads of nursing-related case managers and their roles, that of four nurses, there was one nurse who knew the case manager, the role, and the impact of the case manager on patient care, the three nurses said the role of the case manager was the same as the head of the room and of the 10 patients were hospitalized for more than six days there were 5 patients. Implementation of case manager in dr. R. Koesma Tuban has been implemented since 2016 to date with SK from the hospital director, as for the case manager type applied there are three types of case managers, the first case manager for nurse, case manager for the patient and case manager for administration. Role case manager in dr. R. Koesma Tuban has been using guidance and tupoksi in accordance with CMSA case manager standard, and case manager organization structure has been formed and the responsible is director of hospital, but case manager implementation not yet supported with standard operational procedure (SPO) this research is expected to help optimize the role of case manager as nursing service coordinator. Therefore the hospital needs a design or strategy in order to perform a continuous service process. One such model is the case manager. Case manager with an Islamic spiritual approach that is generally responsible for the coordination and continuity of patient care during hospitalization.

To know the quality of service felt real by consumer, there are indicator size of consumer satisfaction which is located in five dimension of service quality. These five dimensions are: physical evidence (tangibles), direct evidence covering physical facilities, equipment and materials used by hospitals and employee performance. Reliability (reability), related to the ability of the hospital to provide prompt and accurate service from the first time without making any mistakes and satisfactory; Responsiveness, in relation to the willingness and ability of employees to assist patients and respond to their requests with responsiveness, and inform services appropriately; Assurance (ie assurance) that includes knowledge, skills, courtesy, able to grow the trust of his patients; Empathy (empathy) means the ease of doing good communication, personal attention in understanding the patient's needs as a customer and acting in the interests of the patient.

## 2 METHODS

The literature search is done in several major databases such as proquest, sciencedirect, doaj, sagedpub, medline, and google scholar by including the keyword of patient satisfaction, quality of management, service quality. The time limit used is January 2006 to December 2016. Of the 1643 articles obtained, only 15 articles met the inclusion criteria. The inclusion criteria of the article are: 1) Hospital / Clinic, 2) measuring 5 indicators of service quality, 3) sample is visitor or inpatient / outpatient, and 4) parameter assessed is patient satisfaction.

The parameters of patient satisfaction were assessed using highly variable instruments. Fifteen studies use dimensions of Responsiveness, Assurance and Emphasis, while Tangible and Reliability dimensions. Patient satisfaction is also influenced by several factors, among others: reliability, assurance, tangibility, empathy and responsiveness. Reliability (reliability) is the ability of officers to provide services to consumers with appropriate. In the health service is the patient's assessment of the ability of health personnel. Assurance (assurance) ie the ability of officers to provide services to consumers so trusted. In the health service is the clarity of health workers provide information about the disease and its medicine to patients. Tangibility (physical evidence) the availability of facilities and physical facilities that can be directly perceived by consumers. In the health service is the cleanliness of the treatment room and toilet. Emphaty (attention) is the ability of officers to build relationships, attention, and understand the needs of consumers. And last responsiveness (responsiveness) is the ability of officers to provide services to consumers quickly. In the health service is the length of time waiting for patients starting from register to get health service (Kotler, 2000).

Given the magnitude of the role and function of health services as the first health service providers in the community, the important thing to note is the ability of officers to provide services to consumers with precisely accompanied by awareness, skill and discipline of service personnel in providing services to effectively and efficiently, especially in waiting time services so that patients feel satisfied with the service in the health service.

### 3 RESULTS

#### 3.1 Relation between Physical Evidence and Patient Satisfaction

Based on the data, on good physical evidence, most respondents are 71 respondents (72.4%) feel satisfied, as many as 10 respondents (10,2%) feel less satisfied. On the physical evidence is not good, most respondents are 13 respondents (13.3%) feel less satisfied and as many as 4 respondents (4.1%) feel satisfied. Chi Square Continuity Correction analysis results between physical evidence and patient satisfaction obtained Asymp.sig (2-sided) or p value of 0.000. If the p value is smaller than the value  $\alpha = 0.05$ . From the analysis results also obtained value Odds Ratio (OR) = 23.075. According Suryati et al (2006), aspects of physical evidence becomes important as a measure of service. The customer will use the sense of sight of an attribute service quality of the variable. Good physical evidence will affect customer perceptions. At the same time this aspect of physical evidence is also one source that can affect customer expectations, because of good physical evidence, customer expectations are higher. This study is in line with Irfan et al (2012) in a study with 320 respondents about Patient Satisfaction and quality of service in government hospitals in Pakistan found a meaningful relationship between the dimensions of physical evidence and other quality dimensions with patient satisfaction. Lumintang (2012) in the study observational on 86 patients about Factors Related to Patient Satisfaction of Askes on Service of Inpatient Installation B at RSUP Prof. Dr. R.D. Kandou Manado found that the physical environment was a significant factor in patient satisfaction ( $p = 0.03$ ). Similarly Susmaneli and Tyana in a study on 92 respondents who used cross sectional design on Quality Dimension of Midwifery Service to Patient Satisfaction.

The Jampersal Program at Rokan Hulu Hospital Pekan Baru found that the physical evidence dimension ( $p = 0.003$ ) correlated significantly with patient satisfaction (Susmaneli, 2014). Kambong et al. (2013) in the study of the relationship between nurse service and patient satisfaction at Talawaan Health Center of North Minahasa Regency found an association between nurse service in the dimensions of physical evidence, reliability, assurance, concern with patient satisfaction and no relationship between nursing service in the dimension of responsiveness with patient satisfaction. Simbala et al (2013) in an analytic survey study with a cross-sectional design

of 100 respondents found that physical evidence was significantly associated with patient satisfaction ( $p = 0.002$ ). Meanwhile, a study by Calisir et al (2012) on the effect of quality dimensions on patient satisfaction and repeat visits of 292 respondents using modified SERVQUAL method found that physical evidence was an important factor for patient satisfaction and influenced the decision to re-use hospital services the. That physical evidence correlates significantly with patient satisfaction, so it can be concluded that patient satisfaction actually refers to appearance / form of service that more perfect appearance of service, hence more perfect also quality/ quality.

In general, a person will see a potential hospital initially from the physical condition. With a clean, tidy, and orderly condition one would expect that the hospital would perform its functions well. The relationship of physical evidence to patient satisfaction is: physical evidence has a positive and significant influence on patient satisfaction. The better the customer's perception of physical evidence the higher the patient's satisfaction, and if the patient's judgment of physical evidence is poor, the patient's satisfaction is lower. Research conducted by Lubis and Martin (2009) on the Influence of Price and Service Quality on Satisfaction of Inpatient Patients at RSU Deli Sumatera Utara, mention that physical evidence variable have positive effect to consumer satisfaction.

#### 3.2 Relationship between Reliability with Patient Satisfaction

Based on the data, on good reliability, the majority of respondents are 71 respondents (72.4%) feel satisfied and as many as 10 respondents (10,2%) feel less satisfied. On the less good reliability, most respondents are 13 respondents (13.3%) feel less satisfied and as many as 4 respondents (4.1%) satisfied. Chi Square Continuity Correction analysis results between reliability and patient satisfaction obtained Asymp.sig (2-sided) or p value of 0.000. If the p value is smaller than the value  $\alpha = 0.05$  it means that H1 is accepted or there is a relationship between reliability and patient satisfaction. From the analysis results obtained also the value of Odds Ratio (OR) = 23.075. Reliability is one of the five dimensions of service quality, and according to Tjiptono (2006) that the quality of service is closely related to satisfaction, where good quality will provide experience for the customer and will then invite them to come back for the next visit and become a loyal customer.

The better the customer's perception of reliability the patient's satisfaction will be higher where if the patient's perception of the bad reliability, the patient's satisfaction will be lower. A study by Rahman et al (2013) to identify service quality factors that affected patient satisfaction in private hospitals in Bangladesh with 390 respondents and using 11 dimension quality variables showed that reliability was significantly associated with patient satisfaction. Likewise research from Faisal et al (2013) about the relationship between nurse service with patient satisfaction in Installation of Inpatient A BLU RSUP Prof. Dr. R.D.Kandou Kota Manado with 85 respondents found no significant relationship between patient reliability and satisfaction.

### 3.3 Relationship between Power Response with Patient Satisfaction

Based on the data, on good responsiveness, most respondents are as many as 75 respondents (76.5%) feel satisfied and as many as 19 respondents (19.4%) feel less satisfied. On the responsiveness is not good, most respondents are as many as 4 respondents (4.1%) feel less satisfied and no respondents are satisfied. Chi Square Continuity Correction analysis results between responsiveness and patient satisfaction obtained Asymp.sig (2-sided) or p value of 0.002. This study is in line with Simbala et al (2013) in an analytic survey study with a cross-sectional design of 100 respondents found that responsiveness was significantly associated with patient satisfaction ( $p = 0.002$ ). Badri et al (2009) in research on the quality of health services and factors affecting patient satisfaction express responsiveness as one of 12 indicators always included in various studies related to service quality. In an analytical study with 246 respondents comparing patient satisfaction with services in public hospitals and hospitals, it was found that private hospitals had high satisfaction rates in responsiveness and empathy, while government hospitals were least valuable in the dimensions of responsiveness (Brahmbhatt et al., 2011).

### 3.4 Relation of Responsiveness with Patient Satisfaction

Relation of responsiveness with patient satisfaction is responsiveness have positive and significant influence to patient satisfaction. The better the perception of the customer to the responsiveness of the patient's satisfaction will be higher, and if the

patient's perception of the poor responsiveness, then the patient's satisfaction will be lower. In accordance with the opinion Leboeuf (2012), that the responsiveness as an attitude of the employees to serve when the patient needs is closely related to customer satisfaction.

### 3.5 Relationship between Warranties with Patient Satisfaction

Based on the data, on good guarantees, most respondents are as many as 75 respondents (76.5%) feel satisfied and as many as 19 respondents (19.4%) feel less satisfied. On bad guarantees, 4 respondents (4.1%) felt less satisfied and no respondents were satisfied. Chi Square Continuity Correction analysis results between assurance and patient satisfaction obtained Asymp.sig (2-sided) or p value of 0.002. If the p value is smaller than the value  $\alpha = 0.05$ . Research on patient satisfaction at Jombang Hospital by Ariyani (2009), also found that good guarantees will increase patient satisfaction on hospital services, thus making patients more likely to believe and believe in every service performed by the hospital. Mustofa (2008) in a cross-sectional analytic study of 30 respondents on the relationship between the perceptions of patients on the quality dimensions of nursing service found that there was a significant relationship between the perceptions of patients on the dimensions of the guarantee with patient satisfaction. According to Tjiptono (2006), the quality of health services for a patient can not be separated from the satisfaction of the received health services, where good quality is associated with recovery from illness, improvement in health or freshness, pleasant care environment, and hospitality. Guarantees include the right knowledge of the product / service appropriately, the quality of hospitality, the attention and decency in providing services, the skills in providing information, the ability in providing security in utilizing the services offered, and the ability in instilling customer confidence in the company. Hospitality, comfort and courtesy of the nurses are also included as an indicator of variable assurance greatly affects customer satisfaction assessment of hospital service quality. Sayed et al (2013) in the study of patient perception as an indicator of nursing service quality in 90 respondents found that the assurance was significantly related to patient satisfaction ( $p = 0.0$ ). Essiam (2013) who examined the quality of service and patient satisfaction in health services with quantitative methods on 400 respondents found a significant relationship between assurance and

patient satisfaction ( $p < 0.01$ ). Each patient basically wants to be treated well by the manager of the hospital. The assurance that patients who come will be served well by the manager of the hospital, will provide a sense of security to the patient, so that the patient's personal stability will increase. Thus, their confidence in the hospital will increase.

### 3.6 Relationship Guarantee with Patient Satisfaction

The relationship of assurance with patient satisfaction is the assurance of having a positive and significant influence on patient satisfaction. The better the patient's perception of the guarantee the patient's satisfaction will be higher, and if the patient's perception of bad guarantees will lower the patient's satisfaction. In line with the study, Winardi et al. (2014), in a study entitled Influence of Service Quality on Patient Consumer Satisfaction at SMC Telogorejo Hospital that assurance related to patient satisfaction so it can be concluded that good guarantee is related to increasing patient satisfaction and patient loyalty.

In a study on patient satisfaction in Selangor, Malaysia, by Hayati et al. (2010) also found that good guarantees will increase patient satisfaction with hospital services, thus making patients more likely to believe and believe in every service performed by hospitals. Indiraswari and Damayanti (2012), found also that significant guarantees significantly in addition to improving patient satisfaction for services, will also affect the patient's assessment of other variables.

### 3.7 The Relationship between Empathy and Patient Satisfaction

Based on the data, on the good attention, most respondents are 72 respondents (73.3%) feel satisfied and 13 respondents (13.3%) feel less satisfied. On the less good attention, most of the respondents are 10 respondents (10,2%) feel dissatisfied 11 and 3 respondents (3,1%) feel satisfied. Chi Square Continuity Correction analysis results between attention and patient satisfaction obtained Asymp.sig (2-sided) or p value of 0.000. This is in line with research Puspitasari and Edris (2011) about patient satisfaction in Installation Hospitalization Healthy Hospital Pati who get that attention variable is very dominant influence on patient satisfaction. Muninjaya (2011) emphasized the importance of the dimension of attention in providing quality services. This is in line with

Rattoe's (2013) study on the relationship between service quality and the resendation decision at Bethesda Tomohon General Hospital which found that the attention variable is very dominant for the effect on patient satisfaction. Furthermore, research from Sulianti (2010) and research from Rondonuwu (2014), found that the attention variable is closely related to the creation of quality services. Quality services can provide a good experience for customers and will invite them to come back and be loyal customers. Quality services can provide a good experience for customers and will invite them to come back and be loyal customers.

## 4 DISCUSSION

These results suggest that patient satisfaction actually refers to the appearance / form of the role of case manager, that the more perfect appearance of service, the more perfect also the quality / quality. it also needs to pay attention to the number and homogeneity of the subjects (age, sex, disability level and time spent in the study) so as not to make bias on the research results. Summary of the research conducted systematic review, showed a positive effect of the role of case manager and excellent service quality to patient satisfaction. There is relationship between nurse service quality and patient satisfaction Health seen from dimension of responsiveness, reliability, assurance, empathy and physical proof.

## 5 CONCLUSIONS

Satisfaction is as the level of a person's feelings after comparing the performance or the results he feels with his expectations. The level of satisfaction is a function of the difference between perceived performance and expectations. If performance is below expectations, then the customer will be very disappointed. When performance is as expected, then the customer will be very satisfied. Whereas if performance exceeds expectations customers will be very satisfied (Oliver, 1998 in Supranto, 2001). Patient / customer satisfaction is a service response to the conformity of the importance or expectation of the customer before they receive the service after the service they receive (Muninjaya, 2011). Therefore, customer satisfaction is determined by expectations compared to the reality received by the customer. Customers include internal customers

external customers, and intermediate customers. Customer needs are endeavored to be satisfied in all aspects, including price, convenience, security, and timeliness. We also recommend that the hospital can maximize the role of the case manager and develop a patient satisfaction surveys program on a regular basis so as to evaluate the performance of nursing services by improving, improving and developing the quality of services and making efforts to maximize the patient satisfaction.

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