

Evaluating Patient Satisfaction In Out Patient Department Of An Ayurvedic Hospital Of West Maharashtra: Application Of Donabedian Quality Model

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Abstract - Like every other sector customer satisfaction is the key parameter for evaluating the quality of services of hospital. However, evaluating the quality of healthcare services become complex due to intangibility and heterogeneity like characteristics of patients need. Donabedian's Structure-Process & Outcome model helps to minimize this complexity up to an extent. This cross-sectional study was carried out in Out Patient Department of a mid size ayurvedic hospital in the west Maharashtra from 2 May 2022 to 1 October 2022. A total of 185 patients returned the completely filled questionnaire, of which 46% were men and 54% were women. The majority of patients ranged in age from 18 to 50 years. The greater part of the Kayachikitsa and Panchkarma departments' patients participated in the study. Patients were most satisfied (86.49%) with the OPD's accessibility and (82.16%) availability of doctors. Just 51.89% of patients were satisfied with the communication at the registration desk, whereas 80% of patients were satisfied with the time spent by doctors during their examination process. 70.08% patients were satisfied about overall experience regarding OPD services. The highest satisfaction was found with respect to structure and outcome component respectively however lowest with process component. It is important for administrative team of hospital to streamline the processes of the hospital in order to achieve higher patient satisfaction.

Keywords —Donabedian Quality Model, OPD, Outcome Patient Satisfaction, Process, Structure

I. INTRODUCTION

All the sectors in this competitive era are striving for quality to satisfy their customers rather we would say the customer satisfaction defines the success and quality of services or products.[1] Unlike the manufacturing sector, the quality of healthcare service is difficult to define and measure. The unique characteristics of the healthcare industry such as intangibility, heterogeneity make it more complex to measure. To minimize this complexity Donabedian had proposed a model that helps in measuring quality of healthcare setups. This model is universally accepted. It comprises of three main components Structure measures, Process measures and Outcome measures. [2] Structure measures, reflects the infrastructure, human resource and material used for the care of patients and process measures explain various clinical and non clinical processes of the healthcare setup, whereas outcome exhibits the final result of the care provided to the patients and patient satisfaction. Out Patient Department (OPD) is like shop window of the

hospital and is considered as the first point of contact that gives hint to the patients and attendants about the quality of services of the hospital.[3,4] This study was an attempt to apply Donabedian Quality model to evaluate patient satisfaction regarding services provided by outpatient department of the selected ayurvedic hospital.[6]

II. LITERATURE REVIEW

Out Patient Department (OPD) is like shop window of the hospital and is considered as the first point of contact of patient with a healthcare setup. A patient's whole OPD experience might provide insight into the hospital's service quality. Therefore, it is crucial for each hospital to assess how satisfied OPD patients are [3,4]

1. A patient satisfaction study conducted by MaryJoy Umoke, Prince Christian feanachor Umoke et al (2016) in a general hospital of Ebonyi state describes the application of SERVQUAL model. The study findings show the

highest satisfaction with empathy however lowest with tangibility.

2. In a multispecialty teaching hospital, Kushboo Gaur and Surekha Kashyap (2017) used the Donabedian Quality Model to analyse a patient satisfaction measure. Patients' satisfaction with waiting times and doctor explanations of their conditions was rated as being at its greatest.
3. Swastika Chandra and Paul Ward (2018) examined patient satisfaction at Suva Subdivision health centres in Fiji using qualitative and quantitative approaches. Their research demonstrates that patient satisfaction is adversely correlated with waiting time and favourably correlated with patient trust, doctors' interpersonal abilities, and communication style.
4. Farah Naaz (2018) study of patient satisfaction of outpatient department of an AYUSH hospital located in Delhi shows the highest satisfaction with the timing and services provided by the hospital.
5. P. Suhail and Y. Srinivasulu (2020) outlined the significance of performance-based service quality in their study conducted in ayurvedic hospitals in three distinct districts of Kerala. They have discussed 2 Models .Model 1 showed that, assurance, dependability, and responsiveness had a stronger substantial beneficial influence on patient satisfaction. In contrast, Model 2 stated that the link between performance-based service quality and behavioural intentions in Ayurvedic healthcare is strongly influenced by consumer satisfaction levels.

III. METHODOLOGY

This cross-sectional study was carried out in a mid size ayurvedic hospital in the western Maharashtra from 2 May 2022 to 1 October 2022. Patients in the OPD of a chosen ayurvedic hospital were given a predesigned, self-reporting questionnaire. Patients with OPD who agreed to take part in the study were included. A total of 200 OPD patients were approached, and 185 of them (or 97.5%) who returned a fully completed questionnaire were included in the study. Data which was analyzed was presented in tabular and graphical form. This study was conducted with following objectives:

1. To evaluate patient satisfaction with regard to structure component in a selected ayurvedic hospital according to Donabedian Model of Quality.
2. To assess patient satisfaction with regard to process component in a selected ayurvedic hospital according to Donabedian Model of Quality
3. To analyze patient satisfaction with regard to outcome component of Donabedian Model of Quality available in a selected ayurvedic hospital.

IV. RESULT AND DISCUSSION

Total 21 parameters were included in the data collection tool .It was broadly based on Donabedian's SPO Quality Model[6]. 11 items were associated to structure, 8 to process, and 2 to outcome.

Table No. 1 : Demographic Data of Study Participants(n=185):

Characteristics	No. of Participants	Percentage
Age		
18-50 Yrs	109	59%
>50 Yrs	76	41%
Gender		
Male	86	46%
Female	99	54%
Out Patient Departments		
Panchkarma	46	25%
KayaChikitsa	52	28%
Shalya	9	5%
Bal Rog	35	19%
Stree Evam Prasuti	43	23%

The data presented above, illustrates the demographic profile of the participants. Age, gender, and outpatient departments visited to the selected ayurvedic hospital have been included. A total of 185 people participated, of which 46% (86) were male and 54% (99) were female. Female participants were more than the male[1,6]. The age component of the demographic profile was split into two groups: 18–50 years old and >50 years old. The majority of participants, about 59% (109), were under the age of 50, while just 41% (76) were beyond that age. The majority of participants in the OPD came from Kayachikitsa, Panchkarma, and Stree Evam Prasuti, accounting for 28%, 25%, and 23% of the total, respectively, while Shalya and Balrog accounted for 5% and 19% of the total.

Table No. 2 : Percentage of Satisfied Patients with regard to Structure Components of Donabedian Quality Model (n=185):

S.N.	Structure Component Parameters	Satisfied
1	Ease of locating the OPD	86.49%
2	Adequacy of OPD registration windows	76.76%
3	Adequacy of Seating arrangement in waiting area	77.84%
4	Cleanliness of waiting area	76.22%
5	Availability of drinking water	76.76%
6	Cleanliness of toilets	63.78%
7	Adequacy of no. of doctors available	82.16%
8	Adequacy of no. of allied staff were available	75.68%
9	Availability of medicines	51.89%
10	Availability of equipments in OPD	81.08%
11	Working condition of equipments are	64.86%

The percentages of patients who are satisfied with various parameters under structural component of Donabedian's SPO model of quality are shown in the above table. 86.49 % (160) patients were most pleased with the OPD's accessibility and

least satisfied i.e. 51.89%(96) regarding the availability of ayurvedic medications in the hospital and only 63.78%(118) were satisfied with the cleanliness of toilets.. Patients' satisfaction with the number of doctors available in the OPD was at 82.16 % (152), while about 77.84 %(144) were satisfied with the sitting arrangement in the waiting area.76.22(141)% were satisfied with the cleanliness of waiting area, similar findings were observed by the study conducted by Gaur K &.S.Kashayap where Donabedian Model of quality was used to assess patient satisfaction of OPD patients of an allopathic setup[5].

Table No. 3 : Percentage of Satisfied Patients with regard to Process Components of Donabedian Quality Model (n=185):

S.N.	Process Component Parameters	Satisfied
1	Time taken for registration process at OPD desk	69.72%
2	Experience regarding communication process at registration desk	51.89%
3	Experience regarding waiting time	65.41%
4	Experience regarding communication with nursing staff	67.57%
5	Experience regarding communication with doctor during the discussion of illness.	75.67%
6	Experience regarding time spent by doctor during examination.	80.00%
7	Explanation of doctor about my treatment plan	76.76%
8	Medicine dispensing process	60.00%

The percentage of patients who are satisfied with various aspects of the process component of Donabedian SPO model of quality is shown in the above table. The registration process, communication process, waiting time, doctor examination time, and medication dispensing process were considered as process component. Nearly 80% (148) of patients expressed their satisfaction with the time spent by doctors during their clinical examination, but only 75.67% (140) were satisfied with the way doctors communicated when explaining their treatment plan. Only 51.89%(96) of patients were happy with the way registration staff communicated, and 67.57% (125) of patients were happy with the way nurses communicated with them. Just 60% (111) of the participants were pleased with the medication distribution process, whereas 65.41 % (121) thought the waiting time was reasonable.

Table No. 4 : Percentage of Satisfied Patients with regard to Outcome Component of Donabedian Quality Model (n=185):

S.N.	Outcome Component Parameters	Yes
1	Was your overall experience with OPD services as per expectations	70.08%
2	Will you recommend this hospital to others	69.72%

The questions pertaining to outcome components reflect the overall satisfaction with OPD and the recommendations made to others. When asked if the hospital could satisfy their expectations, 70.08% (131) patients said "yes," and 69.72% (129) indicated they would recommend this hospital to others.

Table No.5: Percentage of Overall Satisfied Patients with regard to Structure Process and Outcome Components

Component	Satisfied
Structure	73.96%
Process	68.38%
Outcome	69.90%

The above table shows the overall satisfaction of patients with all the aspects of structure, process, and outcome. Patient satisfaction with the structure component was typically high (73.96%) whereas patients have shown low (68.38%) towards process component. While it was assessed that 69.90% patients were satisfied with outcome component.

V. CONCLUSION

The study findings indicate that, patients were most satisfied with the structure component and least satisfied with the process component. Patients also exhibited low satisfaction with the outcome component. Although most structural parameters met patients' expectations, but improvement in the availability of ayurvedic medications, working conditions of the equipment and cleanliness of toilets will contribute to greater patient satisfaction. The hospital administration will undoubtedly increase satisfaction through the streamlining of numerous processes, such as the communication at the registration desk and communication between nurses and patients, appointments process to reduce waiting time, and ayurvedic medicine dispensing process.

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