

Assessment of Postoperative Patient Satisfaction towards Services Provision in Zewditu Memorial Hospital Addis Ababa Ethiopia. A Cross-Sectional StudyGirma Abdissa^{1*} Ayalew Asegidew², shiferaw Bekele³¹Department of Surgical Nursing, Menelik II Medical and Health Science College, Kotebe Metropolitan University, Addis Ababa, Ethiopia²Ras Desta Memorial Hospital, Addis Ababa, Ethiopia³Department of Surgical Nursing, Menelik II Medical and Health Science College, Kotebe Metropolitan University, Addis Ababa, Ethiopia***Corresponding Author**

Girma Abdissa, Department of Surgical Nursing, Menelik II Medical and Health Science College, Kotebe Metropolitan University, Addis Ababa, Ethiopia

Submitted: 26 Dec 2022; Accepted: 04 Jan 2023; Published: 09 Feb 2023

Citation: Abdissa G* Asegidew A, Bekele S. (2023). Assessment of Postoperative Patient Satisfaction towards Services Provision in Zewditu Memorial Hospital Addis Ababa Ethiopia. A Cross-Sectional Study. *Gen Surgery Clin Med*, 1(1), 37-47.**Abstract**

Background: People's health and well-being are dependent on the health system's performance, and one of the five indicators for assessing the health system's performance is the level of patient satisfaction. Despite the fact that several factors influence postoperative patient satisfaction, such as Preoperative anxiety, limited functional status, and postoperative pain control are all important aspects of surgical patient care, and they are all associated with a positive outcome and patient satisfaction. The aim of this study is to assess post-operative patient satisfaction toward service provision in a public hospital, in Addis Ababa, Ethiopia.

Methods: From September 17 to November 17, 2021, a hospital-based cross-sectional survey design was used to determine post-operative patient satisfaction at Zewditu Memorial Hospital. A sample size of 346 was generated using a single percentage formula. All consecutive adults who were operated on during the study period were included in the study. A systematic questionnaire was used to gather data. The collected information was double-checked for accuracy. And then analyzed with the statistical package for social sciences (SPSS) 25, and shown in tables and graphs with the EPI INFO program version 3.5.1.

Result: The total postoperative satisfaction of the patients revealed that 286 (82.1%) of those who replied were satisfied. Overall, 96 (27.7%) of patients were very satisfied, 188 (54.3%) were satisfied, 12 (3.5%) were indifferent and 12 (3.5%) were very dissatisfied with post-operative care. More than half of the 200 respondents (53.4 percent) were dissatisfied with access to water, a latrine, and a handwashing station.

Conclusion: Overall, patient satisfaction with post-operative care was low when compared to similar studies conducted in the country, and the appropriateness of the service, as well as nurse treatment and behavior, were noted as areas of unhappiness in the patient response.

Keywords: Patient Satisfaction, Post-Operative Patient**Introduction****Background**

Client satisfaction after using a service is an important component of hospital and clinic management strategies all over the world. Client satisfaction must be measured on a regular basis in most countries' quality assurance and accreditation systems [1]. According to the World Health Organization, people's health and well-being are dependent on the health system's performance, and patient satisfaction is one of the five measures used to assess health system performance [2]. Patients' experiences with care and treatment

are an important step in enhancing care quality and ensuring that local health services meet their needs. Through a professional and confidential approach, trust is built between the patient and the doctor. Patients, often have no choice but to accept the quality of service they are receiving, because they are either facing financial constraints and cannot afford private health care treatment, or they have little or no knowledge of what constitutes quality service. Various research, on the other hand, has backed up the hypothesis that some patients may lack a basic understanding of how to estimate service quality, instead of depending on their own per-

ceptions and expectations [4]. The most important predictors of postoperative experiences, dissatisfaction, and mood disturbance were the patients' prior expectations [5].

The study conducted on determinants of patient satisfaction in a surgical ward at a University Hospital in Saudi Arabia revealed that Patient satisfaction was positively influenced by the explanation of a responsible physician for the operation in the emergency department, physician's reception in the clinic, surgical team reception in the ward, team response to the patient's questions, and hospital safety level [6]. Patients were more satisfied with the technical element of nursing care in a research done in Cyprus, but less content with the supply of information and hospitalization, particularly with meals and resting time [7]. Patient satisfaction with postoperative care is influenced by a variety of factors. Pre-operative anxiety, limited functional status, and postoperative pain control are all critical parts of surgical patient management, and they are all linked to good recovery and patient satisfaction. Many patients have their postoperative pain poorly controlled. Despite evidence that aggressive postoperative pain control improves outcomes, a study in the United States found an analgesic gap" in providing adequate postoperative pain relief. Postoperative pain is thought to affect both medical resource use and patients' ability to resume normal activities after discharge from the hospital to home [8].

In Africa, achieving practical and long-term patient satisfaction is a major challenge due to a lack of leadership, attention, resources, and dedication. In a study conducted in a teaching hospital in Nigeria, patient satisfaction was positively influenced by the patient-provider relationship, inpatient services, hospital facilities, and access to care, whereas patient satisfaction was negatively influenced by waiting time, cost, delayed appointments, missing investigation results, and folders [9].

Most studies in Ethiopia focused on overall patient satisfaction with health care, and finding data on postoperative patients is particularly difficult. According to a study on the quality of hospital services in eastern Ethiopia based on customer perceptions, 46 percent of patients were dissatisfied with overall health service, while a study conducted at Jimma Specialized Hospital found total client satisfaction to be 77 percent. Outpatient service satisfaction levels in Gondar and Jimma hospitals were found to be 22 percent and 57 percent, respectively, this study focused on overall patients' satisfaction rather than postoperative care. In the study done At Debre Markos Hospital, prevention research on inpatient satisfaction with nursing care and communication revealed overall satisfaction rate was 56 percent [10]. Nurse communication and nurse care received the lowest satisfaction rate after post-operation in a study conducted in Tikur Anbassa, St. Paul, Zewditu Memorial Hospital [11]. The level of patient satisfaction at Ethiopia's various health facilities and hospitals varies, according to various research. The implementation of Business Process Reengineering (BPR), a method for a comprehensive analysis and redesign of processes

in service delivery, has been used in Ethiopia since 2010 as part of the national effort for socio-economic civil service reform in the public sector. Its goal for the health industry is to create customer-centric institutions, rapidly scale up health services, and improve care quality [3].

Despite the fact that numerous studies have been conducted on general patient satisfaction with care providers both globally and in Ethiopia, there is a scarcity of research on post-operative patients. The findings of this study could serve as a baseline for further monitoring of changes in service quality, as well as provide evidence for stakeholders working to improve hospital service quality by pointing to specific areas for action. Understanding the characteristics that influence patient satisfaction could aid policymakers and decision-makers in revising effective healthcare policies and operational plans to improve postoperative treatment generally. Furthermore, this study serves as a springboard for future research in the field.

Literature Review

Patient satisfaction is one of the desired outcomes of health care and is linked to health service utilization. Client or patient satisfaction evaluations have become an important part of hospital management strategies all over the world. Furthermore, most countries' quality assurance and accreditation processes demand that client satisfaction be measured on a regular basis [3]. There is growing evidence that patient satisfaction correlates with better quality of care. Studies in developed countries have noted that hospitals with more satisfied patients generally provided a higher quality of care as measured by validated quality metrics using standard methodology.

Patient satisfaction has been linked in studies around the world to increased compliance with prescribed treatment and discharges instructions, a decrease in complaints against the institution, and an increase in morale and job satisfaction among healthcare providers, all of which can help patients' health outcomes and relationships with healthcare professionals. The patient's experience with care is becoming an increasingly relevant indication of care quality [6].

According to a study conducted in the United States, postoperative pain was the worst on the first postoperative day after major surgery. Analgesic drugs reduced postoperative pain by 60% to almost 80%, however, participants reported moderate to high degrees of impairment with general activity, walking capacity, and sleep due to postoperative pain. This research looks at how patients deal with pain following typical procedures, as well as perioperative expenses and medical resource utilization. (8). Results from the UK showed that the majority of the patients were satisfied with their care (91%), postoperative pain intensity (94%), and the way they were treated by the physicians and nurses (98%). In general, lower postoperative pain ratings were the best predictors of satisfaction and helpfulness of treatment. Preoperative pain

status, expected level of postoperative pain, and time waiting for pain medication after a request was made were not significantly correlated with ratings of postoperative pain or satisfaction [13].

A study was done in India tertiary care hospital, the highest level of health care, on inpatient satisfaction indicated that patients were more satisfied with the behavior of doctors and dissatisfied regarding cleanliness in the toilets (62%) and wards (40%). However, 26% of the clients were dissatisfied with the number of visits of the doctors. In some other cases, however, certain customers tend to base their evaluation of quality service on environmental factors within and around the hospital premises. "Due to the intangibility nature of the services, consumers will look for tangible physical evidence such as equipment, the appearance of employees, environmental design, décor signage, to form their expectations" [14].

A study in Hong Kong indicated communication, respect, and patient engagement in provider-patient relationships are important in determining patient satisfaction. There is evidence that patient socio-demographic characteristics affect patient satisfaction levels. It can be associated with patient characteristics, including age, gender, race, educational level, and health status. In addition, it is logical that previous admissions and the length of the current admission also affect the patient response). Available information from studies carried out by previous researchers has shown that professionals however deemed this outcome insignificant. Though the most frequent explanation for the variation and low-quality of care in the developing countries is lack of resources, a study noted that despite high expenditure and adequate facilities, patients did often not satisfy with the health care they received [2].

A study done in Bangladesh indicated that perceived technical quality of care for the client plays a lesser role in affecting satisfaction than the interpersonal nature of care, access to care, or continuity of care. The most powerful predictor of client satisfaction with government services was provider behavior, especially respect and politeness. For patients this, aspect was more important than the technical competence of the provider. The second most powerful predictor for being satisfied was the respect for privacy, followed by short waiting times Treatment outcomes are more favorable when patients feel they are active participants in the area and that their problem has been discussed fully when they feel encouraged to ask questions, when they feel emotionally supported and when they share their ideas or feelings in the treatment planning process [7].

A study in Nigeria indicates Overall satisfaction following day surgery was at least 95% at discharge and at 30 days. However, complete satisfaction was present only in 75% at discharge and decreased to 62% at 30 days. Clinical outcome was strongly related to patient satisfaction at 30 days after surgery. Factors directly controlled by anesthesiologists such as postoperative pain and information provided, also had a significant impact on patient satisfaction. A study indicated that varying importance of some so-

cio-demographic variables, length of stay and previous admission. Older respondents generally record higher satisfaction and satisfaction linked to prior satisfaction with health care and granting patient desires [14].

The study was carried out in Ethiopia's Gonder Teaching Hospital. After surgery, 43.9 percent of patients were very satisfied with the provider's privacy protection, whereas 0.4 percent were very dissatisfied. The other hand, 40.9 percent were very satisfied with ward nurse skill in treatment and 0.7 percent were dissatisfied, but 45.4 percent were very satisfied with ward nurse sympathy [2].

The highest level of satisfaction 82.7 percent was recorded by respondents in the Jimma specialized hospital in Ethiopia with the manner doctors examined them, whereas the largest level of unhappiness 46.9% was registered by respondents with the time spent visiting a doctor. Furthermore, respondents' satisfaction with health care was found to have a significant relationship with their age ($p=0.034$) and educational level ($p=0.003$) [5]. According to a study on the patient's perspective in Eastern Ethiopia, satisfaction with health care has a substantial relationship with waiting time, drug availability, the respondent's payment status, and the patient's address [11]. According to a study conducted at Tikur Anbassa Teaching Hospital in Ethiopia, 90% of participants were happy with nursing care. Dissatisfaction was linked to the length of time spent in the ward. Hospital services such as pharmacy, laboratory, catering, and other services were discovered to be a source of dissatisfaction. [15].

Methods and Materials

Study Area/Setting

The research was carried out at Ethiopia's Zewditu Memorial Hospital in Addis Ababa. The hospital is run by the Addis Ababa Health Bureau and offers a wide range of medical services. The hospital serves a catchment population of more than 1.5 million people, and according to hospital data, more than 18000 inpatients, 2512 emergency cases, and 56345 outpatients were served by the hospital in 2019/2020. It has a total of 253 beds spread over six inpatient units (36 in gynecological and obstetric, 60 in surgical, 56 in medical 28, in emergency, and 73 beds in pediatric, adult ICU, and neonatal ICU wards). There were 190 technical employees, including four surgeons, six internists, seven pediatricians, six gynecologists, one dermatologist, and 86 support staff. In addition, 350 nurses, 53 laboratory technicians, 15 radiologists, and 36 pharmacists worked at the hospital.

Study Design & Population

A cross-sectional study was conducted to examine the level of patient satisfaction with outpatient services using interviewer-administered questionnaires. Among postoperative state patients who got care from two main outpatient clinics (surgical and obstetrics/gynecology) between September 17 and November 17 of 2021.

Inclusion Criteria

All adult (minor-major, outpatient-inpatient, elective -emergency) surgery patients who were operated on during the study period.

Exclusion Criteria

Patients who operated under local anesthesia at the outpatient department (OPD) level, patients from obstetrics and gynecology and ophthalmology, patients below 18 years old, patients who cannot communicate, and unconscious after an operation during the study period.

Sample Size & Sampling Procedures

A single population proportion sample size determination formula was used with the following assumption: The proportion of patients satisfied with hospital care services is 87%, according to a study done in southern Ethiopia (Assefa, F. and Mosse, A., 2011 margin of error of 0.05, non-response rate of 10%, and the desired confidence level of 95%. Thus the final sample size calculated was 346. Allocation of samples into outpatient departments was done proportionately. The proportionate allocation was done by considering the average number of patients admitted to the two departments in the same month of the preceding year (September-November 2021) and the month prior to the actual data collection period. A systematic random sampling method which used patients' registration book as a sampling frame was employed to select respondents.

The actual sample size for the study was determined by using the formula for single population Proportion formula by assuming 5% marginal error (d), 95% confidence interval, ($\alpha=0.05$) and $P = 87\%$ (16). Based on the above information the total sample size was calculated by using the formula;

$$n = \frac{(Z_{\alpha/2})^2 pq}{D^2} \quad n = 346$$

Variables

Dependent Variable

- Patients' satisfaction

Independent Variables

- Socio-demographic characteristics
- Outpatient service-related characteristics

Operational Definition

Surgical Patients

All adult patient who was operated on during the study period.

Satisfaction

Attaining one's need or desire.

Very Satisfactory

Above one's expectation.

Satisfactory

Just one's expectation.

Dissatisfactory

Below one's expectation.

Very Dissatisfactory

Fail to meet one's expectation usually leading to disappointment.

Generally Satisfied Patients

Refers to patients who score very satisfactory, satisfactory and neutral in Likert scale of the whole items of the postoperative care service.

Generally Dissatisfied Patients

Refers to patients who score very dissatisfactory and dissatisfactory in Likert scale of the whole items of the postoperative care service.

Data Collection Instrument and Procedure

Exit interviews with patients were conducted in two private rooms using a pre-tested and methodical questionnaire based on the Donabedian patient satisfaction survey. Which was written in English and then translated into Amharic for the interviewer's convenience. Participants were requested to provide information on socio-demographic and patient-related factors in the first portion of the instrument, while they were asked to provide information on both in the second. In the second portion of the survey, participants were asked to rate their satisfaction with post-operative care as extremely unhappy, unsatisfied, neutral, satisfied, or very satisfied. Participants were also asked to review their overall impression of the post-operative care they received throughout their stay. To reduce the potential of information bias, data were collected by trained data collectors who were not health professionals.

Data Quality Assurance

The study's data quality was ensured throughout the study period, beginning with the design phase of the data gathering technique. During the preparation phase, the ease with which the questions could be understood and the importance of the variables in the study were assessed, followed by pretesting and, based on the results, adjustments to the questionnaire. Before beginning the actual data collection, data collectors and the supervisor were given training in data collection, classification, and coding. On a daily basis during data collection, the designated supervisor checked the collected data for completeness, accuracy, and clarity.

Data Analysis

Data was entered into the EPI INFO program version 3.5.1, processed with the statistical package for social sciences (SPSS) 25, and displayed in tables and graphs. The responses 1 (very displeased), 2 (dissatisfied), 3 (neutral), 4 (satisfied), and 5 (extremely satisfied) on the Likert scale were recorded. The Likert response was adopted from several research; those classed as Satisfied were

(very satisfied, satisfied, and neutral), whereas those classified as Dissatisfied were (very dissatisfied, dissatisfied, and neutral) (very dissatisfied and dissatisfied).

Ethics Approval and Consent to Participate

The study was carried out after the Kotebe Metropolitan University Menelik II medical and health Sciences College's institutional ethical review board (IERB) committee reviewed and approved it with (IERB number-□□5/32/10/4828). Data collectors were instructed on how to handle sensitive and emotional issues, as well as the importance of confidentiality. Prior to data collection, a letter of permission was given to and accepted by the Addis Ababa Health Bureau, the purpose and procedure for data collection were clarified, and confidentiality and privacy were guaranteed. All participants provided verbal informed consent and were informed that their participation was entirely voluntary.

Result

Sociodemographic Characteristics of the Respondents

The majority of the study's 282(82.1) participants had never had surgery before. Only 186 (53.1%) of the hospitalized patients stayed in the ward for less than a week, 110 (31.8%) for one to two weeks, and 52 (15%) for more than two weeks. The majority of the respondents were admitted to the surgical ward with an acute case, which accounted for 292 cases (84.3%). 298 cases (86.1%) required surgery for an acute illness, whereas the remaining 48 (13.9%) arrived on time. Respondents who answered extremely well account for 248 (71.7%) of the total, whereas only 8 (2.3%) responded that their health was declining. There was no concomitant disease in 282 cases (81.5%). The majority of the patients (292 out of 84.4%) were operated on in an emergency situation.

Table 1: Sociodemographic characteristics of the respondents, Zewditu hospital, Addis Ababa, 2021 (n=346)

Variables		Frequency	Percent
Age (yrs)	18 – 30	76	21.9
	30 – 40	92	26.5
	40- 50	148	42.7
	>50	30	8.7
Sex	Male	164	47.3
	Female	182	52.7
Religion	Orthodox Christian	224	64.7
	Muslim	76	22
	Protestant	28	8
	Catholic	18	5.2
Education status	Illiterate	18	5.2
	informal education	24	6.9
	Primary school	104	30
	Secondary school	122	35.2
	preparatory school	44	12.7
	College or university	34	9.8
Marital status	Single	130	37.5
	Married	192	55.4
	Divorced	16	4.6
	Widowed	8	2.3
Residence	Urban	236	68.2
	Rural	110	31.7
Employment status	Government employee	90	26
	Private employee	158	45.7
	House wife	42	12.1
	Student	24	6.9
	Others	32	9.2

Household income	< 1000	66	19
	1000 -2000	112	32.3
	2000 – 3000	94	27.1
	>3000	74	21.3

Surgery Related Characteristics of Respondents

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required surgery for an acute illness, whereas the remaining 48 (13.9%) arrived on time. Respondents who answered extremely well account for 248 (71.7%) of the total, whereas only 8 (2.3%) responded that their health was declining. There was no concomitant disease in 282 cases (81.5%). The majority of the patients 292 (84.4%) were operated on in an emergency situation.

Table 2: Surgery related characteristics of the respondents, Zewditu hospital, Addis Ababa, 2021 (n=346).

Variables		Frequency	Percent
History of previous surgical admission	Yes	62	17.9
	No	284	82.1
Duration of stay in the ward	<1weeks	184	53.1
	1 – 2 weeks	110	31.8
	>2weeks	52	15.0
Cause of illness	Acute	292	84.3
	Chronic	54	15.6
Reason for visit	Illness	298	86.1
	Checkup	48	13.9
Self-rating of health status	Very well	248	71.7
	Well	64	18.5
	No change	26	7.5
	Get worsen	8	2.3
Presence of comorbidity	Yes	64	18.5
	No	282	81.5
Type of operation:	Elective	54	15.6
	Emergency	292	84.4

Patient Satisfaction toward Hospital Structure and Service

In terms of ward equipment and infrastructure, 66 (19 percent) of patients were very satisfied, 194 (56 percent) were satisfied, 10 (2.95%) were indifferent, 52 (15 percent) were dissatisfied, and 24 (6.7%) were very dissatisfied. The majority of responders were satisfied with the cleanliness of the ward, accounting for 214 of the total (61.8 percent). The majority of patients were satisfied with

the lighting and ventilation in their rooms, with 218 (63%) being satisfied, 86 (24.8%) being extremely satisfied, and 26 (7.5%) being dissatisfied. The condition of the bed was unsatisfactory by 84 (24.2%) and satisfied by 166 (47.9%). 262 (64.7%) of patients were generally satisfied with the condition of their food, whereas 84 (24.2%) were generally dissatisfied. (Table 3).

Table 3: Patient satisfaction toward Hospital structure and service, Zewditu hospital, Addis Ababa, 2021 (n=346)

parameter	Very dissatisfiedN (%)	dissatisfiedN (%)	NeutralN (%)	SatisfiedN (%)	Very satisfiedN (%)	General SatisfactionN (%)
Adequacy of ward equipment's and infra structures, equipments	24(6.9)	52(15.0)	10(2.9)	194(56.0)	66(19.0)	270(77.9)
Cleanness of the ward	33(6.4)	42(12.1)	6(1.7)	214(61.8)	62(17.9)	282(81.4)
Adequacy of ward space	22(6.9)	96(27.7)	12(3.5)	112(32.3)	104(29.4)	226(65.2)
Wardroom-light and ventilation	10(2.8)	26(7.5)	6(1.7)	218(63.0)	86(24.8)	310(89.5)
Condition of bed	28(8.0)	84(24.2)	10(3.5)	166(47.9)	58(16.7)	234(67.6)
Condition of food(nutritious and safe)	12(3.5)	72(20.8)	6(1.7)	224(64.7)	32(9.2)	262(75.7)

Patient Satisfaction toward Appropriateness of the Service

The majority of the respondents were dissatisfied with their access to water, a latrine, and a handwashing facility. 156 (45%), 96 (18.4%), and 98 (28.3%) were extremely dissatisfied. The level of patient satisfaction with the diagnostic service is satisfactory. Overall, 320 people (92.4%) were pleased. The treatment progressed well for 254 patients (73.4%). Patient satisfaction with access to pharmacies and receiving medications in hospitals is 226

(65.3%), which is nearly identical to access to laboratories and x-ray diagnostic (218). (63 percent). The majority of them were satisfied with the operation's payment, which accounts for 322 of them (93 percent). After surgery, 74 (21.4%) of patients were very satisfied, 224 (64.7%) were content, 8 (2.3%) were indifferent, 24 (6.9%) were dissatisfied, and 16 (4.6%) were very dissatisfied with pain management.

Table 4: Patient satisfaction toward appropriateness of the service, Zewditu hospital, Addis Ababa, 2021 (n=346)

parameter	Very dissatisfiedN (%)	dissatisfiedN (%)	SatisfiedN (%)	Very satisfiedN (%)	General SatisfactionN (%)
Access to water, latrine and hand washing facility	64(18.4)	156(45.0)	96(28.3)	10(2.8)	126(36.4)
Diagnostic service are good	6(1.7)	14(4.0)	216(62.4)	104(30.0)	320(92.4)
Have got good progress of treatment	4(1.1)	12(3.4)	76(21.9)	254(73.4)	330(95.3)
Access to services-pharmacy, get medicine in the hospital	18(5.2)	44(12.7)	226(65.3)	46(13.2)	284(82.0)
Access to service-laboratory and x-ray diagnosis	16(4.6)	34(9.8)	218(63.0)	68(19.7)	296(85.5)
Payment for operation	6(1.7)	18(5.2)	270(78.0)	50(14.5)	322(93.0)

There is good layout from surgical wards to others services like lab, x-ray, pharmacy	22(6.3)	86(24.8)	124(35.8)	02(29.5)	238(68.9)
Pain management after surgery	16(4.6)	24(6.9)	224(64.7)	72(21.4)	306(88.4)

Nurses' visits to patients are met with a high level of satisfaction. 102 people (29.45%) were extremely satisfied, 186 people (53.7%) were satisfied, and 38 people (10.1%) were disappointed. The good treatment behavior of nurses was largely praised by 280 (80.9 percent) of the respondents. The capacity of the nurses was rated as satisfactory by 312 patients (90.1%), and the capacity of the surgeon was rated as satisfactory by virtually all 334 patients (96.5%). 5.5. Patient satisfaction toward health professional.

Table 5: Patient satisfaction toward health professional, Zewditu hospital, Addis Ababa, 2021(n=346)

Parameter	Very dissatisfiedN (%)	dissatisfiedN (%)	Neutral N (%)	SatisfiedN (%)	Very satisfiedN (%)	General SatisfactionN (%)
Nurse make adequate visit and get their support when needed	12(3.5)	36(10.4)	10(2.9)	186(53.7)	102(29.4)	298(86.1)
Nurse treat with respect and good behavior	(6.249)	42(12.1)	18(38.)	132(38.1)	130(37.6)	280(80.9)
Nurse explaining well and listening careful to post operated patient	10(2.8)	24(6.9)	6(1.7)	160(46.2)	146(42.1)	312(90.1)
Perceived capacity of surgeon	0(0)	12(3.4)	2(0.5)	134(38.7)	198(57.2)	334(96.5)
Perceived capacity of nurses	6(1.7)	28(8.0)	8(2.3)	204(58.9)	100(28.9)	312(90.1)

Overall Patient Satisfaction toward Post-Operative Care

According to the patient satisfaction survey, 284 (82.1%) of respondents were happy with post-operative care. Overall, 96(27.7%) of patients were very satisfied, 188(54.3%) were satisfied, 12(3.5%) were indifferent, 38(10.9%) were very dissatisfied, and 12(3.5%) were very dissatisfied with post-operative treatment.

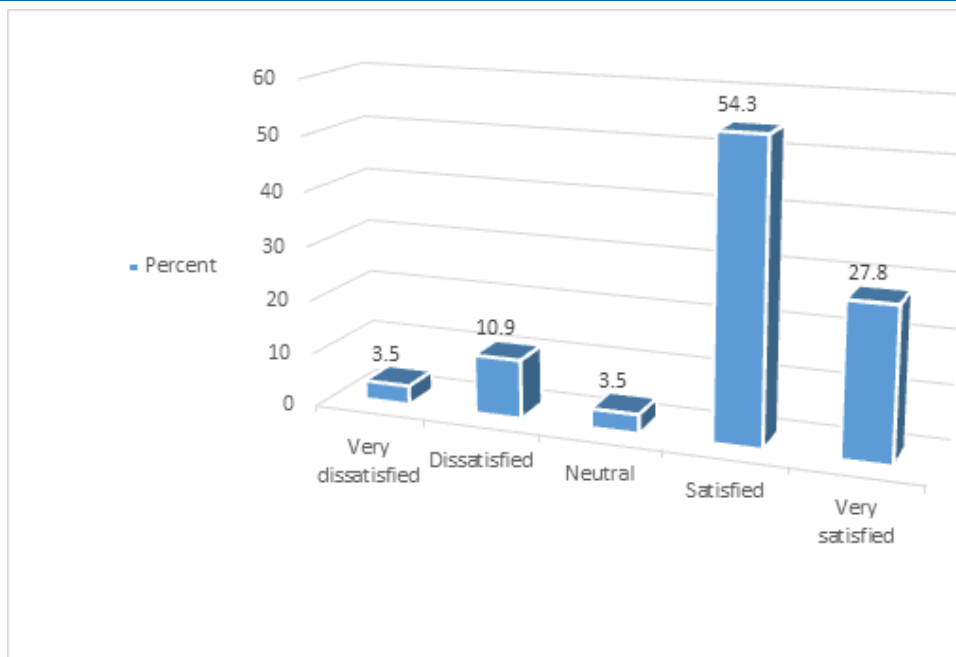


Figure 1: Over all patient satisfaction toward post-operative care, Zewditu hospital, Addis Ababa, 2021(n=346)

Discussions

The level of patient satisfaction with post-operative care in this study was 82.15 percent, which is low when compared to a similar study conducted in Gonder university referral hospital [17]. This discrepancy could be due to patient perceptions of the service provided and the study design, which only includes post-operative patients. The study's outcome was again very low when compared to studies conducted in Saudi Arabia and the United Kingdom which could be attributable to the high grade of treatment provided by this country [7, 16].

The adequacy of ward equipment and infrastructures, the condition of the bed, wardroom light, and ventilation were all areas where patients were dissatisfied with the hospital structure and service in this study, with 21.6 percent, 24.2 percent, and 7.5 percent, respectively. The findings were comparable to those of a similar study conducted in various hospitals which could be attributed to the same level of resource restrictions and the country's developing nature [12, 17].

The majority of patients were unsatisfied with the appropriateness of the service when it came to access to water, latrines, and hand-washing facilities, with 45 percent dissatisfied, the greatest dissatisfaction rate among the other factors in this study. The level of patient satisfaction with the diagnosis service is high. 92.4 percent said they were satisfied in overall. 73.4 percent of patients were extremely satisfied with the treatment's success. 65.3 percent of patients were satisfied with their access to the pharmacy, receiving medicine in the hospital, and receiving laboratory-radiology diagnostic. The payment of the operation satisfied 93 percent of the patients. These results were lower than those of a similar study con-

ducted in Eastern Ethiopia which could be related to differences in patient flow and variation in patient-perceived satisfaction [18].

The other important area was pain management after surgery, where 86.1 percent of the patients were satisfied, which is low when compared to studies done in Gonder and Jimma [12, 17]. This could be due to relatively high patient flow rates, which cause medication scarcity and is very low when compared to studies done in the developed world (8, 10). Patient satisfaction with the surgeon's and nurses perceived abilities was 96.5 percent and 90.1 percent, respectively. This conclusion was slightly higher than that seen in research conducted at Tikur anbassa specialized and Gonder university hospital which could be attributable to differences in patient-perceived satisfaction [17, 19]. The biggest sources of patient dissatisfaction in post-operative care were 10.1 percent of nurse visits and 19 percent of nurse treatment behavior, according to this study. This finding suggests that patient dissatisfaction was higher than in research conducted at Jimma University Hospital, Tikur Anbassa Hospital, and Gonder University Hospital [12, 17, and 19]. The discrepancy could be related to the study design, as this one focused solely on post-operative patients, whereas the other examined at all patients.

Conclusion

Overall, patient satisfaction with post-operative care was low when compared to similar studies conducted in the country, and the appropriateness of the service, as well as nurse treatment and behavior, were noted as areas of unhappiness in the patient response. But the majority of patients were satisfied with the health professionals' perceived capacity.

Recommendations

The hospital structure and services, such as access to water, latrines, and washing facilities, as well as access to pharmacy, laboratory, and diagnostic services, should be improved by stakeholders and hospital managers. Nurses should pay special attention to patient complaints.

Additional research is needed to assess the overall quality of care provided by this facility.

Limitation of the Study

A cross-sectional survey that focuses solely on post-operative patient satisfaction may not accurately reflect the hospital's entire service. And merely considering satisfaction rate did not take into account other elements.

Abbreviations

BPR - Business process engineering,
FMHACA - Food, Medicine and Health Care Administration and Control Authority
GYN-gynecology,
ICU-intensive care unit
OR -Operation room
OPD-out patient department
UK -United Kingdom
USA - United States of America
WHO- World health organization.

Authors' Information

GA MSc in Integrated Emergency Surgery, (GYN.obs& General surgery) and worked as a Lecturer & Department Head in College of Medicine and Health Sciences of Kotebe University of Education Department of surgical Nursing,

SB MSc in Integrated Emergency Surgery, worked as a Lecturer in College of Medicine and Health Sciences, of Kotebe University of Education Department of surgical &AA BSc in Surgical Nursing worked as an Emergency coordinator in Res Desta Memorial hospital.

Author Contributions.

GA designed the study, developed the questionnaire, supervised the data collection, analyzed the data, and wrote the paper.

SB & AA supervised the data collection and contributed to the interpretation of the findings as well as the drafting and writing of the manuscript. All authors read and approved the final manuscript.

Acknowledgments

Material funding for the study comes from Kotebe University of Education Menelik II Medical & Health Sciences College Department of Surgical Nursing. We appreciate Zewuditu Memorial Hospital Medical Office's assistance in managing the data collection

process. We'd also want to acknowledge the support of Menelik II Medical & Health Sciences College Surgical Nursing students in coordinating and assisting the data collection process.

Financial Support

No funding was received for the conduction of the study or manuscript preparation

Consent for Publication

Not applicable as the manuscript contains no any individual person's data in any form including individual details, images or videos.

Availability of Data and Materials

All data are within a manuscript. However, the data set is available from the authors upon reasonable request through the email address of aylewasegidew@gmail.com and with permission of the college within a college library.

Competing Interests

Authors declare that they have no competing interests.

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