

A study to assess the quality of life among cancer patients in Atal Bihari Vajpayee Regional Cancer Centre, Agartala, West Tripura.

**Bithika Debnath
(Tutor)**

Agartala Government Nursing College,
Agartala, West Tripura.

Email: bithika.debnath74@gmail.com

Abstract

Cancer and its therapies have a significant influence on the physical, emotional, and social quality of life (QoL) of patients. To improve patient care and support, it is critical to understand these implications. to assess the quality of life (QoL) and determine the factors affecting the health of cancer patients at the Atal Bihari Vajpayee Regional Cancer Centre in Agartala, West Tripura. In this cross-sectional research, 150 cancer patients undergoing treatment at the Centre were included. QoL was evaluated using the European Organization for Research and Treatment of Cancer Quality of Life Questionnaire (EORTC QLQ-C30).

We gathered and examined clinical and demographic data to investigate the relationships between quality of life and variables such cancer kind, therapy type, and stage of illness. The information showed a strong correlation between the kind, stage, and duration of treatment for patients' diseases and their quality of life. Both physical and mental functioning showed significant effects; those undergoing chemotherapy had a poorer quality of life than those undergoing radiation or surgery. Social interactions and role-playing were also severely impacted. A strong association was seen between a reduced quality of life, an advanced stage of the disease, and a higher symptom load.

Keywords: Quality of life, cancer patients, EORTC QLQ-C30, Atal Bihari Vajpayee Regional Cancer Centre, Agartala, supportive care.

Introduction

It is anticipated that the prevalence of cancer would rise, which presents a serious risk to both public health and the economy. According to a recent research, 9.6 million people die from cancer each year. [1,2]. The present changes in epidemiology and demography may have an impact on the observed growing trend in cancer mortality.[3]. In Bangladesh, cancer ranks as the second most prevalent cause of death. [4]. For cancer patients, one of the most significant health issues is quality. A specific type of all-encompassing result that patients believe to include their social, economic, psychological, and physical activities is known as a Patient-Reported outcome (PRO). [5,6]. Because of improvements in early diagnosis, treatment, and medical research, cancer patients should expect to live longer. Consequently, there has been an increased focus on studying the health-Related Quality of Life (HRQOL) of cancer survivors.

As a result, meeting the requirements of cancer patients is crucial to their ability to lead healthy lives. [7]. People who are diagnosed with cancer and undergo treatment often experience depression, insomnia, and a general decline in their quality of life. Thus, developing treatments that will enhance the prognosis of cancer patients requires an understanding of their quality of life..[7,8 Similarly, quality of life assessment aids people in comprehending how health, sickness, and therapy impact quality of life. It also facilitates decision-making by helping to weigh the potential benefits and drawbacks of a therapy. Cancer and its numerous therapies have an array of effects on patients' nutritional health, including modifications to their physiological and psychological functioning. Reduced food consumption may cause a patient's nutritional state to worsen, which would lower their quality of life.[9]. Depending on the kind of cancer and its position along the cancer continuum—from early exposure to a carcinogen to early identification, treatment, and survival—social variables can have a wide range of effects on the disease.[10] Every stage of the cancer continuum is impacted by social variables, including diagnosis, treatment, prevention, and end-of-life care. The hospital that cancer patients select has an effect on their quality of life as well. [11]. Examining the impact of these socioenvironmental determinants on quality of life and their relationship to other performance indicators, such as nutrition and status, is crucial. Even Nonetheless, a number of studies conducted on populations in the West have demonstrated a link between nutritional quality and life satisfaction. [12,13], To the best of our knowledge, relatively few trustworthy and well-conducted studies have looked at the nutritional condition in Bangladesh. These studies have determined the nutritional status of the patients using dietary evaluation, laboratory testing, or anthropometric measurements. [14,15]. Closing this research gap is critical in an area as sensitive Moreover, there isn't much worldwide study on the relationship between it and nutritional health and performance status. Therefore, the current study aims to explore the association between nutritional performance level and quality of life in cancer patients.

People often experience depression, insomnia, and a diminished quality of life following a cancer diagnosis and course of treatment. Therefore, developing medicines that will improve the prognosis of cancer patients requires a thorough understanding of their quality of life.

Research on cancer changes and saves lives. The goal of cancer research is to provide safe and efficient techniques for the diagnosis, treatment, and ultimate prevention of the class of diseases known as cancer.

Objectives of the Study:

1. To assess the quality of life among cancer patient using QOL questionnaire.

Research of Methodology

Schematic Presentation of Research Methodology in Present Study: -

Research approach

(Quantitative research)

Research design

(Descriptive study)

The investigation was conducted at the Agartala, West Tripura, Tal Bihari Vajpayee Regional Cancer Centre.

Cancer patients at the Atal Bihari Vajpayee Regional Cancer Centre are the target audience.

Accessible Population: Cancer patients at the Tal Bihari Vajpayee Regional Cancer Centre who were present on research days and are willing to take part

Sample technique (convenient sampling)

Sample size (100)

Tools for Data Collection

**(Section A-Structured questionnaire for demographic characteristics and
Section B- WHO-Quality of Life -Brief Version questionnaire for assessing quality of life)**

Data collection (12.6.23 to 25.6.23)

Data collection method (survey)

Data analysis (Descriptive statistics)

Reporting & research finding

Variable of the study: -There are two types of variables they are-

1. self-structured Socio demographic data and
2. WHO-QOL-BREF questionnaire has been used in this study.

Methods of Data Collection: The relevant authorities were formally requested for authorization to carry out the study. The Atal Bihari Vajpayee Regional Cancer Centre in Agartala, West Tripura, was the site of the most current investigation.

When doing the final research, the strategy was adhered to. Convenient sampling was used to choose the cancer patients (both OPD and IPD) at the Atal Bihari Vajpayee Regional Cancer Centre. After being made aware of the study's objectives, asked for their consent to participate, and given an opportunity to get to know one another, one hundred cancer patients were chosen to be included in the study. The period of data collection was 12.6.23–25.6.23. The interview took fifteen to twenty minutes on average to finish.

Tool used in Data collection:

In this study tools consist of two sections.

Section A: - self structured demographic variable

Here are some of the sample variables that are covered in the interview schedule: age, sex, religion, family type, number of children, educational background, marital status, and employment position.

Section B: -WHO-QOL-BREF questionnaire: scoring instruction

		Equation for computing domains score	Raw score	Transformed score
Domain 1	Physical health	$Q3+Q4+Q10+Q15+Q16+Q17+Q18$ $3+2+4+4+4+4+4$	25	63
Domain 2	Psychological	$Q5+Q6+Q7+Q11+Q19+Q26$ $4+4+3+3+3+2$	19	56
Domain 3	Social relationship	$Q20+Q21+Q22$ $2+2+2$	6	25
Domain 4	Environment	$Q8+Q9+Q12+Q13+Q14+Q23+Q24+Q25$ $4+4+3+5+3+4+4+4$	31	75

Clients are far less happy with their physical state (Physical Health = 63) than they are with their environment (Environment = 75), according to the World Condition Organization Quality of Life BREF. The most alarming information comes from the client's reports of having bad social interactions (Social Relationship = 25) and poor psychological health (Psychological Health = 56). The customer also mentioned having a low level of overall health satisfaction

and a decent overall quality of life. The total domain score of 54.75 was attained, indicating a moderate degree of perception.

Plan for data analysis

The collected data will be examined in light of the goals, and an organizing and presenting strategy will be devised using descriptive analysis.

- ✓ Organizing the data in a master sheet.
- ✓ Demographic data would be analyzed using descriptive statistics i.e., using frequency and percentage.
- ✓ Frequency and percentage distribution of the sample character

Data analysis and interpretation

Organization of The Findings

The following parts include an organization and presentation of the study findings:

SECTION A:

- ❖ Using frequency and percentage, describe the research samples based on socio-demographic factors.

SECTION B:

- ❖ Assessment of quality of life of cancer patient by using frequency and percentage

SECTION-A

Subject distribution based on socio-demographic factors for both groups, expressed as frequency and percentage.

Table:1

Demographic characteristics	Category	Respondents	
		Frequency	Percentage
Age	18-33yrs	43	43%
	34-49yrs	42	42%
	50yrs and above	15	15%
Sex	Male	40	40%
	Female	40	40%
Religion	Hindu	47	47%
	Muslim	48	48%
	Christian	5	5%
Types of family	Nuclear	57	57%
	Joint	39	39%
	Extended	4	4%

The majority of the samples, or 43% of the total, were from nuclear families (57%), belonged to the Muslim community (48%), had a sex proportion of 50%, which indicates that the ratio of males to women was the same, and were between the ages of 18 and 33.

TABLE 2.

Demographic characteristics	Category	Frequency	percentage
No. of child	No child	40	40%
	Single child	50	50%
	Two child	8	8%
	More than two child	2	2%
Educational qualification	No formal education	40	40%
	Primary education	42	42%
	Secondary education	11	11%
	Higher secondary education	7	7%
Marietal status	Married	54	54%
	Unmarried	40	40%
	Divorced	6	6%
Employment status	Govt employee	48	48%
	Self-employed/private job	38	38%
	Retired	3	3%
	unemployed	11	11%
Income	Below 5000	24	24%
	5001-15000	51	51%
	Above 15000	25	25%

The poll's findings revealed that 54% of the sample was married, 48% was employed by the government, 51% earned between \$5001 and \$15,000 a year for their home, 50% had just one child, and 42% had finished elementary school.

SECTION B:

Table 3

The distribution of percentages and frequency of physical health-related quality of life among cancer patients (Domain 1). Domain 4: Environmental health: N = 100

Domain	category	Frequency	percentage
Physical	< 63	85	85%
	>63	7	7%
	63	8	8%

Result revealed that 85% quality of life in regarding to physical health is not satisfactory.

Table 4

In the psychological health domain (domain 2), the frequency and percentage distribution of quality of life among cancer patients, with 100 patients,

Domain	category	Frequency	percentage
Psychological	< 56	77	77%
	>56	15	15%
	56	8	8%

Result revealed that 77% quality of life in regarding to psychological health is below average.

Table 5

Frequency and percentage distribution of cancer patients' quality of life in the domains of social relationships (domain3), N=100.

Domain	category	Frequency	percentage
social	< 25	0	0%
	>25	96	96%
	25	4	4%

Result revealed that 96% quality of life in regarding to social relation is highly satisfactory.

Table 6

Frequency and percentage distribution of quality of life of cancer patient in the areas of Environmental health (domain4) N=100

Domain	category	Frequency	percentage
Environment	< 75	99	99%
	>75	0	0%
	75	1	1%

The patient's maximum perception of the surroundings is subpar.

The WHO's assessment of a cancer patient's quality of life According to QOL BREF,

- Accept social domain another field of domain is very poor.

Table 7
Mean domain of quality of life of cancer patient

	Category	percentage	Mean
Physical Psychological	< 63	85	65.25
Social	< 56	77	
Environment	< 25	0	
	< 75	99	
Physical	>63	7	29.5
Psychological Social	>56	15	
Environment	>25	96	
	>75	0	
Physical	63	8	3.25
Psychological	56	8	
Social	25	4	
Environment	75	1	

The findings indicate that 65.25 percent of respondents had a low quality of life, 29.5% had a tolerable quality of life, and 3.25 percent had an average level of satisfaction.

Implication

The current study has implications for nursing research, nursing practice, nursing education, and nursing administration in terms of understanding staff and student quality of life.

This form can be used by administrators and students to evaluate the patients' quality of life in the clinical duty area.

Limitations

Study is limited to

- Small sample size.
- One particular institution.
- Limited time period.

This Study Can Be Conducted with Larger Sample in Larger Area and Other Patients Also.

Conclusion

According to the study's demographic parameters, 43% of the samples were in the 18–33 age range; The male to female ratio was the same, as indicated by the 50% male sample; 48 percent of the research sample came from the Muslim community, 57 percent were from nuclear households, 50 percent had just one kid, 42 percent had completed elementary school, and 48 percent were married. additionally

Stated otherwise, the research sample's quality of life is not satisfactory, as reported by 65.25 percent of respondents, 29.5% of whom reported a good quality of life, and 3.25 percent of whom reported average satisfaction. The WHO QOL BREF results show that there is very little acceptance of the social domain in other domains. To improve patients' quality of life and give them more control over their illness and treatment plan, effective symptom management Techniques Must Be Developed.

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