A Study to Assess Health Related Quality of Life (HRQOL) among Cardiac Patients Attending Out Patient Department in a Selected Hospital, Dehradun, Uttarakhand with a View to Develop Need-Based Education

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Abstract: *Heart is the vital pumping organ in human body. Cardiovascular disease occurs when there are any anatomical, physiological or pathological changes in normal and healthy structure of the heart and its blood vessels. Aim of the study was to evaluate the Health-related quality of life (HRQOL) among cardiac patient.* *Methodology: A descriptive research design was used to assess the HRQO of Cardiac disease Patients, 158 samples were selected by purposive sampling technique and Data was collected by SF-36 tool (HRQOL) with Structured Interview method.* *Results: The finding shows thatdomains wise Mean and standard deviation of Physical functioning (39.04 ± 12.07) General health (48.77 ± 20.72) revealed below average HRQOL whereas Energy/fatigue (51.68 ± 17.38), Emotional wellbeing (50.67 ± 7.79) showed near average HRQOL while Role limitations-PH (53.45 ± 40.41), Role limitations-EP (56.45 ± 37.64), Social functioning (59.84 ± 16.81), Pain (67.37 ± 18.45) indicated better than average HRQOL.* *Conclusion: The findings of the study concluded that HRQOL of the cardiac disease patients were affected. Thus, health education programs are needed to enhance the knowledge about Causes, risk factor, sign symptoms and prevention which may help to reduce the mortality of cardiac disease and also improve the HRQOL.*

Keywords: Health related quality of life (HRQOL), Cardiac Patients

1. Introduction

In the different part of the India approximately 1.3 billion people with the cultural diversities and lifestyle, and also various attempts to made to collect the cardiovascular disease burden. But there is no any comprehensive analysis available to compare the current trends of the risk factors of the CVD in India. [1,2]

Cardiovascular diseases (CVD) are primary causes of early death and also important cause of morbidity. Cardiovascular risk management (CVRM) included counselling on moderation on way of living, preventative measures, regular monitoring of high blood pressure [3]. Cardiovascular disease (CVD) accounts for one of the dominating causes of disability and death, also a serious public health issue worldwide. Prevention regarding primary care of CVD is essential. It involves lifestyle counselling, medical management to reduce the cholesterol level, weight control, and monitoring of vital sign such as blood pressure. Health-related quality of life (HRQOL) is essential regarding patient's perspective which presents theworking capability and outcome of the sickness and it ensure the effect of therapy. Patrick and colleagues proposed that "functional states, social opportunities, impairment, perceptions that are affected by treatment, disease, injury.

HRQOL is considered an essential measure in identifying therapeutic interferenceregarding client suffering with long term sickness such as chronic renal failure, heart disease,in-patient care,representing standard of efficacy and effectiveness. This standard changed as a result of introduction regarding perspective of medicine such as "bio psychosocial". Evaluation of HRQOL is gradually becoming significant in the management of cardiac patients. It is believed to have better QOL then the length of life.

2. Literature Review

Laila M. Matalqah, Khaldoon M. Radaideh et al (2018) had done study on associated factors in relation to HRQOL in Northern Jordanian people. Study was to measure HRQOL in Northern Jordanians. 915 samples were selected from three shopping centres. interview method was used to collect the data with SF-36 Questionnaire. Result revealed that gross score of SF-36 for the 915 participants were 71.2. Females stated lesser SF-36 scores in the domain of physical functioning and emotional health, which was related to age elderly participant were reported lowermost score in physical health domain. Physical health domain sensationally affected by health-related problems e.g. rheumatoid arthritis, back pain, overweight, asthma and emotional health was adversely affected by economic status.[4]

Kyoungrim Kang (2018) conducted a longitudinal study on HRQOL in patients with MI, trends and predictors in South Korea. The study was to observe the alteration score of HRQOL in the patients over the acute stage of MI and determine important analysis of HRQOL immediately after the MI (within a few days) and at 3 months after coming out from hospital. Participants were selected from 2 tertiary hospitals in South Korea. 150 participants completed self-report questionnaires at few days of MI experience and136 participants three months with follow-up. Study concluded that HRQOL scores improves significantly 3 months with fallow-up as compare to within days.[5]

Problem Statement
A study to assess Health Related Quality of Life (HRQOL) among Cardiac Patients attending Out Patient Department in a Selected hospital, Dehradun, Uttarakhand with a view to develop need-based education.

Objective
To assess the Health-Related Quality of Life (HRQOL) of cardiac patients attending OPD.

3. Material and Methods

In present study Quantitative Research approach was used, Purposive sampling technique was to select 158 Cardiac patients Himalayan Hospital, Dehradun, Uttarakhand. Pretesting was done on 5 cardiac disease patients by using demographic variables of patients and standardised SF-36 (Short form-36) tool to check whether the language of the tool is understandable, have any difficulty in answering the questions.SF-36 tool contains total 36 health related questionnaire. The test retest method was used to find out reliability of the standardised SF-36 tool and it was established as **r = 0.97.** standardised SF-36 was used for data collection and scoring was calculated by online SF-36 score calculator. 158 cardiac patients were selected after taken written consent and interview method was used for Data collection.

4. Analysis and interpretation

S. No.	Domain of HRQOL	No. of items	Max. Score	Obtained Score Range	Mean $\pm$ SD
1	Physical functioning	10	100	10-88	39.04 $\pm$ 12.07
2	Role limitations (PH)	4	100	0-100	53.45 $\pm$ 40.41
3	Role limitations (EP)	3	100	0-100	56.45 $\pm$ 37.64
4	Energy/fatigue	4	100	25-80	51.68 $\pm$ 17.38
5	Emotional well being	5	100	40-82	50.67 $\pm$ 7.79
6	Social functioning	2	100	38-100	59.84 $\pm$ 16.81
7	Pain	2	100	40-100	67.37 $\pm$ 18.45
8	General health	5	100	45-65	48.77 $\pm$ 20.72

Table No. 1 Illustrate Score of each domain range from 0-100. Higher obtained score indicated better health status. Except pain (higher score indicated less pain). Score 50 indicated average health related quality of life, score less than 50 indicated below average health related quality of life, and score more than 50 indicated better health related quality of life than average.

5. Discussion

The findings of the present study showed that Mean and standard deviation of domains of HRQOL i.e. Role Limitation due to Physical Health was (53.45 $\pm$ 40.41), Role limitations due to Emotional Problem (56.45$\pm$37.64), Social functioning(59.84+16.81), Pain (67.37$\pm$18.45) showed better than average HRQOL, Emotional Wellbeing (50.67 $\pm$ 7.79) showed average HRQOL whereas Physical functioning (39.04 $\pm$ 12.07) and General health (48.77 $\pm$ 20.72) showed less than average HRQOL. Thesefindings were supported with a study conducted by Lins, Liliane., Carvalho, Martins. Fermando, et al. on HRQOL of medical students which revealed that mean score of Role limitation due to emotional problem was (41.6$\pm$ 13.6) and social functioning was (42.7 $\pm$10.7) which were low at the level of normal mean score (50.0).[6]

6. Conclusion

The findings of the present study concluded that cardiac patients are having less than average HRQOL in some domains such as Physical functioning and General Health that is why there is a need of continue health counselling which was provided by written leaflet (Pamphlet) for cardiac patients who attend Cardiac OPD and come for follow up.

7. Acknowledgment

References

[1] Brigham and Women's Hospital / Heart and circulatorysystem available fromhttps://www.sharecare.com/health/circulatory-system-health/heart-beat-year
[2] CNXStax, Anatomy & Physiology, https://courses.lumenlearning.com/nemcc-ap/chapter/heart-anatomy/physiology
[3] Patrick DL, Erickson P. Health Status and Health Policy: Quality of Life in Health Care Evaluation and Resource Allocation. Oxford University Press. 1993;1–478.
[4] Matalqah Laila M. Radaideh, Khaldoon M. Khatatbeh, Moawiah M. Omari, Omar Al. Factors Associated with Health-Related Quality of Life among a Northern Jordanian Population. Epidemiology Biostatistics and Public Health. 2018' 15(1): e12680-1-e12680-8.
[5] Kang K, Gholizadeh L, Han HR, Inglis SC. Predictors of health-related quality of life in korean patients with myocardial infarction: a longitudinal observational study. Heart Lung. 2018 Mar - Apr;47(2):142-148

[6] Lins l., Carvalho M.F., Menezes S.M., Silva M.M., Damasceno H. Health Related Quality of Life of medicalstudent in a Brazilian student loan programme. 2016 July;

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