KNOWLEDGE AND PERCEPTION REGARDING RISK FACTORS OF MYOCARDIAL INFARCTION AMONG YOUNG ADULTS IN SELECTED HIGHER EDUCATIONAL INSTITUTIONS AT TRIVANDRUM

Author's Name: Arun A S[1], Akhila Ashok[2], Agnijith[3], Ananya Murali[4], Anjana Reghunath[5], Anju Rajan[6], Ann Mary Mathews[7], Ann Susan Achenkunju[8], Anna Ann Philip[9], Anupama Ravikumar[10], Aparna Ashok[11], Aparna Rajeev[12]

Affiliation:
1. Lecturer, Sree Gokulam Nursing College, Venjaramoodu, Trivandrum, Kerala, India.
2. Lecturer, Vijaya College of Nursing, Kottarakkara, Kollam, Kerala, India.
 3-12. students {BSc Nursing}, Sree Gokulam Nursing College, Venjaramoodu, Trivandrum, Kerala. India.

Corresponding Author Name & Email Id: Arun A S, arunashok88@gmail.com

ABSTRACT

Myocardial Infarction (MI) is a term which is used for defining the necrosis in the heart muscle due to the lack of oxygen need of myocardium which cannot be supplied by coronary arteries. This study was conducted to assess the knowledge and perception regarding the risk factors of Myocardial Infarction among the young adults in selected higher educational institution in Trivandrum. Objectives: (1) To assess the knowledge regarding risk factors of Myocardial Infarction among young adults. (2) To assess the level of perception regarding risk factors of Myocardial Infarction among young adults. (3) To find the correlation between knowledge and perception regarding risk factors of Myocardial Infarction. Quantitative research approach was adopted for the present study. Results: most of the subjects were belonged in the age group of 18 to 25 years have varying knowledge and perception regarding risk factors of Myocardial Infarction. Regarding the age group, majority 90% of the subjects were in the age group of 18-20 years, 78% of the subjects were males and 22% were females among which highest 96% were unmarried and 4% were married. 68.2% lives in urban area. Majority 56.4% of the subjects belongs to nuclear family. When considering the family history of myocardial infarction, 70.90% had no family history of Myocardial Infarction. Out of the 100%, 50% had knowledge regarding Myocardial Infarction. Regarding alcohol consumption 84.60% were non-alcoholic. Regarding the percentage distribution of subjects according to their knowledge and perception, majority 77% had average knowledge. The result revealed that majority of young adults had average knowledge and perception regarding risk factors of Myocardial Infarction. When level of knowledge increases perception also increases, so there is significant relation between level of knowledge and perception.

Keywords: Myocardial Infarction, Perception, Knowledge, Risk factors

INTRODUCTION

Myocardial Infarction colloquially known as "Heart Attack" is a serious medical emergency caused by decrease or complete cessation of blood flow to the myocardium, causes tissue death or necrosis Myocardial Infarction may be "silent" and go undetected or it should catastrophic event leading to hemodynamic deterioration and sudden death.

Coronary artery disease is the most common cause of death and disability in world wide. Based on the 2015 mortality data from National Health Interview Survey, Myocardial Infarction Mortality was 114,023 and Myocardial Infarction any mention mortality (that is Myocardial Infarction is mentioned as a contributing factor in the death certificate) is 151,863. Based on atherosclerosis risk in community (ARIC) Performed by National Heart, Lung, Blood Institute (NHLBI) collected between 2005 and 2014, the estimated annual incidence is 605,000 new MIs 200.000 recurrent Myocardial Infarction

Myocardial Infarction among young adults (<25years) represent a considerable proportion of total heart incidence. The underlying pathophysiologic characteristic such as atherosclerotic plaque features and other risk factor profile differ in young and older patient with Myocardial Infarction Young patients with MI often have eccentric atherosclerotic plaque with inflammatory features, and are more likely to be smokers, obese and have poor lifestyle, such as inactivity and alcohol intake. Compared to older Myocardial Infarction patients, younger are more likely to have combined hyperlipidemia and increased level of lipoprotein. In addition Myocardial Infarction in younger patients may be due to the use of cannabis, cocaine and androgenic anabolic steroids. Better understanding of risk factors anatomic and pathophysiological process in young adult patients can improve Myocardial Infarction prevention and treatment.

There are various risk factors of Myocardial Infarction. Among them some are modifiable and others are non modifiable. The major risk factors of myocardial infarction are physical activity, smoking, alcohol consumption, diabetes mellitus, hypertension, stress, family history, age, gender, etc.

RESEARCH PROBLEM

A descriptive study to assess the knowledge and perception regarding risk factors of Myocardial Infarction among young adults in selected higher educational institution at Trivandrum.

OBJECTIVES

➢ To assess the knowledge regarding risk factors of Myocardial Infarction among young adults.

➢ To assess the level of perception regarding risk factors of Myocardial Infarction among young adults.

➢ To find the correlation between knowledge and perception regarding risk factors of Myocardial Infarction.

MATERIAL AND METHODS

Quantitative research approach and a descriptive research design was adopted to accomplish the study objectives. Convenient sampling technique was used to select 110 young adults of Muslim Association College of Engineering, Venjaramoodu. Permission was taken from the higher authorities of Muslim Association College of Engineering, Venjaramoodu. A sampling frame was prepared for those who fulfil the inclusive criteria of the current study. Researchers explained the main aim of the study.

Specification of the instrument and related measurement

Section A: Socio personal perfoma consists of 7 items.

Section B: Semi structured knowledge assessment questionnaire.

Instrument consists of 20 multiple choice questions to assess the level of knowledge regarding risk factors of Myocardial infarction. Each question has one right answer and three distracters, each right answer carries one mark. The total knowledge questionnaire score was 20 and graded as good, average and poor

Section C: self structured perception rating scale.

Instrument consists of 15 items with 5-point likert scale to assess the perception regarding risk factors of Myocardial infarction. The maximum score epected was 75 and minimum score was 15. Measurement of perception score was divided into three catagories like good, average and poor

RESULTS

1. Percentage distribution of socio-personal variables among young adults

The young adults who belongs to the age group of 18 to 25 years have varying knowledge and perception regarding risk factors of Myocardial Infarction. Regarding the age group, majority (82%) of the subjects were in the age group of 1820 years, 18% of the subjects were in the age group of 21-23 years and 2% of the subjects were in the age group of 24-25 years. When considering gender, 78% of the subjects were males and 22% were females among which 96% were unmarried and 4% were married. Regarding the place of residence, 68 2% lives in urban area while 31 8% lives in rural area. Considering the percentage distribution of subjects according

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to their religion, 59.1% were Muslims, 34.5% were Hindu, 5.5% were Christian and 0.9% belongs to others. When considering the family history of Myocardial Infarction, 70.90% had no family history of Myocardial Infarction while 29.10% had family history of Myocardial Infarction and also 50% had no previous knowledge regarding Myocardial Infarction and 50% had previous knowledge regarding Myocardial Infarction. Out of the 100%, 50% had knowledge regarding Myocardial Infarction, among which 30% got information through mass media, 10% from healthcare workers, 9.10% from seminars and 3.60% acquired knowledge through experience. Regarding alcohol consumption 84.60% were non-alcoholic, 14.50% were alcoholic and 0.90% were ex-alcoholic and regarding tobacco use 86.40% were nonsmokers, 12.70% were smokers and 0.90% were ex-smokers.

2. Table I: frequency and percentage distribution of subjects based on level of knowledge regarding riskfactors of myocardial infarction among young adults

n=110

VARIABLE	FREQUENCY (F)	PERCENTAGE (%)
Good	34	30.9
Average	42	38.2
Poor	34	30.2

Table I shows that 34 subjects (30.9%) had good knowledge, 42 subjects (38.2%) had average knowledge and 34 subjects (30.9%) had poor knowledge regarding risk factors of myocardial infarction

3. Table II: frequency and percentage distribution of subjects based on level of perception regarding risk factors of Myocardial Infarction among young adults.

n=110

VARIABLE	FREQUENCY (F)	PERCENTAGE (%)
Good	25	22.74
Average	84	76.36
Poor	1	0.9

Table II shows that 25 subjects (22.74%) had good knowledge, 84 subjects (76.36%) had average knowledge and 01 subjects (0.9%) had poor knowledge regarding risk factors of myocardial infarction

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4. Table III. mean and standard deviation of knowledge regarding risk factors of Myocardial Infarction among young adults.

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n=110

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VARIABLE	MEAN (X)	STANDARD DEVATION
knowledge	10.17	4.55
perception	51.65	7.86

Table III shows that mean and standard deviation of knowledge is 10.17 and 4.55 respectively and mean and standard deviation of perception is 51.65 and 7.86 respectively

5. Table IV. Correlation between knowledge and perception regarding risk factors of Myocardial Infarction among young adults.

riable	an	andard deviation	iability	arson's correlation
owledge	17	4	96	.001
rception	65	6		

Table IV shows that reliability of the tool is 0.496 and the Pearson's correlation is less than 0.001. With regards to the mean and standard deviation of knowledge, results were 10.17 and 4.55 respectively and the mean and standard deviation of perception results were 51.65 and 7.86 respectively. Table shows that perception increases with level of knowledge. So there is significant relation between knowledge and perception.

DISCUSSION

The study showed majority 90% subjects were in age group of 18-20 years. 78% subjects were males, 96% subjects were unmarried, 62% subjects lives in urban areas. 56.4% subjects belongs to nuclear family, 70.90% subjects had no history of Myocardial infarction, 84% subjects were non-alcoholic, 86 40% were non-smokers Out of 100%, 50% have knowledge regarding Myocardial infarction among which 30% got information through mass media.

Regarding the percentage distribution of subjects according to their knowledge and perception, majority 38.2% had average knowledge, 30 9% had good knowledge, 30.2% had poor knowledge. Regarding perception majority 76.36% had average perception, 22.74% had good perception,

0.9% had poor perception. With regards to the mean and standard of knowledge, results were 10.17 and 4.55 respectively and the mean and standard deviation of perception results were 51.65 and 7.86 respectively

Pearson's correlation of knowledge and perception is <0.001 shows that perception increases with level of knowledge. So there is significant relation between knowledge and perception

CONCLUSION

This research study conducted to assess the knowledge regarding risk factors of Myocardial Infarction, to assess the level of perception regarding risk factors of Myocardial Infarction and to find out the correlation between knowledge and perception regarding risk factors of Myocardial Infarction among young adults. The result revealed that majority of young adults had average knowledge and perception regarding risk factors of Myocardial Infarction. When level of knowledge increases perception also increases; so there is significant relation between level of knowledge and perception.

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