

## Assessing the Knowledge Regarding Basic Life Support among Young Adults

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### Abstract

Basic life support is a specific level of pre-hospital medical care provided by trained responders, including emergency medical technicians, in the absence of advanced medical care. The primary goal of basic life support is to provide oxygen to the heart and brain and to sustain tissue viability until definitive electrical or medical treatment can restore the circulation. This can be done by an individual who has a basic knowledge about basic life support, through which a life can be saved. Hence, the study was undertaken to assess the level of knowledge on basic life support among young adults in a selected college of Thrissur. The objectives of the study were to assess the level of knowledge on basic life support among young adults, and to associate the level of knowledge on basic life support among young adults with their selected demographic variables. The design of the study was descriptive and was conducted among 60 young adults from St. Thomas College, Thrissur. The samples were selected by using purposive sampling technique. Data was collected by using structured knowledge questionnaire regarding basic life support. The result showed that 2(3.33%) samples had poor knowledge, 53(88.33%) had average knowledge and 5(8.33%) had good knowledge. There is significant association between the level of knowledge regarding basic life support among young adults with their selected demographic variables. The study concluded that, majority of the young adults had average knowledge on basic life support.

**Keywords:** Basic life support; Advanced cardiac life support; Cardiopulmonary resuscitation; Automated external defibrillator.

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## INTRODUCTION

Cardiac arrest remain a public health crisis. There are 7 lakh out-of-hospital cardiac arrest (OHCA) cases annually in India. The incidence of Emergency Medical Service (EMS) assessed that non traumatic OHCA in people of any age is estimated to be 1000 people each day. The value of early cardiopulmonary resuscitation

(CPR) is that it can buy time for Primary cardiac arrest by producing enough blood flow to the central nervous system (CNS) and myocardium to maintain temporary viability. Basic Life support is the foundation for saving life after cardiac arrest.

### Need and Significance of the Study

Life support skills and training save lives as it takes care of critical medical emergencies such as cardiac arrest. Without immediate and appropriate attention, out-of-hospital cardiac arrest victims and the obstructed airways can lose their lives. Medical emergencies occur when least expected. The victims survival is dependent on whether there is a skilled professional to provide the necessary care. Whenever a person is not breathing, they are likely to die within a few minutes. However, with high quality CPR, the rescuer can keep the victim alive for some time by maintaining blood circulation within the body, especially with vital organs.

The need for the study is to assess the knowledge regarding basic life support among young adults and this will help the people to cope up with the present situation of inadequacy of knowledge regarding basic life support.

### Statement of the Problem

A study to assess the knowledge regarding basic life support among young adults in a selected college, Thrissur.

## **OBJECTIVES**

1. To assess the knowledge regarding basic life support among young adults.
2. To find out the association between the knowledge regarding basic life support among young adults in a selected college, Thrissur.
3. To prepare and distribute an information booklet regarding basic life support

### Hypothesis

**H<sub>1</sub>:** There is a significant association between the level of knowledge of young adults regarding basic life support with their selected demographic variables.

## **METHODOLOGY**

**Research Approach:** Quantitative research

approach.

**Research Design:** Descriptive survey design

**Sample:** Young adults (18-26) who were studying in physics and English department at St. Thomas College, Thrissur.

**Sample Size:** 60

**Setting of the Study:** St. Thomas College, Thrissur

**Sampling Technique:** Purposive sampling technique

### Criteria for Sample Selection

#### **Inclusion Criteria**

- Young adults who are willing to participate
- Young adults who are studying in St. Thomas College
- Young adults who are present at the time of data collection

#### **Exclusion Criteria**

- Young adults who are not available during data collection
- Young adults who are above 24 years or below 18.
- Young adults who are technically trained

### Description of Tool

#### **Section A:** Socio-demographic profile

It consisted of 5 items which includes age, gender, department of study, family income and sources of information regarding basic life support.

**Section B:** Structured knowledge questionnaire regarding basic life support.

Structured knowledge questionnaire consisted of 30 questions regarding basic life support. The questions were structured multiple choice questions with one correct answer and three distractors. Each correct response carried 1 mark and wrong answer carried zero mark. The maximum score was 30 and minimum, zero.

#### **Score Interpretation**

Score	Category	Percentage (%)
0-10	Poor	3.33
10-20	Average	88.34
20-30	Good	8.33

**Section C:** Information booklet regarding Basic Life Support

**Procedure for Data Collection**

Data collection was done on 11-10-2022. A formal administrative permission was obtained from principal of St. Thomas College, Thrissur and principal of Aswini College of Nursing.

**RESULT FINDINGS**

**Section A:** Description of socio demographic variables of young adults

**Table 1:** Frequency and percentage distribution of socio demographic variables of young adults with respect to their age in years, gender, income, department and sources of information

Socio Demographic Variables	Frequency (n)	Percentage (%)
<b>Age</b>		
18-20 years	12	20
20-22 years	45	75
22-24 years	3	5
<b>Gender</b>		
Male	12	20
Female	48	80
Others	0	0
<b>Income</b>		
10,000-20,000	20	33.3
20,000-30,000	8	13.3
>30,000	32	53.3
<b>Department</b>		
English	35	58
Physics	25	42
<b>Sources of Information</b>		
Health Magazines	10	16.7
Health Professionals	11	18.3
Campaign	7	11.7
Others	32	53.3

**Section B:** Description of the knowledge on basic life support among young adults

**Table 2:** Frequency and percentage distribution of the level of knowledge regarding the basic life support among the young adults

Level of knowledge	Frequency (n)	Percentage (%)
Poor	2	3.33%
Average	53	88.34%
Good	5	8.33%

**Section C:** Description of the association between level of knowledge on basic life support among young adults with selected demographic variables.

**Table 3:** Association between the level of knowledge on basic life support among young adults with their demographic variables such as age, gender, income, department, sources of information

Demographic variables	Level of knowledge			Statistical Value
	Poor	Average	Good	$\chi^2$
<b>Age</b>				
18-20	0	13	0	$\chi^2=54.083^*$
20-22	1	38	5	TV= 5.99
22-26	0	3	0	
<b>Gender</b>				
Male	1	10	0	$\chi^2=7.155^*$
Female	0	44	5	TV= 3.84
Others	0	0	0	
<b>Family Income</b>				
10,000-20,000	1	19	0	$\chi^2=3.966Ns$
20,000-30,000	0	8	0	TV= 5.99
>30,000	0	27	5	
<b>Departments</b>				
English	1	33	1	$\chi^2=9.528^*$
Physics	0	21	4	TV=3.84
<b>Source of Information</b>				
Health Magazine	0	9	1	$\chi^2=14.402^*$
Health professional	0	11	0	TV=7.82
Campaign	0	6	1	
Others	1	28	3	

\*-Significance at 0.05 level Ns-Non significance

**DISCUSSION**

**Objective 1:** To Assess the level of knowledge on basic life support among young adults

The analysis of the study shows that among 60 young adults 53(88.34%) having average level of knowledge on basic life support and 5(8.33%) having good knowledge and 2(3.33%) having poor knowledge on basic life support.

**Objective 2: To Associate the knowledge on basic life support with selected demographic variables.**

In the present study, it is evident that there is association between the level of knowledge on basic life support among young adults with selected demographic variables such as age ( $\chi^2=54.083$ ), gender ( $\chi^2=7.155$ ), departments ( $\chi^2=9.528$ ) and sources of information ( $\chi^2=14.402$ ).

**Objective 3: To Prepare and Distribute an information booklet regarding basic life support**

An information booklet was prepared by investigator regarding basic life support. It was validated by the experts in the subject. Basic life support is a level of medical care which is used for patients with life threatening illnesses or injuries until they can be given full medical care by advanced life support providers [paramedics, nurses, physicians]. After assessing the knowledge, the information booklet was distributed to the sample in regional language.

## CONCLUSION

Young adulthood is a unique developmental period during which there are key developmental tasks that allow the young adults to participate in self exploration and identity formation. So providing basic life support training during young adulthood exhibits successful results in saving lives as it takes care of critical emergencies such as cardiac arrest. Thus, the investigators identified that an information pamphlet would really be an effective tool and asset for creating awareness on the basic life support among young adults.

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