

Cognition and Knowledge of First Aid Procedures amongst Adolescents in India- An Original Epidemiological Study

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ABSTRACT

Aim and Objective: The most cardinal impetus of the study is to explore and probe the cognition and knowledge amongst adolescents in India in pertinence to the awareness of first aid procedures in India. **Materials and Methods:** A total of 800 adolescents were subject to a cross-sectional investigation that was orchestrated in the year 2015. The divisions were allotted based on the male/female quota of the subjects and also based on whether the person had undertaken an authorized tutelage for first aid or not. The codified statistics was accumulated by the use of a questionnaire. The questionnaire which was formulated was composed of a set of 15 appurtenant questions. **Results:** The exploration very evidently disclosed that the cognition and knowledge amongst the females concerning the first aid practice was admirable in contrast to the males group. Furthermore, the data suggested that the cognition and knowledge far exceeded in adolescents who had derived authorized tutelage in first aid. **Conclusion:** The study was attempted to acknowledge the cognition with regard to the first aid procedures amongst the adolescents from varied places in the country of India. There is a possibility of fortuity in the enhancement of comprehension amongst who had not received the formal tutelage for First Aid. An inadequate training has led to the necessity to accomplish the task of making the authorized tutelage mandatory in the education system of the country.

KEYWORDS: First Aid; Tutelage; Training; Adolescents

INTRODUCTION

Indubitably, trauma in the form of injury or contusion is accountable for one out of ten deaths in the world. Usually, the prey to these situations are the younger generations. A data suggests that people in age group of 20-50 years are subjected to death due to trauma accountable for around 20-25%.¹ Some of the patients are subject to death in the hospital right after a traumatic experience.² Data has also clearly suggested that a majority of the traumatic patients capitulate to the injuries even before the health personnel can reach the location.³ Even if the patient is not involved in a traumatic accident, an insightful knowledge on cardiopulmonary resuscitation can help save a person who is undergoing a cardiac arrest.⁴ Time and again, incidents have evidently demonstrated that if the people around a person suffering from a life-threatening traumatic experience have basic tutelage with regard to first aid procedures, they may be able to save a person's life. Therefore, the study was conducted to establish whether the person without any formal training has enough knowledge to tackle an emergency situation as compared to those with the conventional training.

Currently, the estimated number is close to one and a half million for deaths associated with mortality due to vehicular accidents as compared to just under a million in the year 1990. In such cases, if an appropriate training is made available to the bystanders, a tremendous change

can be brought about in the mortality rate. Hence, it is highly imperative that along with the medical personnel, all the civilians must receive primary education for the optimum utilization of the first aid procedures. In most cases, the fundamental care provided to the victim play a vital role in the future prognosis of the subject.⁵

Literature has established that the notion of first aid tutelage has been an integral part of human civilization ever since its origin. With the passage of time and superior understanding of medical conditions, a standard decorum has been maneuvered. The primary theoretical curriculum was first devised by two officers namely Mr. Shepherd and Mr. Duncan.⁶ The correct explanation of the terminology first aid help is the primary succor provided to a living organism who tends to be deteriorating due to a traumatic experience with the sole purpose of conserving the human life and prevent the situation from escalating.

MATERIALS AND METHODS

Materials:

- Adolescent females with authorized tutelage
- Adolescent females without authorized tutelage
- Adolescent males with authorized tutelage
- Adolescent males without authorized tutelage
- Questionnaire for collection of data

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Method: An assiduously designed study was driven amongst 800 adolescents in India. The statistical data was derived by through the medium of a questionnaire. The meticulously designed questionnaire dwelled with a set of 15 questions in pertinence to the cognition and knowledge of first aid. The further analysis on the basis of the collected questionnaire consisted of vivid groups based on the gender and the authorized tutelage of the subjects.

The groups in scrutiny have been distributed into 2 groups:

A) Gender B) Tutelage

A) Gender – 1) Females

2) Males

B) Tutelage – 1) With authorized tutelage

2) Without authorized tutelage

Questionnaire:

Q.1. Explain the clear connotation of first aid.

Q.2. Explain the fundamental purpose of first aid.

Q.3. Explain the basic step in consideration of management of a traumatic emergency.

Q.4. Describe a few bulletin points for the design of a first aid room in a local primary healthcare center.

Q.5. Describe the ABC in the primary care of a trauma victim.

Q.6. Mention the number of compressions carried out while considering CPR in a child until 8 years of age.

Q.7. Mention the number of compressions carried out while considering CPR in an adult.

Q.8. Mention how deep is a compression carried out in a child while performing CPR.

Q.9. Mention how deep is a compression carried out in the adult while performing CPR.

Q.10. Mention the important primary steps considered in the management of an unconscious person.

Q.11. What is the correct method to check the breathing of an unconscious person?

Q.12. Describe the most appropriate procedure to check the pulse of an unconscious person?

Q.13. What is the correct method to achieve proper clotting in a victim of an external hemorrhage?

Q.14. Describe the appropriate first aid treatment for a person suffering from a minor sprain.

Q.15. Describe the first aid treatment in a case of an automobile accident.

RESULTS

The results of the epidemiological research can be clearly understood with the help of Figure 1 and Figure 2 which shows the bar chart and the pie chart representation for displaying the contrast between the appropriate response and inappropriate response. The mean percentage of appropriate response of 86.40% has been noticed in females who have received authorized tutelage in first aid in contrast to the mean percentage of appropriate response of 44.86% that has been noticed in females who have not received any authorized tutelage in first aid.

Moreover, the mean percentage of appropriate response of 80.00% has been noticed in males who have received authorized tutelage in first aid in contrast to the mean percentage of appropriate response of 36.40% that has been noticed in males who have not received any authorized tutelage in first aid. Clearly the females with the authorized tutelage in first aid have been the most

Question	Appropriate Response (%)	Inappropriate Response (%)	Total Adolescents (200)
1	87	13	200
2	83	17	200
3	95	05	200
4	86	14	200
5	97	03	200
6	83	17	200
7	89	11	200
8	75	15	200
9	78	22	200
10	69	31	200
11	95	05	200
12	99	01	200
13	86	14	200
14	74	26	200
15	100	00	200
MEAN PERCENTAGE OF APPROPRIATE RESPONSE = 86.40%			

Table 1 – Breakdown of Data – 200 adolescent females with authorized tutelage in first aid

Question	Appropriate Response (%)	Inappropriate Response (%)	Total Adolescents (200)
1	65	35	200
2	79	21	200
3	59	41	200
4	31	69	200
5	49	51	200
6	07	93	200
7	10	90	200
8	06	94	200
9	19	81	200
10	37	63	200
11	70	30	200
12	59	41	200
13	75	25	200
14	36	64	200
15	71	29	200
MEAN PERCENTAGE OF APPROPRIATE RESPONSE = 44.86%			

Table 2 – Breakdown of Data – 200 adolescent females without authorized tutelage in first aid

Question	Appropriate Response (%)	Inappropriate Response (%)	Total Adolescents (200)
1	87	13	200
2	91	09	200
3	84	16	200
4	65	35	200
5	98	02	200
6	91	09	200
7	81	19	200
8	65	35	200
9	61	39	200
10	73	27	200
11	81	19	200
12	85	15	200
13	71	29	200
14	67	33	200
15	100	00	200
MEAN PERCENTAGE OF APPROPRIATE RESPONSE = 80.00%			

Table 3 – Breakdown of Data – 200 adolescent males with authorized tutelage in first aid

Question	Appropriate Response (%)	Inappropriate Response (%)	Total Adolescents (200)
1	64	27	200
2	51	41	200
3	59	38	200
4	03	91	200
5	25	79	200
6	05	97	200
7	03	91	200
8	00	100	200
9	37	57	200
10	56	39	200
11	25	70	200
12	65	29	200
13	43	50	200
14	35	69	200
15	75	15	200
MEAN PERCENTAGE OF APPROPRIATE RESPONSE = 36.40%			

Table 4 – Breakdown of Data – 200 adolescent males without authorized tutelage in first aid

Type	Appropriate (%)	Inappropriate (%)
Females- Authorized Tutelage	86.40	13.60
Females-Without Authorized Tutelage	44.86	55.14
Males- Authorized Tutelage	80.00	20.00
Males- Without Authorized Tutelage	36.40	63.60

Table 5 – Contrast Of Results Amongst Vivid Groups

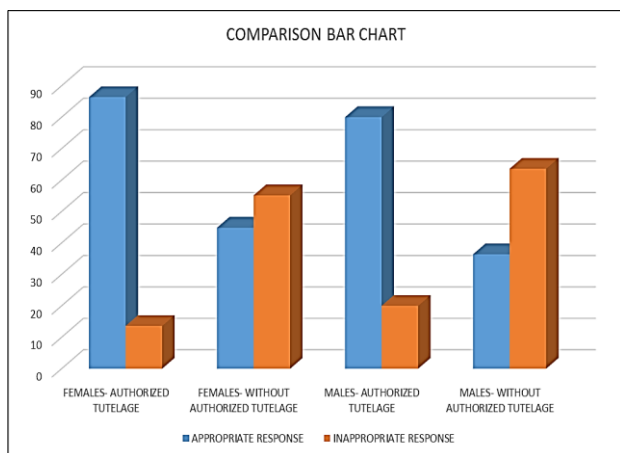


Figure 1. Bar Chart – Comparing The Appropriate And Inappropriate Response Based On Division Of Groups

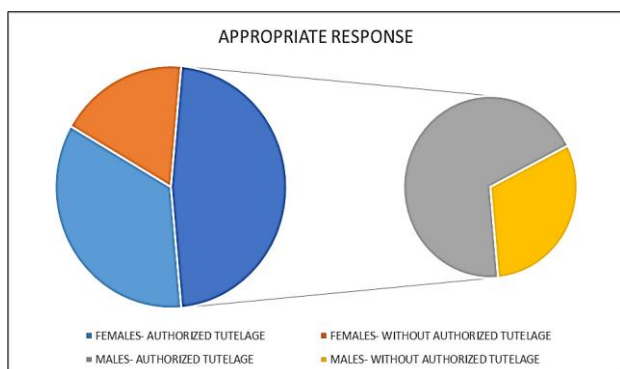


Figure 2. Pie Chart – A Representation Of Contrast Between The Appropriate And Inappropriate Response

appropriate amongst the group divisions while the males without the authorized tutelage in first aid have been the least appropriate amongst the group divisions.(Table 1-5)

DISCUSSION

The comprehensive study has distinctly demonstrated the contrasting nature in regard to the cognition and knowledge of first aid procedures amongst adolescents in India. Apparently the evidence suggests that the females are superior in the knowledge of first aid procedures when compared to the males. In each sex group, individuals with formal tutelage have performed incredibly better in contrast to the individuals without any formal tutelage. The bar chart and pie chart clearly suggests that it is imperious that the formal tutelage of first aid should be made mandatory in the educational system in the country. Moreover, the provision of study material as well optimum curriculum should be made along with the adequate infrastructure.

CONCLUSION

The cardinal purpose of the epidemiological study was to estimate the cognition and knowledge of first aid procedures which would help evaluate whether it should be a part of mandatory education in the country. With the vehicular accidents and incidents of cardiac arrest on a splurge, it is highly suggestible to make each individual proficient in primary methods of first aid.

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