Effectiveness of Video Assisted Teaching program me on knowledge regarding first aid management of children with convulsion among Primary School Teachers working in selected primary schools of Belgravia.

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## ARTICLEINFO

#### ABSTRACT

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Convulsion is a common neurological problem in children. Many convulsion disorders have their origin in childhood. Nearly two-third of convulsion disorder can be treated easily by them without the need for the specialist. In ancient times convulsion was considered as curse of evils. Today also people with convulsions are facing superstitions to this disease, this attitude can be changed once the scientific cause of this condition is defined and the public is aware through education (WHO).7

**Objective:** To assess the effectiveness of Video Assisted Teaching programme on knowledge regarding first aid management of children with convulsion among Primary School Teachers.

Method: Quantitative research approach with pre-experimental, one group pretest posttest research design was adopted. 50primary school teachers working in selected schools were selected for the study by using convenient sampling technique. Data was collected by using two questionnaires likewise sociodemographic profile of the samples and structured questionnaire on assessment of knowledge regarding first aid management of children with convulsion among primary school teachers.

Result: The findings revealed that, during the pretest 19(38%) had poor knowledge and 31(62%) had average knowledge, whereas in posttest 14 (28%) had average knowledge and majority 36(72%) had good knowledge regarding first aid management of children with convulsion among primary school teachers. No significant association found between the pretest knowledge scores and selected socio-demographic variables of primary school teachers.

Conclusion: The investigator concluded that majority of primary school teachers' knowledge regarding the first aid management of convulsion was average and some had poor knowledge. The posttest knowledge scores were highly significant when compared with pretest scores. So Video Assisted Teaching program was considered as an effective strategy to enhance the knowledge of primary school teachers.

#### Keywords: Assess Knowledge, Convulsions, Children and Primary School Teachers.

#### Introduction

The brain consists of nerve cells that communicate with each other through electrical activity. A seizure occurs when one or more parts of the brain has a burst of abnormal electrical signals that interrupts normal brain signals. When child has two or more seizures with the known cause, is called as epilepsy. Epilepsy is a brain condition that causes a child to have recurring seizures over time.1In India the prevalence of epilepsy is5.9 per 1000 population, wherein 6-8 per 1000 population begins at adolescent age and 50 % – 60 % of epilepsies begin before age of 16 years.<sup>2</sup>

Teachers are the builders of nation by creating the young minds as a responsible citizen. They play a vital role in shaping the future of every child by focusing on their whole growth. Hence it is important for every primary teacher to

# Need for the study?

Convulsion affects all age groups, but for children a variety of issues exists that can affect one's childhood. Some convulsive attacks end after childhood; some forms of convulsions are associated only with conditions of childhood that cease once a child grows up. Approximately 70% of children who suffer convulsion during their childhood eventually outgrow. There are also some seizures, such as febrile seizures, that have one time occurrence during childhood and do not result in permanent epilepsy: <sup>3</sup>

The prevalence of epilepsy varies from 4 to 10 per 1000 population (the lower figures in developed countries, while the higher figures in developing countries.<sup>4</sup>

have knowledge regarding childhood illnesses like epilepsy, its first aid management.

The Yelandur survey10 conducted in rural South India estimated the prevalence to be 3.28-5.71/1000, 5 whilst the more recent Uttarakhand survey11 found a prevalence of 2.27 per 1000 population.<sup>6</sup>

The child's quality of life and potential adult roles will be greatly impacted by the school years. The potential consequences of seizures can be serious, including fractures, dislocations, soft tissue injuries, head trauma, aspiration pneumonia, and the rare but severe risk of sudden unexpected death. Primary school Teachers can involve in preventing complications due to sudden episode of seizures by providing first aid. Hence the researcher has undertaken a study to assess the effectiveness of Video Assisted Teaching program me on knowledge regarding first aid management of children with convulsion among Primary School Teachers.

#### Statement of the Problem

"A study to assess the effectiveness of Video Assisted Teaching program me on knowledge regarding first aid management of children with convulsions among Primary School Teachers of selected Schools in Belagavi."

#### Objectives of the study:-

To assess the knowledge regarding the first aid management of convulsion in children among primary school teachers of selected schools in Belagavi.

To determine the effectiveness of video assisted teaching programme on knowledge regarding first aid management of convulsion in children among primary school teachers of selected schools in Belagavi.

To find out the significant association between the posttest knowledge scores with selected socio-demographic variables of primary school teachers.

# Hypothesis

H1: There will be significant difference between mean pretest and posttest knowledge scores among primary school teachers regarding first aid management of children with convulsion.

H2-

Therewillbesignificant association between posttest knowled ge scores with selected socio-demographic variables.

#### Assumptions

Primary school teachers may possess some knowledge regarding first aid management of children with convulsions. Video Assisted Teaching programme may enhance the knowledge of primary school teachers regarding first aid management of children with convulsions.

#### Delimitations

The study will be limited to 50 primary school teachers who are working in selected schools of Belagavi.

The studydurationislimitedto4-6weeks.

The review of literature:

Reviews related to knowledge regarding first aid management of children with convulsion among primary school teachers

A cross-sectional study was undertaken to assess the knowledge, awareness and attitude about epilepsy among school teachers in Haryana, India. 450 primary school teachers were selected for the study to random sampling technique. Standard knowledge questionnaire was used to collect data through survey method. Results: the median and mean of knowledge scores of teachers were 6.3±7.23 respectively. The study concluded that teachers were having overall good knowledge regarding epilepsy and it's first aid and were possessing positive attitude towards epilepsy.7

A cross sectional study was conducted to assess the knowledge of epilepsy and seizure first aid among teachers in Jeddah, Saudi Arabia. The convenient sampling technique was used to select 822 teachers and self administered questionnaire was distributed to teachers to assess their necessary demographic data and their knowledge about epilepsy and seizure first aid. Results: The majority of participants had moderate knowledge of epilepsy and lacked first aid training. Most participants recognized epilepsy as a Neurological disorder, and 42.2% have witnessed a seizure in school. There was a significant relationship between knowledge scores of teachers and their qualification (P-value=0.037) as well as knowledge score and witnessing a seizure (P- value=0.046). the study concluded that as teachers were having moderate knowledge regarding epilepsy and it's first aid and recommends educational campaigns on epilepsy and it's first aid.8

Reviews related to effectiveness of teaching programme regarding first aid management of children with convulsion among primary school teachers

A Pre-experimental study was conducted to assess the effectiveness of planned teaching programme on knowledge regarding epilepsy management in school children among primary school teachers working in selected primary schools at Malur, Kolar, Karnataka. The samples size was 25 teachers in experimental group and 25 in control group selected by stratified random sampling technique. The Structured selfadministrated questionnaire was used to collect data. Results: The mean post test knowledge (16.72  $\pm$  2.99) was higher than mean pre test knowledge scores (5.4 ± 2.69). In pre-test 84% respondents had inadequate knowledge, 16% had moderate and no one had adequate knowledge. In posttest in experimental group 66% had adequate & 44% had moderate knowledge and in control group 84% of respondents had inadequate knowledge, 16% had moderate knowledge and no one of the respondents had adequate knowledge. The study concluded that nurses play an important role in imparting knowledge and helping primary school teachers to be aware of management of epilepsy in school children9.

A Quasi experimental study was conducted to assess the effectiveness of self-instructional module on knowledge regarding emergency management of epilepsy among school teachers in selected area of Jalgaon, Maharashtra in January 2019. The research approach used was evaluative approach. The high school teachers were the samples and by using probability simple random sampling technique were selected. The structured knowledge questionnaire was used to collect data from samples. Results: The analysis of mean S.D, and mean percentage of the knowledge score in pre-test and post-test revealed that the mean percentage in pre-test was 12.45% where as in post-test 14.21%. The study shows that the self-instructional module on knowledge regarding emergency management of epilepsy was effective.10

# Research methodology:

Research approach and Research design

A pre-experimental, one group pretest posttest

Design with quantitative approach was used in the study.

The study was conducted in Bharatesh English medium school of Belagavi District.

Population

#### Results:

Major findings of the study:

Section1: Socio-demographic variables of Primary school teachers.

Table No.1: Frequency and percentage distribution of primary school teachers.

The	present	study's	population	were	primary	school
teacl	ners work	ing in sel	ected schools	s of Bel	agavi Dist	rict.
Inde	pendent v	ariable:				

Video Assisted Teaching Programme.

Dependent variable:

Knowledge regarding first aid management of children with convulsion.

Sample and sample size:

Total enumerated Sample consist of50primary school teachers working in Bharatesh English Medium school Belagavi District.

Sampling technique:

Non-probability, convenient sampling technique was used for the study.

Description of the tool

The tools were divided into two parts:

Section I: Socio-demographic data of primary school teachers.

Section II: Structured questionnaire on the knowledge of first aid management of children with convulsion. The knowledge questionnaires included 30 structured questions which were based on knowledge regarding first aid management of convulsions in children. Each correct answer carried one mark and the total score was 30.

SI. No.	Socio-demographic variables	Frequency	Percentage				
	Age group						
	1)21-30	10	20%				
1	2)31-40	20	40%				
	3)41-50	10	20%				
	4)51-60	10	20%				
	Gender						
2	a) Male	8	16%				
	b) Female	42	84%				
	Religion						
	a) Hindu	31	62%				
3	b) Muslim	2	4%				
	c)Christian	11	22%				
	d)Others	6	12%				
	Total years of experience						
	a)0-10	28	56%				
4	b)11-20	16	32%				
	c)21-30	6	12%				
	d)31-40	0	0%				
	Experienced a child having convulsion						
5	a) Yes	29	58%				
	b) No	21	42%				
	Knowledge about convulsion and its management						
6	a) Yes	22	44%				
	b) No	28	56%				

ii. If yes then,	ii. If yes then,						
a) Training	6	27.27%					
b) Conference	8	36.36%					
c)Seminar	8	36.36%					
d)Workshop	0	0%					

Section 2: Assessment of effectiveness of video assisted teaching programme

Table 2: Effectiveness of video assisted teaching programme on knowledge regarding first aid management of convulsion in children among primary school teachers, Belagavi. N=50

Area of analysis	Mean	Median	Mode	Standard deviation	Range
Pretest	8.52	11	13	4.3856	12
Posttest	27.9	28	28	0.9741	3

The above table shows that the mean knowledge score obtained by the subjects in the pre-test was 8.52 with the standard deviation of 4.38 whereas the mean knowledge score obtained in the post test was 27.9 with the standard deviation of 0.97. Table 3: Frequency and percentage distribution of knowledge level in pretest and posttest. N=50

Knowledge level	Pre	test	Post test		
Kilowicage ievel	Frequency	Percentage	Frequency	Percentage	
Poor knowledge	19	38%	0	0%	
Average knowledge	31	62%	14	28%	
Good knowledge	0	0%	36	72%	

Table 3 reveals that in the pre-test 19(38%) had poor knowledge and 31(62%) had average knowledge. In post-test only 14(28%) had good knowledge and majority 36(72%) had average knowledge.

Table 4: Effectiveness of video assisted teaching programme on knowledge regarding first aid management of children with convulsion.

Test	Mean	SD	"t" test value	Level of significance
Pre test	8.52	4.3856	0.46	
Post test	27.9	0.9741	9.46	5

T49= 2.0010; p < 0.5 \* significant

Section 3: Findings related to association between the post test knowledge score with selected demographic variables of primary school teachers.

Table 5: Chi-square value showing the significant association between the post test knowledge score with selected demographic variables of primary school teachers. N=50

Characteristics	Poor knowledge	Adequate knowledge	Good knowledge	χ² Value	Inference			
1. Age	1. Age							
a. 21-30 years	0	1	9	χ <sup>2</sup> =2.380				
b. 31-40 years	0	6	14	Df= 6	(NS)			
c. 41-50 years	0	4	6	P= 12.592				
d. 51-60 years	0	3	7	. 11,001				
2. Gender								
a. Male	0	2	6	$\chi^2_{=0.051 \text{ Df}=2}$	(1)(5)			
b. Female	0	12	30	P=5.991	(NS)			

3. Religion					
a. Hindu	0	7	24		
b. Muslim	0	0	2	$\chi^2_{=2.997}$	
c. Christian	0	5	7	Df=6	(NS)
d. Others	0	2	4	P= 12.592	
4. Total years of experie	nce			L	
a. 0-10	0	7	21	<sub>γ2</sub>	
b. 11-20	0	4	12	$\chi^2_{=1.636}$	(NS)
c. 21-30	0	3	3	Df=6	(113)
d. 31-40	0	0	0	P= 12.592	
5. Experienced a child ha	ving convulsion an	d given first aid			
a. Yes	0	10	19	$\chi^2_{=1.439}$	
b. No	0	4	17	Df=2 P=5.991	(NS)
6. i. Knowledge about fi	rst aid of convulsior	1			
a. Yes	0	7	15	$\chi^2_{=0.284 \text{ Df}=2}$	
b. No	0	7	21	P=5.991	(NS)
ii.If yes then,	•				
a. Training	0	1	5		
b. Conference	0	3	5	$\chi^2_{=0.423 \text{ Df}=6}$ P= 12.592	(810)
c. Seminar	0	3	5		(NS)
d. Workshop	0	0	0		

Table 4: denotes that there is no significant association between the knowledge score on first aid management of convulsion with age, gender, and religion, total years of experience, ever experienced a child having convulsion, previous knowledge and the source of knowledge.

# **Implications for Nursing Education**

The student nurses from School of Nursing and College of Nursing should be encouraged to attend specialized courses and seminars regarding first aid management of children with epilepsy.

Implications for Nursing Practice and Administration

The study assists the nursing administrative authorities to initiate and plan training programs in schools for the school teachers about first aid management of epilepsy.

Implications for Nursing Research

The study helps the investigator to develop insight regarding primary school teachers' knowledge regarding first aid management of children with epilepsy.

## Recommendations

Based on the findings of present study, the following studies can be under taken to strengthen the research:

The study can be replicated with la rage sample size of teachers.

- A study can be conducted to prevent the complications of epilepsy.
- A similar study cans be repeated in different schools in various regions of the States or Nations so as to
- > To compare the results.
- The study can be conducted by including additional demographic variables.

#### Conclusion:

On the basis of findings, the investigator concluded that majority of primary school teachers' knowledge regarding the first aid management of convulsions was average and some had poor knowledge. The post-test scores of knowledge were highly significant when compared with pre-test scores. Hence the Video Assisted Teaching program was considered as an effective strategy to enhance the knowledge of primary school teachers.

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