

Effectiveness of Awareness Programme on Knowledge and Practice Regarding Management of Minor Ailments among Care Givers of Children Under 5 Years

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Received date: May 03, 2017; Accepted date: Jul 17, 2017; Published date: Jul 19, 2017

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Abstract

The aim of the study was to assess the effectiveness of awareness programme on knowledge and practice regarding management of minor ailments among care givers of children under 5 years in selected rural areas of Dehradun Uttarakhand. The objective of the study was to assess the effectiveness of awareness programme on knowledge and practice related to minor ailments among care givers of children under 5 years. A quantitative research approach was used for the study. Pre experimental one group pretest and posttest design was used in the study. The study was conducted in Dehradun. Systematic random sampling and consecutive sampling technique was used to select the study subjects. Data was collected from 57 care givers of under five children by conducting interview using structured knowledge questionnaire, self-reported practice check list. After that awareness programme was conducted on knowledge and practice regarding management of minor ailments among care givers of children under 5 years and the result shows that the mean posttest knowledge score and practice scores (20.74, 32.46) was higher than the mean pretest knowledge score and practice scores (14.37, 28.00) which was found statistically significant at $p < 0.05$. There was significant association between both knowledge and practice score with education and exposure of previous teaching of care givers on management of minor ailments in children under 5 years.

Keywords: Effectiveness; Awareness program; Knowledge and practice; Minor ailment

Introduction

The one who has a child, or has come in contact with child pick up a whole host of common ailments through contact with other children. This is inevitable, and is an essential step in the formation of a healthy immune system [1]. The concept of self-management in healthcare includes disease prevention, self-diagnosis, self-treatment and appropriate consultation with health care practitioners [2]. A minor ailment is defined as a health complaint which, by simple actions, patients could handle themselves [3]. Children are prone to various minor ailments. About 3/4th of children are considered unhealthy and surviving with impairment of physical and intellectual functions due to poor health status. Early detection and anticipation of those minor ailments may prevent impairment disability. It reduces morbidity and mortality especially due to severe dehydration caused from diarrhea and other complications of minor ailments [4]. Parents also tend to overestimate the seriousness of minor conditions [5]. Suffering from minor ailments is the most frequent episode in childhood experiences [6]. Fever is the most common symptom of childhood illnesses [7]. Child health encompasses approaches, interventions and strategies that preserves, protect, promote and restore health of children at individual and population level [8].

Background of the Study

The health of the child is very important not only they are assets and future of their families and nation but also because health status, health

behavior and life style thus formed during childhood determines quality of life during the following year of life [9]. Every 2 seconds a child is born and every minute 3 children under five die. Annually, over 10.6 million children in low and middle income countries including India die before they reach their 5th birthday. Most deaths among under five are still attribute to just a handful of conditions, and are avoidable through existing interventions. Poor or delayed care-seeking contributes to 70% of child death. There are number of ailments which can occur in children from one month to five year and cause morbidity and mortality. Some 80 percent of the world's under-five deaths in 2011 occurred in only 25 countries, and about half in only five countries: India, Nigeria, Democratic Republic of the Congo, Pakistan and China. India (24 percent) and Nigeria (11 percent) together account for more than a third of under-five deaths worldwide [10].

For conducting the present study researcher had done survey in the area of Doiwala block. It comprises of 2,000 populations. Researcher had visited 40 families by using convenient sampling technique. Out of 40 families researcher have selected 74 children and observed following findings (Table 1).

Through this survey researcher found that top five minor ailments are common that is fever, minor wound, Diarrhea, Dental carries and scabies. Hence these were made the major criteria for assessment.

Statement of problem

A study to assess the effectiveness of awareness programme on knowledge and practice regarding management of minor ailments

among care givers of children under 5 years in selected rural areas of Dehradun Uttarakhand (Figure 1).

Age group	Number of children
Newborn	1
Infant (up to 1 year)	5
Toddler (1 to 3 years)	13
Preschooler (3 to 6 years)	19
School age group (6 to 13 years)	27
Adolescent (13 to 18 years)	9
Total	74

Table 1: Numbers of children with particular age groups.

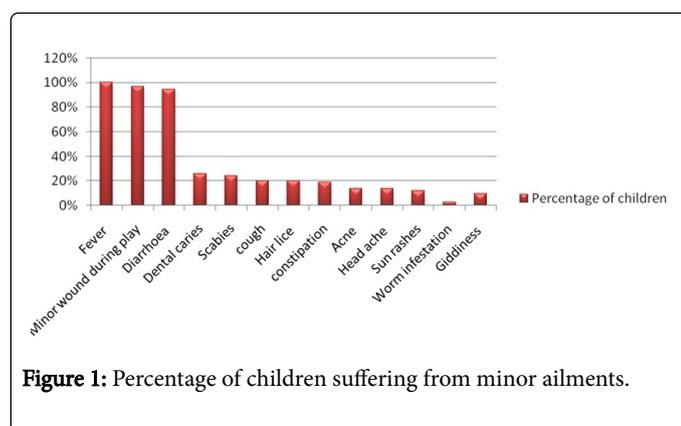


Figure 1: Percentage of children suffering from minor ailments.

Objectives of the study

1. To assess the pretest knowledge of care givers in the management of minor ailments of children under 5 years.
2. To assess pretest practice of care givers in the management of minor ailments of children under 5 years.
3. To assess the effectiveness of awareness programme on knowledge and practice related to minor ailments among care givers of children under 5 years.
4. To find the correlation between pre test knowledge score and pre test practice score of care giver in the management of minor ailments of children under 5 years.
5. To determine the association between selected socio-demographic variables with pretest knowledge of minor ailments among care givers of children under 5 years.
6. To determine the association between selected socio-demographic variables with pretest practice of minor ailments among care givers of children under 5 years.

Variables

- Independent variable: - Awareness programme regarding minor ailments.
- Dependent variable: - Knowledge based practice of family members regarding minor ailments.

- Extraneous variable: - Age, gender, education, relational ship of care giver with child.

Assumption

- Samples are the representative of the population.
- The family members of children under 5 years may have inadequate knowledge and poor practice regarding management of minor ailments in children under 5 years.

Hypothesis

H1: The mean post test knowledge score of care givers will be significantly higher than that of then mean pre test knowledge score in the management of minor ailment in children under 5 years.

H2: The mean post test practice score of care givers will be significantly higher than that of then mean pre test practice score in the management of minor ailment in children under 5 years

H3: There will be significant correlation between knowledge and practice of care giver in the management of minor ailment in children under 5 years.

Methodology

Design and setting

A quantitative research approach was used for the study. Pre experimental one group pretest and posttest design was used in the study. The study was conducted in Doiwala block, Dehradun.

Study sample

In the study area was selected through systematic random sampling and consecutive sampling technique was used to select sample from particular area. Sample size was 57 care givers of children under 5 years.

Data collection procedure

Data were collected from 57 care givers of children under 5 years. On first day socio-demographic characteristics of care giver were assessed which was followed by conducting pretest by giving knowledge and self-reported practice questionnaire to care givers on management of minor ailments (Fever, minor wound, diarrhea, dental caries and scabies) of children under 5 years. After that awareness programme on management of minor ailments were conducted. On eight day posttest was taken by using same tools.

Analysis and Interpretation

Analysis of study findings are organized under the following headings.

Section 1: Description of socio-demographic characteristics of study participants.

Section 2: Findings according to objectives of the study.

Section 1:- Socio-demographic characteristics of study participants

S. No.	Subject Profile	Frequency	Percentage
1	Gender of care giver	57	100
	· Female		
2	Age of child		
	· 2 yr	19	33.3
	· 3 yr	12	21.1
	· 4 yr	16	28.1
	· 5 yr	10	17.5
3	Gender of child		
	· Male	31	54.4
	· Female	25	43.9
4	Educational status of care giver		
	· Illiterate	6	10.5
	· Primary and middle school	23	40.4
	· High school and intermediate	14	24.6
	· Graduation and above	14	24.6
5	Occupation of care giver		
	· Housewife	53	93
	· Gov. or private employee	4	7
6	Total monthly family income		
	· 15001/- to 4500/-	5	8.8
	· 45001/- to 8000/-	7	12.3
	· 8000/- to 12000/-	6	10.5
	· Above 12000/-	39	68.4
7	Type of family		
	· Nuclear family	26	45.6
	· Joint family	31	54.4
8	No. of child in family		
	· One child	15	26.3
	· Two child	27	47.4
	· More than two child	15	26.3
9	Exposure of previous teaching		
	· Yes	21	36.8
	· No	36	63.2
N=57			

Table 2: Frequency and percentage distribution of socio-demographic characteristics of study participants.

Table 2 illustrates the frequency and percentage distribution of socio-demographic characteristics of study participants. All the participants were female, and (10.5%) were illiterate and most of them (93%) were housewife. Majority (68.4%) were having monthly income above Rs. 12000/-. More than half (54.4%) of participants belong to joint family and nearly two third (63.2%) had no exposure to previous health teaching regarding minor ailments of children under 5 years.

Section-II: Analysis and interpretation based on objectives of the study

Objective 1: To assess the pre test knowledge of care givers in the management of minor ailments of under-five children.

S. No	Types of minor ailments	Maximum possible score	Knowledge score (Mean ± SD)	Range	Mean percentage
1	Overall (23 items)	23	-	-	-
2	Dental caries	5	2.89 ± 1.34	0-5	57.8
3	Diarrhoea	4	2.26 ± 0.89	0-4	56.5
4	Fever	5	3.56 ± 0.96	1-5	71.2
5	Minor wound	5	3.28 ± 1.04	1-5	65.6
6	Scabies	4	2.32 ± 1.02	0-4	58

Table 3: The mean ± SD, range of pretest knowledge score of care giver regarding management of minor ailments.

The data presented in Table 3 showed that knowledge of care givers in management of minor ailments which were categorized in five categories were as follows i.e. dental caries with 2.89 ± 1.34, Diarrhoea with 2.26 ± 0.897, fever with 3.56 ± 0.96, minor wound with 3.28 ± 1.04 and scabies with 2.32 ± 1.02 knowledge.

Types of Minor ailments	Knowledge score (Mean ± SD)		Mean difference	95% Confidence Interval of the Difference		't' value	'p' value
	Pre test	Post test		Lower limit	Upper limit		
Overall	14.37 ± 3.27	20.74 ± 1.60	6.36	5.61	7.12	16.82	<0.001
Dental Caries	2.89 ± 1.34	4.51 ± 0.60	1.61	1.28	1.94	9.86	<0.001
Diarrhoea	2.26 ± 0.89	3.44 ± 0.56	1.17	0.89	1.45	8.41	<0.001
Fever	3.56 ± 0.96	4.37 ± 0.77	0.8	0.56	1.05	6.65	<0.001
Minor wound	3.28 ± 1.04	4.53 ± 0.53	1.24	0.94	1.54	8.26	<0.001
Scabies	2.32 ± 1.02	3.65 ± 0.61	1.33	1.07	1.51	10.18	<0.001

Table 5: Comparison between pretest and posttest knowledge score.

Paired sample 't' test was performed to compare the means of pretest and posttest knowledge scores (Table 5). The significant improvement knowledge score can be attributed to the awareness programme administered between pretest and post test.

Objective 2: To assess pretest practice of care givers in the management of minor ailments of children under 5 years.

Variable	Maximum possible score	Mean ± SD	Mean Percentage	Range
Practice of minor ailment	42	28 ± 2.64	66.6	0-42

Table 4: The mean ± SD, range of pretest practice score of care giver regarding management of minor ailments.

The data presented in Table 4 showed that practice of care givers in management of minor ailments of under five children were 28 ± 2.64.

Objective 3: To find the correlation between pre test knowledge score and pre test practice score of care giver in the management of minor ailments of children under 5 years.

In order to find out correlation between knowledge and practice of care giver of children under 5 years, Pearson's correlation coefficients r were computed.

H1: There will be significant correlation between knowledge and practice of care giver in the management of minor ailment in under-five children. The result shows that there was moderate positive correlation ($r=0.398$ at $p<0.005$) between pre-knowledge score and pre-practice score of care giver in the management of minor ailments of children under 5 years.

It can be interpreted that the higher the knowledge score better the practice of participants related to management of minor ailments of children under 5 years.

Objective 4: To assess the effectiveness of awareness programme on knowledge and practice related to minor ailments among care givers of under-five children.

H2: The mean post test knowledge score of care givers will be significantly higher than that of then mean pre test knowledge score in the management of minor ailment in children under 5 years.

The data presented in Figure 2 shows that mean percentage post test score in all areas were higher than that of mean pretest knowledge score.

H3: The mean post test practice score of care givers will be significantly higher than that of then mean pre test practice score in the management of minor ailment in children under 5 years.

Paired sample 't' test was performed to compare the means of pretest and posttest practice scores (Table 6). This shows that awareness programme was found to be effective in upgrading the practice of care giver regarding minor ailments in children under 5 years.

Objective 5: To determine the association between selected socio-demographic variables with knowledge of minor ailments among care givers of children under 5 years.

Pearson's correlation was calculated between age of care giver and their knowledge score regarding minor ailments. It revealed that there was no significant correlation between these two variables ($r=0.017$).

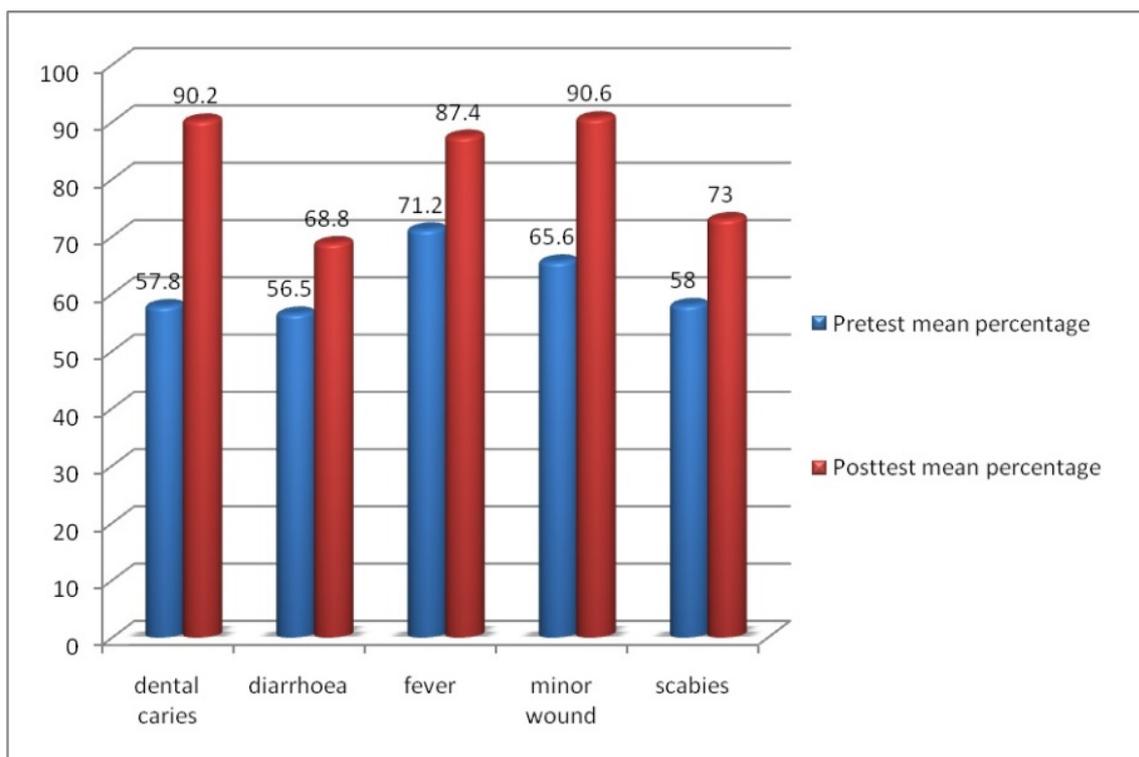


Figure 2: Comparison of area wise mean percentage of pretest and post test knowledge score of care giver.

Variable	Mean ± SD		Mean difference	95% Confidence Interval of the Difference		't' value	'p' value
	Pre test	Post test		Lower limit	Upper limit		
Practice score	28.00 ± 2.646	32.46 ± 2.91	4.456	3.68	5.22	11.56	<0.001*

Table 6: Comparison between pretest and posttest practice score.

One way Anova and independent t-test was performed to find out the association between knowledge score and selected socio-demographic variables.

There was significant association between education of participants and education ($p=0.007$). The data shows that higher the education level better the mean knowledge score.

Exposure of previous teaching is significantly associated with knowledge score ($p=0.016$). It can be interpreted from data that care-givers who had previous exposure of teaching had significantly higher knowledge score (15.71 ± 2.86).

Objective 6: To determine the association between selected socio-demographic variables with practice of minor ailments among care givers of children under 5 years (Table 7).

The data shows in Figure 3 depicts that age of care giver with practice of minor ailments among care givers of children under 5 years have negative correlation ($r=-1.89$ at $p<0.05$). One of the care givers age was 75. This doesn't influence calculation rather than it give information that care giver was Grandmother.

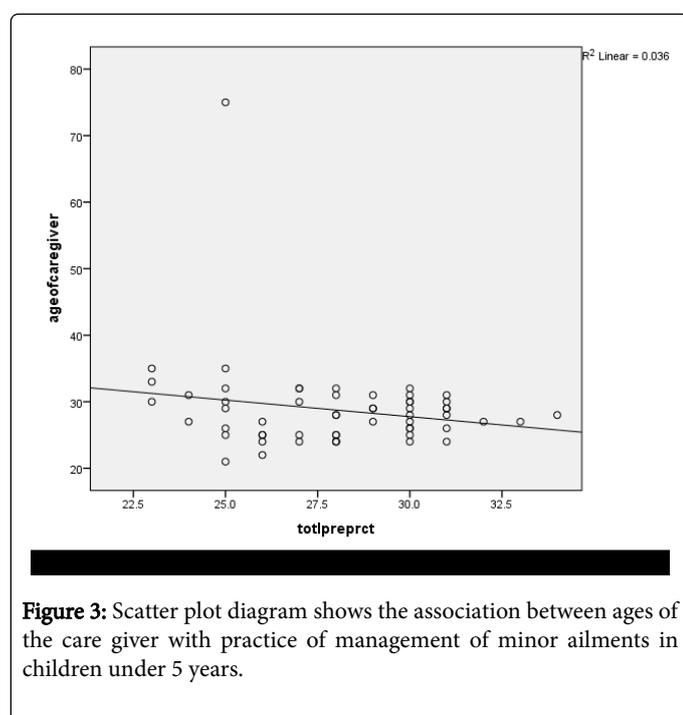
Variables	N	Mean ± SD		p value
Education of caregiver				
· Illiterate	6	13.17 ± 2.92	F=4.43*	0.007
· Primary school and Middle school	23	13.04 ± 3.24		
· High school and Intermediate	14	14.86 ± 3.00		
· Graduation and Above	14	14.37 ± 3.27		
Occupation of care giver		Mean rank		
· House-wife	53	28	Z=-1.66**	0.09
· Gov.employee and Private employee	4	42.25		
Family income				
· Rs. 1500-4500	5	14.40 ± 3.64	F=1.54*	0.21
· Rs. 4501-8000	4	13.29 ± 3.77		
· Rs. 8000-12000	6	12.17 ± 3.12		
· Above 12000	39	14.90 ± 3.27		
Type of family				
· Nuclear	26	14.19 ± 3.58	t=3.69***	0.713
· joint	31	14.52 ± 3.03		
Exposure to teaching				
· No	36	13.58 ± 3.27	t=2.47** *	0.01
· Yes	21	15.71 ± 2.86		
*One way Anova, ** Mann Whitney test , *** Independent t-test				

Table 7: Association between socio-demographical variable and pretest knowledge.

Variables	N	Mean ± SD		p value
Education of caregiver				
· Illiterate	6	24.83 ± 2.22	F=12.65*	<0.001
· Primary school and middle school	23	27.04 ± 2.05		
· High school and intermediate	14	28.57 ± 23.11		
· Graduation and above	14	30.36 ± 1.78		
Occupation of care giver		Mean Rank		
· House-wife	53	28.46	Z= -0.89	0.36
· Gov. employee and private employee	4	36.13		
Family income				
· Rs. 1500-4500	5	27.40 ± 2.96	F=1.91*	0.13
· Rs. 4501-8000	4	26.00 ± 2.16		
· Rs. 8000-12000	6	27.83 ± 2.99		

· Above 12000	39	28.46 ± 2.54		
Type of family				
· Nuclear	26	27.77 ± 2.48	t=0.60 **	0.55
· joint	31	28.19 ± 2.79		
Exposure to teaching				
· No	36	27.39 ± 2.45	t=2.47**	0.02
· Yes	21	29.05 ± 2.69		
*One way Anova ** Independent t-test				

Table 8: Association between socio-demographic variables with pretest practice.



One way Anova and independent t-test was performed to find out the association between practice score and selected socio-demographic variables.

There was significant association between education of participants and education ($p < 0.001$). The data shows that higher the education level better the mean practice score (Table 8).

Exposure of previous teaching is significantly associated with practice score ($p = 0.021$). It can be interpreted from data that care-givers who had previous exposure of teaching had significantly higher practice score (29.05 ± 2.69).

Discussion

The finding of present study shows that mean knowledge score at post level was higher than the mean score knowledge at pre-test level; depicting the effectiveness of awareness program. This study was supported with the experimental study done by Smriti et al. to carry

out a community based health and nutrition education intervention, focusing on several factors influencing child health with special in faces on diarrhea, in slum of Delhi of India. The 300 hundred mother of child aged 12-17 was collected. The result shows that after intervention there is improvement in knowledge and attitude of mothers [11]. The present study revealed that almost most of the caregiver doesn't use the thermometer for checking child temperature. The result of the study was supported by the cross-sectional study conducted by Zyoud, which showed that around two thirds of parents recognize fever in their children by non-measurement methods such as observing, by touching the child and only 31.6% measure the temperature [12].

Conclusion

It is concluded that Awareness Program on knowledge and practice regarding management of minor ailments was found effective in increasing knowledge and practice of care givers of children under 5 years.

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