



# "A Study to assess the Effectiveness of Self-Instructional Module on Knowledge regarding the Harmful Effects of over the Counter Medications among Parents of Children Admitted In selected Hospitals, Kanpur."

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## Abstract

Over the counter medication (OTC) means a drug that is taken without any doctor's prescription. Another word we known as non prescription medicines. In spite of, the accepted benefits of using an OTC medication, its use is still associated with capacity of risks like: patients being exposed to medication side effects, improper prolonged use, and use of overmuch dosage, drug-drug interactions, misdiagnosis, and overmuch treatment of serious illnesses like adults, sick children are commonly treated with OTC medication [1]. Pre-experimental design with pre-test and post-test with quantitative research approach used. Study was conducted in Rama Hospital and Research Centre, Mandhana Kanpur and Ursala Hospital Kanpur. 40 parents of children were selected by using non-probability convenient sampling technique. The result showed that out of 40 parents of children 8(20%) of them had inadequate knowledge and 31(77.5%) of them had moderate knowledge and 1(2.5%) of them adequate knowledge. After post test- out of 40 parents of children 1(2.5%) of them had inadequate knowledge and 30(75%) of them had moderate knowledge and 9(22.5%) of them had adequate knowledge. The main pre-test score was 9.3 and the post-test was 11.6. The computed paired 't'- value was 8.82 ( $p < 0.05$ ). The chi- squire test revealed that there was significant association with gender and sources of information at 0.05 levels.

**Keywords:** SIM, over the counter medication, misdiagnosis, drug-drug interaction.

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## Introduction

Every child has a fundamental right to their total health and we have a liability to fulfill this faith. The drugs are sold out without any prescription of any medical practitioner. They are also known as non prescription medicines [1]. Internationally, The use of OTC medications has been reported to be

increase.3 During the last few years, more medicines were discarded from prescription only into over-the counter (OTC) medication status [2]. Regardless of the admitted benefits of using an OTC medication, OTC medications are medicines that are bought without a doctor's prescription. Worldwide people tend to treat the disease, about 50% either wait for

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the problem to run its course or use a home remedy. Previously obtained for the same condition about 25% visit a doctor or use a prescription medicine. Left 25% becomes OTC. Globally OTC drug in market, India has 11th ranks in the market currently. This mode is increasing and is coming to reach 9th rank within next 5 years. As long as Indian patients have a massive tendency of self treatment, OTC drugs having a huge demand in the Indian market [3]. In India, In India, even there is no legal recognition of the OTC phrase, all the drugs which is non prescription drugs are not included in the list of prescription drugs [4]. The most commonly used non prescribed medication for cough, cold and fever: **Cough** syrups, Decongestants, Antihistamines, Pain and fever relievers. There is no rule for the use of OTC drugs in India. In India, findings showed that educated people were 76% more likely to take medication by themselves than uneducated people. In November 2016, India's Drug Consultative Committee announced it was set about on build a definition of drugs which could be distributed without a doctor's advice [5].

### Objectives of the study

1. To assess the pre-test knowledge of pediatric staff nurses regarding medication error and its prevention in pediatric drug administration in selected Hospitals.
2. To evaluate the effectiveness of information booklet regarding medication error and its prevention in pediatric drug administration among pediatric staff nurses.
3. To find out the association of pre-test knowledge of Pediatric staff nurses with their selected demographic variables.

### Hypothesis

**H0:** There is no significant difference between the mean of pre-test & post-test knowledge scores.

**H1:** There is a significant difference between the mean of pre-test & post-test knowledge scores.

**H2:** There is a significant association between the knowledge scores and selected demographic variables.

### Material and methods of used

**Research design:** Pre-experimental one group pre-test and post-test design was used in the present study.

**Research approach:** Quantitative research approach was used for the present study.

**Setting of the study:** The study was conducted in Kanpur hospitals.

**Population:** Population for the present study was all Parents of children.

**Sampling:** Non-probability convenient sampling technique was used to select 40 Parents of children in selected hospital, Kanpur who fulfilled the sampling criteria for the present study.

**Sample size:** 40 parents of children.

### Variables

**Dependent variable:** Knowledge regarding the harmful effects of OTC medication among Parents of children who were coming in selected hospitals, Kanpur.

**Independent variable:** In this present study Self instructional module on harmful effects of OTC medication was the independent variable.

**Demographic variable:** Age, gender, education, occupation, family monthly income, type of family, sources of health information.

### Sampling criteria

#### Inclusion criteria

1. Parents of children who were willing to participate in the study.
2. Parents who knew Hindi.
3. Parents who were available during of data collection.

#### Exclusion criteria

1. Parents of children not available during the time of data collection.



**Development and description of tools used in the study**

- The tools consist of two sections.
- Section A:** Demographic variables (Age, gender, education, occupation, monthly income, type of family, sources of health information).
- Section B:** Question related to harmful effects of OTC medication (Structured questionnaire which consist of 20 items pertaining to knowledge regarding harmful effects of OTC medication among parents of children). Blue print was prepared.

**Table No: 1 Classification of level of knowledge based on the percentage of score**

**Data collection procedure**

After obtaining formal permission from Rama Medical College, Hospital and Research Centre, Mandhana, Kanpur and Ursala Hospital Kanpur the investigators conducted a research study on 01/10/2019-15/10/2019. 40 parents of children were selected by using non-probability convenient sampling technique. The investigators collected the data by using self administered questionnaire. The average time taken by participants to answer the questionnaire was 15 minutes.

**Plan for data analysis**

The data obtained 40 samples were analyzed by using descriptive and inferential statistics. Descriptive statistics include Frequency, Percentage, Mean, Median, Mode, Standard deviation were used to explain the demographic variables. Inferential statistics include the chi-square test used to find the association between knowledge and selected demographic variables among parents of children.

**Data analysis and major findings**

**Section 1: Demographic data**

- Majority of parents were in the age group of 27-30 years (32.5%) which contrast

who found that (25%) were in the age group of 24-26 years and more than 31 years and 17.5% were in the age group of 21-23 years

- Majority of parents, among the total samples (40), 21 (52.5%) were male and 19 (47.5%) were female.
- Majority 18 (45%) of parents were from nuclear family, 15(37.5%) from joint family and only 7(17.5%) from extended family.
- Majority14 (35%) of parents were in the graduate and above, 12 (30%) were in the higher secondary school, 11 (27.5%) were in primary school, 3 (7.5%) were no formal education.
- Majority of occupation reveals that 16 (40%) of parents were private job, 15

Level of Knowledge	Score Range
Inadequate	0 – 7
Moderate	8– 13
Adequate	14– 20

(38%) were home maker, 5 (12%) were daily worker and 4 (10%) were government job.

- Majority 12 (30%) of parents have the income of Rs.15000/month and above, 11 (27.5%) had the income 10001-15,000-/, 9 (22.5%) had the income of 5001-10,000/month, 8 (20%) have the income of less than 5000/month.
- Majority of sources of information 24 (60%) were in Radio/TV, 8 (20%) were in newspaper and magazines, 6 (15%) were in friends/family members and 2 (5%) were in other.

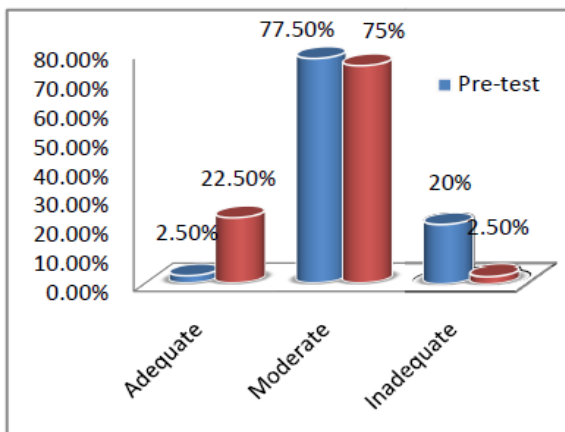
**Section 2: Level of pre-test knowledge score on defibrillator among staff nurses-**

Among 40 parents of children, 2.5% parents of children possess adequate knowledge whereas 77.5% had moderate knowledge and 20% parents of children had inadequate knowledge.



**Section 3: Level of post-test knowledge score on defibrillator among staff nurses**

After SIM the post test knowledge score among 40 parents of children 22.5% parents of children who possess adequate knowledge whereas 75% had moderate knowledge and 2.5% parents of children had inadequate knowledge.



**Figure 1: Bar diagram showing the level of pre and post test knowledge on the harmful effects of over the counter medications among parents of children admitted**

**Section 4: Effectiveness of SIM on knowledge regarding the harmful effects of over the counter medications among parents of children (Difference between pre-test and post-test knowledge score).**

**Table 2: Significance of difference between pre-test and post-test N=40**

Knowledge Score	Pre-test	N	Mean	S.D	T	P
		40	9.3	2.22		
	Post-test	40	11.6	2.76		

The mean score before and after administration of SIM has shown a significant difference. The mean total knowledge score before invention was 9.3 which has increased to 11.6 after invention, the paired t test 8.82

was found to be significant at very high level ( $p=2.02$ ) at 0.05 level. So hypothesis  $H_1$  was accepted.

**Section 5: Association between the demographic variables and knowledge score on defibrillator among staff nurses**

Association between knowledge scores and selected demographic variables of parents of children shows that there was significant association with gender and sources of information at 0.05 levels, so the hypothesis ( $H_2$ ) was accepted [6].

**Recommendations**

- It is recommended that, the similar study may be replicated on large scale.
- The similar study can be conducted to evaluate the knowledge regarding the harmful effects of over the counter medications.
- The similar study can be done by descriptive study.
- A study can be conducted in community health setting by using large sample of parents of children.

**Conclusion**

The study shows that knowledge of parents of children on Harmful effects of over the counter of medication. The result shows that they had adequate knowledge regarding over the counter of medication in pre test but after post test, their knowledge level was improved by using of self-instructional module. So the result showed that most of the parents of children had moderate knowledge regarding over the counter of medication and we can use this study for further research as descriptive, experimental and interventional study we can do the training programme for improving their skills and knowledge.

**Bibliography**

- [1] C. Bond and P. Hannaford, “Issues related to monitoring the safety of Over-The-



- Counter (OTC) medicines," *Drug Safety*, vol. 26, no. 15, pp. 1065–1074, 2003.
- [2] A. Walsh, H. Edwards, and J. Fraser, "Over-the-counter medication use for childhood fever: a cross-sectional study of Australian parents," *Journal of Pediatrics and Child Health*, vol. 43, no. 9, pp. 601–606, 2007.
- [3] L. S. Eiland, M. L. Salazar, and T. M. English, "Caregivers' perspectives when evaluating nonprescription medication utilization in children," *Clinical Pediatrics*, vol. 47, no. 6, pp. 578–587, 2008.
- [4] N. Birchley and S. Conroy, "Over-the-counter medicines in childhood: issues and concerns. A narrative review of the literature," *Paediatric and Perinatal Drug Therapy*, vol. 4, no. 4, pp. 161–167, 2001.
- [5] Sharma Suresh K, *nursing research and statistic*, New Delhi published by Elsevier, India private limited, 2011.page no. (61-65, 65-68, 70-71, 31-33, 53-54, 224-226)
- [6] Kerlinger, *nursing research*. 1<sup>st</sup> edition. Published by reed Elsevier, New Delhi private limited. 2008, 123

