

Discriptive Study to Assess the Level of Knowledge Regarding National Immunization schedule among Mothers

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Abstract

The research project attempts to assess the level of knowledge regarding national immunization schedule for mothers attending OPD at AIIMS Patna. The objectives of the research project was to assess the level of knowledge regarding national immunization schedule for mother attending OPD, to find the association between the national immunization schedule and demographic variables, to provide health education to the mother about national immunization schedule. The conceptual framework of the research project was developed on the basis Roy's adaptation model, non experimental randomized control group design used in the research project [9]. The research project was carried out in OPD at AIIMS Patna. The Sample comprised of all mothers who fulfilled the criteria of the research project. The sample was 100 in number. Pilot study was conducted on 10 samples and the tools were found to be feasible. Data collection was done from 25th April 2017 to 4th may 2017. Data was collected by using a questionnaire and analyzed by descriptive and inferential statistics. The reliability of the questionnaire tool was 0.883. The result of the research project shows that, 10% sample have excellent knowledge, 57% have very good knowledge, 28% have good knowledge and 5% having poor knowledge. A relationship between national immunization schedule and demographic variables like education level, religion, area of residence were noticed. The findings of this research project helped the mothers to enhance their knowledge about national immunization schedule and make them to apply this knowledge in their daily life.

Keywords: Knowledge; Immunization; Mother.

Introduction

"The child is god's gift to the family. Each child is created in the special image and likeness of God for greater things; to love and to be loved." Immunization schedule is a series of vaccination including the timing of all doses which may be either recommended, or compulsory depending on the country of residence [2].

Since last fifty years immunization has save the lives of many children. Vaccines are safe, simple and one of the most cost effective ways to save and improve the lives of children worldwide [10]. However, many children in developing countries are reluctant to get immunized because of their living standards in community [3]. Vaccines ensure that all children must be immunized, no matter what the circumstances are.

In early years the mortality rate of child was high due to communicable diseases and that time immunization has saved 3 million lives worldwide [5].

Methodology

Research Approach

Quantitative research approach

Research Design

Non- experimental descriptive research design

Variables

Variables were quantities, properties or

characteristics of persons, things or situations that can change or vary and are manipulated or measured in research [7].

Setting of Study: Setting refers to the area where the study was conducted [8].

The research project was conducted in OPD at AIIMS, Patna.

Population: Population is a group who possess specific attributes that are a researcher is interested in [6].

In present research project population consist of all the mothers who were coming in OPD at AIIMS Patna.

Sample and Sampling Technique: A finite subset of population selected with objective of investigating its properties is called sample.

In present research reportthe sample comprise of 100 mothers who attends AIIMS, Patna OPD and for the collection of samples convenient sampling technique was used.

Sample Selection Criteria

- The inclusion criteria of subjects in the research project were:
 - Mothers are willing to participate in the research.
 - Mothers who are present at the time of data collection.
- The exclusion criteria of the subjects in the research project were:
 - Mothers who are not able to read, write and understand Hindi language.

Tools for the Study

The researcher used appropriate statistical technique for data collection and present in the form of table and diagrams.

Knowledge was analyzed by frequency and percentage distribution.

Level of knowledge was analyzed by mean and standard deviation.

In this research project the investigators had prepared two tools.

Tool 1: Questioner to assess the demographic variables.

This tool used to collect base line information it consist of 10 items, age, type of family, education, area of residence, previous knowledge, number of children, occupation, religion, distance of hospital from home, marriage duration.

Tool 2: Questioner to assess the level of knowledge regarding immunization.

Interpretation

Grade	Score
Excellent	16-20
Very Good	11-15
Good	6-10
Poor	1-5

Reliability

Reliability of an instrument is the degree of consistency with which it measures the attribute it is suppose to be measure.

Reliability of the tool was calculated by using pretest method and was conducted in 10 samples. The reliability was calculated by cronbach's alpha and the value was 0.886.

Pilot Study

Pilot study is defined as a small-scale version or trail of the measure study [4]. Pilot study was conducted from 25th march 2016 to 4th April 2016in OPD at AIIMS Patna. After obtaining permission from the head of the institution and informed consent from the mothers, the tool was administered to 10 mothers who attends OPD at AIIMS Patna. The purpose of the study was explained to the mothers and assured the confidentiality of personal information of mothers. The study was found feasible and practicable.

Problem Faced; According to our questioner, pilot study samples were not able to answer the questions so we modified our questioner.

Data Collection Process

The data was collected from 25th march 2016 to 4th April. Before data collection a formal written permission was obtained from the head of the institution and consent from the mothers for conducting the research project. The purpose of the research project was explained to the mothers and assured the confidentiality of personal information of mothers an informed consent form was taken from the mothers.

Data collection process was conclude by thanking each mothers participation and co-operation. The collected data than compiled for data analysis

Organization of Study Findings

The analysis of the data was presented under the following headings:

Section I: Description of demographic variables of samples.

Section II: Description of level of knowledge of mothers regarding National immunization schedule.

Section I: Description of demographic variables of samples.

This section includes description of personal variables. The personal variable includes age, type of family, education, previous knowledge, area of residence, duration of marriage, distance of hospital from home, no of child, occupation, religion.

The Table depicts about he frequency and percentage distribution of age, type of family, education level, number of child, occupation religion, area of residence, distance of hospital from house, marriage duration, and previous knowledge regarding immunization.

Section 1: (Socio Demographic Data)

Graphical representation of the socio demographic variables

1. Age

Table 1: Distribution of sample based on demographic variable.

n=100

S.No	Demographic Variables	Category	Frequency (f)	Percentage (%)
1	Age	11-30	79	79%
		31-60	21	21%
2	Type of Family	Joint	55	55%
		Nuclear	45	45%
3	Education Level	<10 Class	71	71%
		>10 Class	29	29%
4	Number of Child	>2	39	39%
		<2	61	61%
5	Occupation	House Wife	73	73%
		Working	27	27%
6	Religion	Hindu	95	95%
		Others	5	5%
7	Area of Residence	Urban	32	32%
		Rural	68	68%
8	Distance of Hospital from House	1-4 Km	73	73%
		>4	27	27%
9	Marrige Duration	<6	62	62%
		>6	38	38%
10	Previous Knowledge	From Hospital	50	50%
		Mass Media	50	50%

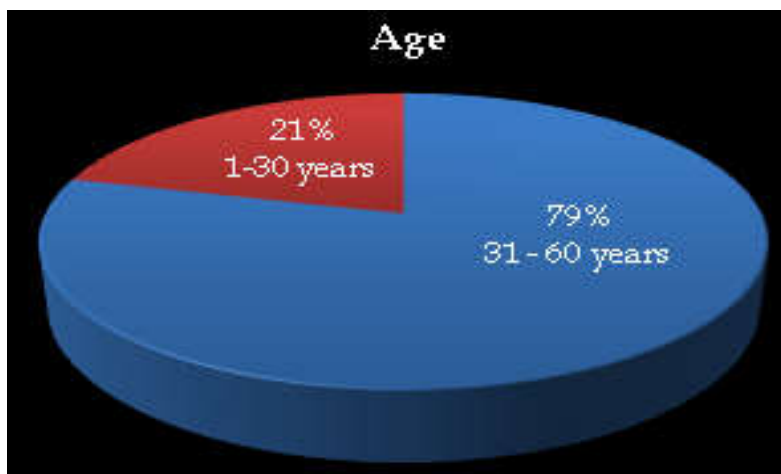


Fig.1: Age wise distribution of samples in relation to their age in years

Figure 1 shows that majority (79%) samples were belongs to age group of 1-30 years.

2. Type of family

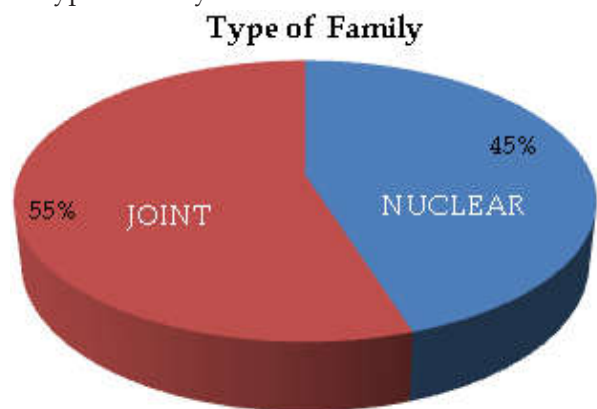


Fig. 2: Distribution of sample based on type of family
 Figure 2 shows that majority of (55%) sample were from joint family.

5. Occupation of Mother

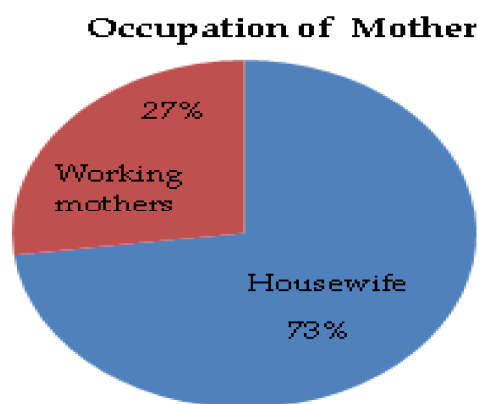


Fig. 5: Distribution based on occupation of mothers
 Figure 5 shows that majority (73%) of sample were house wife.

3. Education level

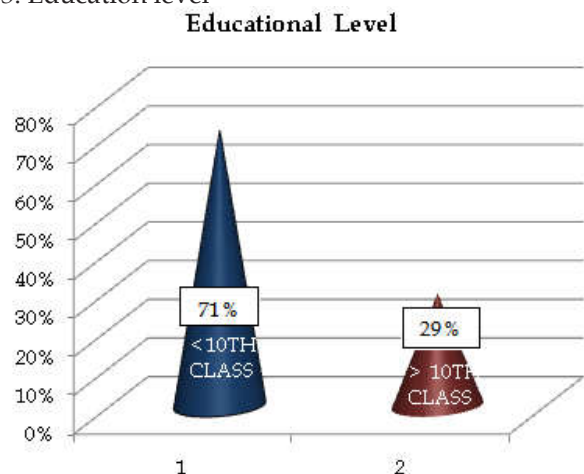


Fig. 3: Distribution based on education leve of mothers
 Figure 3 shows that majority of (71%) sample was <10th class pass.

6. Religion

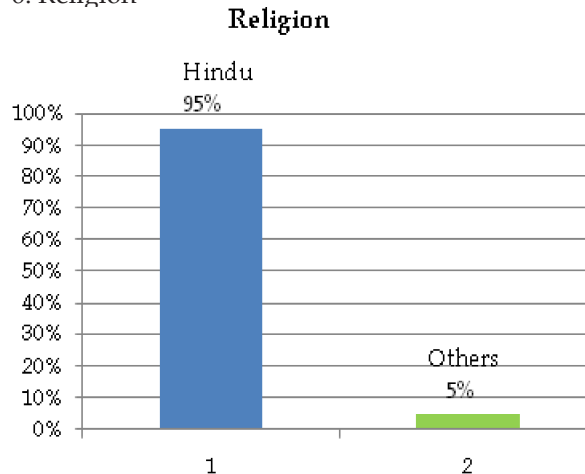


Fig. 6: Distribution based on religion
 Figure 6 shows that majority (95%) of sample were from Hindu religion.

4. Number of child

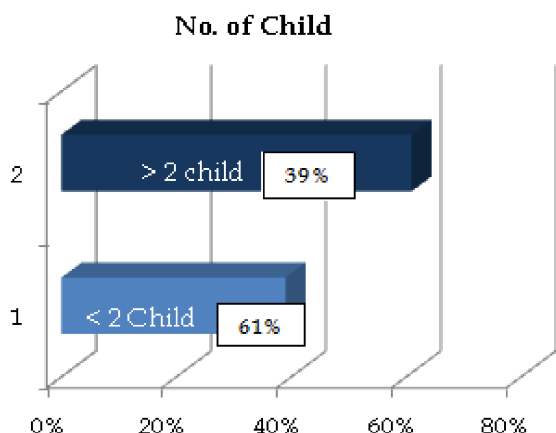


Fig. 4: Distribution based on number of child
 Figure 4 shows that majority (61%) of sample has <2 child.

7. Area of Residence

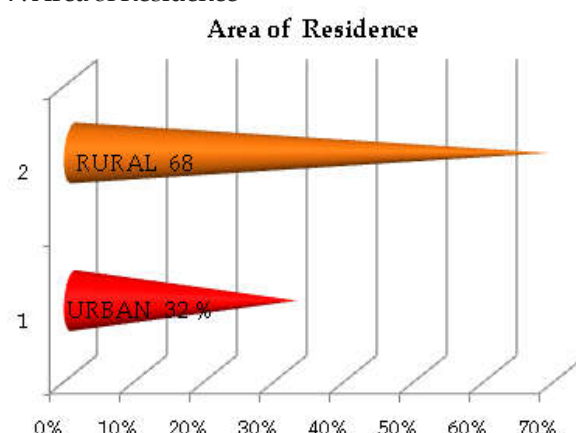


Fig. 7: Distribution based on area of residence
 Figure 7 shows that majority (68%) of sample were from rural area.

8. Previous Source of Knowledge

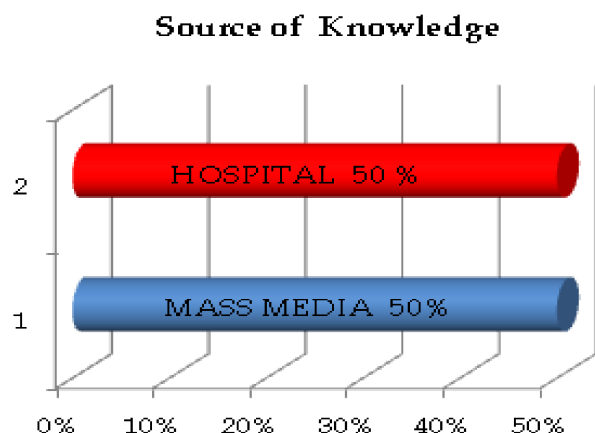


Fig. 8: Distribution based on previous source of knowledge
Figure 8 shows that half (50%) of sample gained knowledge from hospital.

10. Marriage Duration

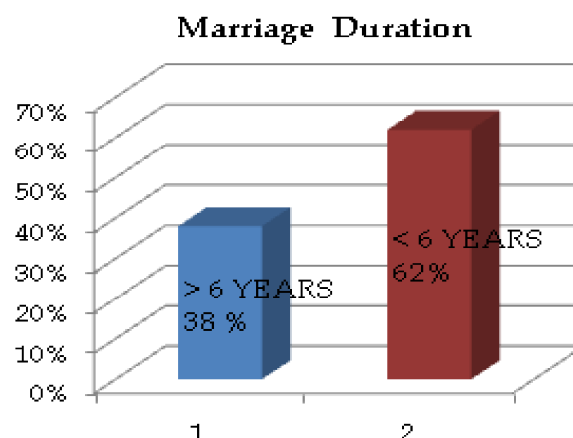


Fig. 10: Distribution based on marriage duration
Figure 10 shows that majority (62%) of samples marriage duration were <6 years.

9. The basis of distance of hospital from home

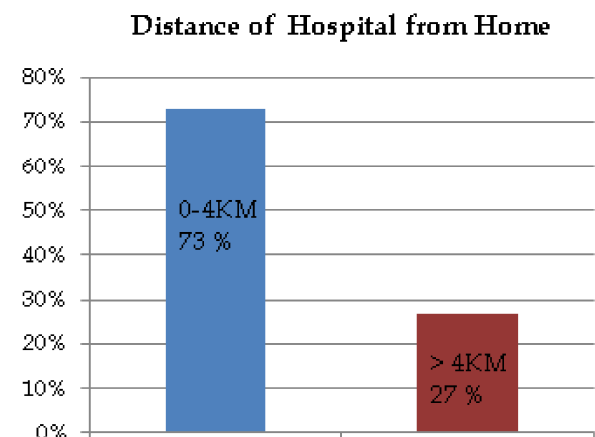


Fig.9: Distribution based on distance of hospital from house
Figure 9 shows that majority (73%)of sample were reside between 0-4 km of distance.

Section B: Description of level of knowledge of mothers regarding NIS.

Table 2: frequency and percentage of distribution of mothers / sample based on level of knowledge. n=100

Level of Knowledge	Frequency (F)	Percentage (%)
Excellent	10	10%
Very good	57	57%
Good	28	28%
Poor	5	5%

The data presented in table 2 shows that majority of the sample have very good knowledge (57%), most of sample have good knowledge (28%), few of them have excellent knowledge (10%) and very few of them have poor knowledge (5%).

Table 3: Pretest scores of experimental group N=100

Mean = 11.8673
Median = 12.0000
SD = 3.30772

Section C: Association between level of knowledge regarding immunization among mothers and demographic variables

Table 3: Depicts association the level of knowledge regarding immunization among mother with selected demographic variables n =100

Socio- Demographic Variables	Category	Knowledge Score		Df	X2
		>Medean	<Medean		
Age	11-30	46	33	1	1.413**
	31-60	9	12		
Type Of Family	Joint	32	23	1	0.406**
	Nuclear	29	16		
Education Level	>10 Class	14	15	1	0.025*
	<10 Class	33	38		
Number of Child	>2	22	17	1	1.33**
	<2	39	22		
Occupation	House Wife	45	28	1	1.881**
	Working	17	10		
Religion	Hindu	58	37	1	0.86**
	Others	2	3		

Socio- Demographic Variables	Category	Knowledge Score		Df	X2
		>Medean	<Medean		
Area of Residence	Urban	13	19	1	0.002*
	Rural	28	40		
Distance of Hospital from House	1-4Km	28	45	1	0.008*
	>4	1	16		
Marrige Duration	<6	25	37	1	0.006*
	>6	15	23		
Previous Knowledge	From Hospital	31	19	1	0.04*
	Mass Media	30	20		

*not significant at $p \leq 0.05$ level

**significant at $p > 0.05$ level

The chi square calculated to find the association between level of knowledge regarding immunization schedule among mothers with selected demographic variables. Data represented in table three shows that there is no significance association between previous knowledge, marriage duration, distance of hospital from house, education and having significant association between age, type of family, religion, number of child occupation.

Discussion

The present research report was an attempt to evaluate the knowledge regarding immunization among the mothers who were having under five children and attending AIIMS OPD.

The findings of the research project was discussed in terms of objective and hypothesis and comparison made with other research project findings. The discussion is divided into following headings;

- Description of level of knowledge among mothers
- Association between knowledge of mother regarding immunization schedule and demographic variable

Description of level of knowledge among mothers

In present research report finding revealed that most of the mother was aware about immunization at very good level (57%).

According to our research report 5% mother are having poor knowledge, 28% having good knowledge, 10% having excellent knowledge regarding immunization schedule.

The result supported the similar quantitative study's result conducted by Farah Azmi, Dr Ratana Prakash (2013) in selected area of Kunderki UP

India to assess the knowledge regarding vaccination in infancy among mothers of under five children. The sample size for the study was 30 mothers, sampling technique was convenient sampling. The result of the study had shown that good knowledge score was 10%, average knowledge was 23.34%, poor knowledge score was 66.6% [1].

Association between knowledge of mother regarding immunization schedule and demographic variable

Findings revealed that there was a significant association between knowledge of mother regarding immunization and variable such as family, number of children, age of mother and there was no significant association between religion or type of family over the knowledge of mother.

This finding were supported by a research project conducted in AIIMS Patna OPD among 100 mothers attending AIIMS OPD.

The result supported the similar quantitative study's conducted by Ms. Mereena, MrsSujatha R (2014) in Mangalore, Karnataka, India to assess the knowledge and attitude regarding vaccines among mothers of under five children attending pediatrics OPD. The sample size of the study was 300 and sampling technique of data collection was convenient sampling. The result of the study showed that there was a significant association of attitude with age, educational status, religion, monthly income, occupation and number of children [8].

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