

Mother's Knowledge, Attitude and Practices about child immunization: A study in district Faisalabad, Pakistan

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Objectives: To explore the knowledge, attitude and practices of the mothers about children immunization and to access the vaccination status of the children.

Methodology: Data was collected on pre-designed questionnaire and analysed by descriptive statistics.

Results: It was found that 26.5% respondents had not knowledge about routine vaccination schedule. Only 37% respondents were well aware about the name of common diseases of the children. 76% children were fully immunized and

17% children were partially immunized and BCG coverage was 94% in the study area.

Conclusion: Mothers had poor knowledge but positive attitude towards the importance of children vaccination and vaccination schedule. Mostly, mothers practice child vaccination to prevent diseases but did not know about the communicable diseases and age appropriate immunization. (Rawal Med J 201;40:441-444).

Key words: Knowledge, attitude, practice, immunization, communicable diseases.

INTRODUCTION

Immunization of children against serious transmissible diseases is the most cost effective approach to decrease the morbidity and mortality among children. In order to accomplish this strategy, high coverage of vaccination is essential.¹ Expanded program on immunization (EPI) was started on in 1976 by WHO with the aim of controlling six childhood diseases: diphtheria, tuberculosis, pertussis (whooping cough), polio, tetanus and measles. EPI was launched in Pakistan in 1978.² The morbidity and mortality caused by diseases and rising costs of treating them requires us to focus more on their prevention. Immunization is among the most successful components of preventive medicine.³ Parents' knowledge about immunization and their attitudes towards them are likely influence uptake.⁴ Previous studies revealed that mothers' knowledge about vaccination to be quite low and their educational status was significantly associated with child's coverage.⁵ Negative attitude, for example mothers fear from vaccination, was found to be significantly affected the immunization status of their children.^{6,7} Greater concern about the safety of vaccines was expressed by older parents, residents of towns and highly educated individuals.⁸ On the other hand, researchers in developed world found parents'

attitudes and beliefs had little effect on their children's immunization levels.⁹ The belief that vaccines cause autism was the most prevalent parental concern in a survey conducted in USA.¹⁰ The aim of this study was to explore the factors affecting the mother's knowledge, attitude and practices towards the child immunization in district Faisalabad.

METHODOLOGY

A sample of 200 mothers who had at least one child under the age of sixteen months were interviewed at EPI centres in DHQ hospital and Allied hospital, Faisalabad, Pakistan. Multistage sampling technique was used. At the first stage, sample size was taken by proportionate method from respective hospitals. At the second stage, 200 mothers were selected purposively in each hospital. Descriptive analysis was made by using SPSS.

RESULTS

We found that 27% respondents were illiterate, 13.5% were having up to five grade education. More than one fourth respondents were having the education of 6 to 10. 22% respondents had up to 8000 rupees monthly household income; almost one third of the respondents 32% had 80001 to 15000 rupees monthly income (Table 1).

Table 1. Socio economic characteristic of the respondents.

Educational status	Mothers		Fathers	
	Number	Percentage	Number	Percentage
Illiterate	40	27.0	29	14.5
Up to 5 Grade	27	13.5	17	8.5
6 to 10 Grade	56	28.0	75	37.5
11 to 14 Grade	52	26.0	55	27.5
15 +	25	12.5	24	12.0
Household Monthly income		Number		Percentage
Up to 8000		44		22
8001 to 15000		64		32
15001 to 22000		48		24
22001 to 30000		27		13.5
Above 30000		17		8.5
Age of the respondents		Number		Percentage
20-27		75		37.5
28-35		102		51
36-43		23		11.5
Type of family				
Joint		113		56.5
Nuclear		87		43.5
Total		200		100

37.5% mothers belonged to the lower age group 20-27 years, 30.92% to the median 28-35 years and 11.5% mothers belonged to the age group of 36-43 years high age group. Majority of the mothers were

young which mean age was 29.37 along with standard deviation of 4.88. All the mothers who were interviewed were in child bearing age.

Table 2. Frequency distribution of the respondents according to the Knowledge, Attitude and Perception of the mothers.

Attitudinal statements	To Some Extent		To a Great Extent		Not at all	
	F	%	F	%	F	%
You have knowledge about routine vaccination schedule?	68	34.0	79	39.5	53	26.5
Diseases could be prevented by immunization	40	20.0	139	69.5	21	10.5
TT vaccination is important during pregnancy	109	54.5	55	27.5	36	18.0
Fever occurs after routine vaccination of child?	66	33.0	127	63.5	7	3.5
Vaccination has relationship with family planning?	58	29.0	19	9.5	123	61.5
You have knowledge about common diseases?	94	47	75	37.5	31	15.5
Are you satisfied towards the immunization campaigns launched by government?	59	29.5	126	63.0	15	7.5
Do you face any barrier from the members of the family regarding child immunization?	12	6.0	9	4.5	179	89.5
Do you give gender preference regarding child immunization?	16	8.0	3	1.5	181	90.5
Fears of temporary side effects play any hurdles for the completion of vaccination schedule?	40	20.0	17	8.5	143	71.5
Do you know about the beginning and completion period of child vaccination?	83	41.5	69	34.5	48	24.0
Do you cooperate with vaccination teams?	38	19.0	149	74.5	13	6.5
Female vaccinators are preferable to vaccinate the children?	76	38.0	64	32	60	30.0

Table 2 shows knowledge of the mothers towards childhood immunization practices. 34% respondents had up to some extent, 39% respondents had up to great extent and more than one fourth 26.5% respondents had no knowledge about routine vaccination schedule.

DISCUSSION

The researchers measured the knowledge of the mothers those who have understanding about the routine vaccination. Aziz et al¹¹ found that 66% of the mothers had the knowledge of children's vaccination schedule in rural areas of Pakistan. Bernsen et al¹² stated that 93.1% respondents had the favourable attitude towards the immunization. A large majority of the respondents were in the opinion that disease could be prevented by immunization of our children. 54.5% respondents were some extent agreed and 55% were agreed great extent that TT vaccination is important during pregnancy. Our results are line up with Pakistan Social and Living Standards Measurement Survey,³ which showed that 69% of pregnant women got TT shots in 2010 compared to 68% in 2009.

Present findings shows that 20% respondents claimed up to some extent that after inject able vaccination children become weak while 66.5% were not agreed that vaccination caused emaciation. A Libyan study reported that 54% of the parents could not vaccinate their children due to child sickness after vaccination.¹⁴

Some religious leaders in Muslims countries have the opinion that the routine vaccinations of the children have relationship with family planning that influences some religious families in Pakistan. 29% of respondents suspected up to some extent that routine vaccination may have relationship with family planning while a majority of 61.5% were not agreed. This is similar to previous study results.¹¹ Asim In a previous study we reported that 10% respondents were in the opinion that to vaccinate the children is prohibited in religion.¹⁵

It is also found that 63% respondents were highly satisfied about the existing children immunization campaign launched by the government. Devkota et al¹⁶ found that 5.8% respondents were not satisfied regarding immunization in Nepal. Present research

revealed that the interference of elder members of the family is negligible. Data showed that 89.5% respondents were not faced any barriers from the elder family members. Many national and international NGOs are highlighting the gender role in Pakistani society.

The present research also studied this phenomenon under the gender perspective and adoptability of routine immunization. We found that 90.5% had no gender preference regarding child immunization and lingering negligible respondents had somewhat gender preference regarding the adoptability of routine vaccination. Fear of temporary side effects play some role in adoption of routine immunization practices to children. 20% respondents to some extent had fears of side effects, while 71.5% were not agreed. Bofarraj et al¹⁴ pointed out that child's health and sickness was the most common cause for termination of immunization.

The routine vaccination schedule for children starts from their births to fifteen months of age. 41.5% respondents had some knowledge about beginning and completion period of children vaccination schedule, 34.5% respondents had to a great extent and 24% respondents had not any awareness. Yousaf et al¹⁷ pointed out that 86.9% mothers were having the knowledge about the vaccination schedule of the immunization in Saudi Arabia. 74.5% respondents cooperate with vaccination teams during door to door visit for routine EPI vaccination. About 70% respondents were agreed that female vaccinators are preferable to vaccinate the children while 30% respondents were disagreed.

CONCLUSION

Mothers had poor knowledge but positive attitude towards the importance of children vaccination and vaccination schedule. Mostly mothers practice the child vaccination to prevent from the diseases but did not know about the communicable diseases and age appropriate immunization. Respondents were somewhat satisfied about the existing children immunization campaign launched by the government. Their husbands and monthly household income had significant association of these variables with knowledge about the child immunization practices.

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