



BRIDGING THE GAP- IMMUNIZATION KNOWLEDGE, ATTITUDE AND PRACTICE AMONG MOTHERS OF UNDER FIVE CHILDREN ATTENDING DEIC, THIRUVALLUR.

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ABSTRACT **Background:** Immunization remains a cornerstone of child survival, yet gaps persist in knowledge and practice among mothers of under-five children especially when they have to take care of their disabled children. **Objective:** To study the Immunization knowledge, attitude, and practice (KAP) of mothers of under-five children attending the District Early Intervention Centre (DEIC) in Thiruvallur. **Methodology:** A Hospital based cross-sectional study was conducted among 281 mothers of under-five children attending DEIC for a period of six months using a semi-structured questionnaire focusing on socio-demographic profile, immunization-related knowledge, attitudes, and practices. **Results:** 281 Mothers were interviewed with the semistructured questionnaire. The mean age of the participants was 28.84 years(SD +/-5.5).10 mothers were illiterate and 8 were unemployed. Around 260 mothers were from Middle class socioeconomic status. Almost all of them had received atleast one dose of DT Immunization during their Antenatal period but 27% of mothers did not know the reason for receiving. 96.7% of them had immunized their child on Day 1 of postnatal period, 2 were not immunized due to prematurity. 49% of them did not know the disease that their children are protected through immunization. Though everyone accepted the need for immunization, only 26% knew about zero dose timing and 12.8% for 9–12 months' vaccine schedule. **Conclusion:** While attitudes toward immunization were universally positive, significant gaps in detailed knowledge and specific practices highlight the need for targeted health education among postnatal mothers.

KEYWORDS : Immunization, Knowledge, Attitude, Practice, Mothers, Under-five children.

INTRODUCTION

Childhood immunization is a proven public health strategy for reducing morbidity and mortality due to vaccine-preventable diseases. A mother's understanding of the importance, safety, and benefits of vaccines can positively influence her decision to adhere to the recommended immunisation schedule[12]. However, disparities remain in immunization uptake and caregiver knowledge, particularly in semi-urban and rural areas. The District Early Intervention Centre (DEIC) plays a vital role in monitoring and promoting child health, especially disabled children. This study was planned to evaluate the immunization knowledge, attitude, and practices among mothers of under-five children attending DEIC, Thiruvallur, to identify the gaps and opportunities for strengthening the immunization coverage among under-five children.

METHODOLOGY

Study Design: Hospital based Cross-sectional study

Study Area: District Early Intervention Centre (DEIC), Government Medical College Hospital, Thiruvallur

Study Population: Mothers of under-five children attending DEIC during the study period

Sample Size: 281 mothers (based on the previous studies) and simple random sampling method was used.

Data Collection:

After obtaining Institutional Ethical clearance and informed consent from the mothers, data was collected using a Pre-tested semi-structured questionnaire containing socio-demographic profile, immunization knowledge, attitude, and practice among mothers of under-five children for a period of six months. Data were entered in Micro soft Excel and analyzed using SPSS -16 for Descriptive statistics such as means, frequencies, and percentages.

RESULTS:

Table: 1- Sociodemographic Details

Socio-demographic characteristics	Number of study participants(281), n(%)
Age in years	
19-25	96(34.2)

26 – 30	97(34.5)
31 – 35	58(20.6)
36-40	22(7.8)
>40	8(2.8)
Education status	
Illiterate	10(3.6)
Upto Primary School	52(18.5)
Upto Middle School	81(28.8)
Upto High School	35(12.5)
Upto Higher Secondary	89(31.7)
Graduate and above	14(5)
Occupation	
Unemployed	8 (2.8)
Unskilled	129(45.9)
Semi-Skilled	23(8.2)
Skilled	121(43.1)
Religion	
Hindu	217(77.2)
Christian	49(17.4)
Muslim	15(5.3)
Socio-economic status	
Lower	6 (2.1)
Lower Middle	30(10.7)
Middle	93(33.1)
Upper Middle	137(48.8)
Upper	15(5.3)

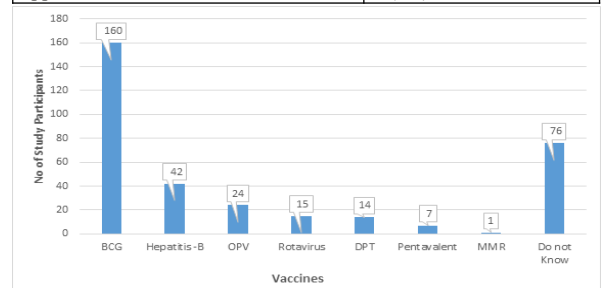


Fig 1: Knowledge On Vaccines Given To Children

Most of the mothers were in the age between 19 to 35 (89%). 10 were illiterate and 8 of the mothers were unemployed. 217 of them were Hindus and 92.6% of them belonged to the Middle class family. Though almost everyone received atleast 1 dose of DT during their Antenatal period, 27% of the mothers were not aware of the reason for its administration and 95% of them had in Government setup.

76 of the mothers did not have the knowledge on the vaccines given to children. Around 9 children were not given vaccine on Day 1 with reason being 2 for prematurity and 7 for unknown reasons.

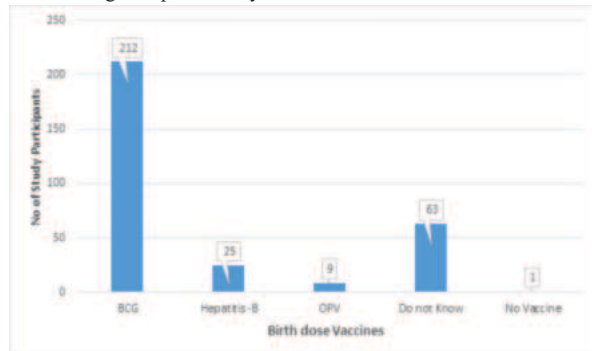


Fig:2: Knowledge On Names Of Birth Dose Vaccines

Around 49% of the mothers were not aware of the diseases that are being prevented through immunization. Education of the mothers played a significant role in knowledge of the diseases and names of vaccines used against. (p value < .002)

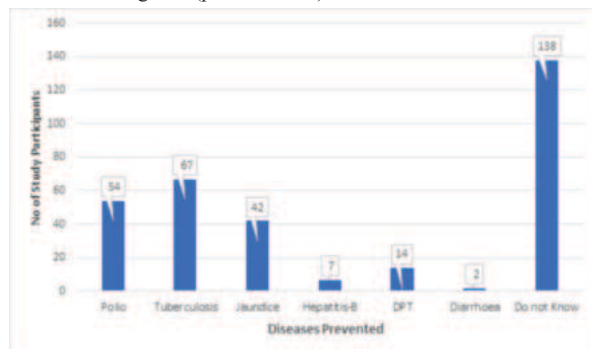


Fig:3: Knowledge On Diseases Prevented By Immunization.

Almost everyone accepted that immunization is essential for their children and had no difficulties in administering the vaccine in Government Hospitals. Almost everyone felt that Immunization is essential for their children. Only 26% of the mothers were aware of Zero dose timings and around 13% were aware of 9-12 month schedule that is being given.

DISCUSSION

In a study carried out by Rachna et al, the Mean age of the mothers were 28.4 years and in our study, the mean age of the mother whose child undergoing vaccination is 28.8+/-5 years[11]

Mothers' pre-existing knowledge and positive attitude are crucial for children's vaccination outcomes[8]The study revealed positive attitudes of the underfive mothers towards immunization but knowledge on timing, vaccine names, and reasons for vaccination—especially at birth—remains inadequate. In agreement with this study, previous studies also reported inadequate mothers' knowledge about child immunization. This highlights the need for targeted educational interventions to improve awareness about the importance of immunization, particularly in educating the mothers from their Antenatal period itself.

Most of the mothers were naming Poliomyelitis, Tuberculosis and Jaundice probably because of the campaigns carried out by the government and NGOs whereas Measles and Poliomyelitis were more common in other studies.

Most of them were using Government facility for Immunization suggests the achievement of the publichealth in reaching the needed and achieving the target of 100% immunization. The gap in

Knowledge suggest a need to strengthen counseling during antenatal visits and immunization sessions.

Limitations

This study is limited by the fact that it cannot show a cause and-effect relationship since it is cross-sectional. Another limitation of this study is the use of a questionnaire as it is difficult to ensure that respondents gave honest responses. Further, it was an institution-based study conducted in one hospital, thus its inability to represent the whole population. However, the findings of this study provide the basis for future studies to evaluate factors affecting the vaccination status of children in semiurban and rural areas.

CONCLUSION

The knowledge of our mothers about vaccination was found to be inadequate, while the majority showed positive attitudes towards child immunization and most of their children were fully immunized. The practice and knowledge of mothers on child immunisation should be enhanced by health education, awareness campaigns, and health promotion interventions. It's recommended to engage the community in the promotion of child vaccination by involving community organizations, local authorities, and healthcare workers. Mobile outreach Programs for community should be utilized to promote vaccine uptake and disseminate accurate information.

Conflict Of Interest: NIL

Funding: NIL

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