



A STUDY TO ASSESS THE KNOWLEDGE AND ATTITUDE REGARDING NEONATAL JAUNDICE AMONG THE MOTHERS IN SELECTED VILLAGES OF AMBALA, HARYANA.

Nursing

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ABSTRACT

BACKGROUND: Neonatal jaundice refers to yellow discoloration of the skin and the sclera (whites of the eyes) and other tissues of a newborn infant that results from accumulation of bilirubin in the skin and mucous membranes.

OBJECTIVE: to assess the knowledge and attitude regarding neonatal jaundice among mothers, determine the correlation between knowledge and attitude score of mothers regarding neonatal jaundice.

METHOD: The research approach adopted for the study was Quantitative Research Approach. The research design adopted for the study was Descriptive Survey Design. Total 350 mothers were selected by using purposive sampling technique from selected villages. The tools developed and used for data collection were structured knowledge questionnaire and five point likert attitude scale, tools were prepared by focusing on knowledge and attitude respectively.

RESULTS: The study revealed that the mean of knowledge score of the mothers regarding neonatal jaundice was (10) with standard deviation (2.80) and mean of attitude score was (64.49) with standard deviation (7.40) respectively. The study concluded that nearly half of mothers residing in rural areas had below average level of knowledge 158 (45.1%) and majority of mothers had moderately favorable level of attitude 320 (91.4%) regarding neonatal jaundice. There was weak positive correlation between knowledge and attitude score.

KEYWORDS

Neonatal Jaundice, Knowledge, Attitude.

INTRODUCTION

A newborn brings fragrance and meaning to life. They are gift to parents from god, but healthy survival of the them is threatened at every moment. Neonatal health problems are shocking and alarming throughout the world, especially in the developing countries. Expert and empathetic approach is essential to minimize these problems and to reduce the inexcusable causes of childhood morbidity, mortality and disability.¹

Jaundice is one of the most common conditions requiring medical attention in newborn babies. Approximately 60% of full term infants and 80% of preterm infants develop jaundice in the first week of life, and about 10% of breastfeed babies are still jaundiced at 1 month of age. In most babies with jaundice there is no underlying disease, and this early jaundice (termed 'physiological jaundice') is generally harmless. However, there are pathological causes of jaundice in the newborn which although rare need to be detected. Such pathological jaundice may co-exist with physiological jaundice.²

In neonates, the yellow discoloration of the skin is first noted in the face and as the bilirubin level rises proceeds caudal to the trunk and then to the extremities. The condition is common in newborns affecting over half (50-60%) of all babies in the first week of life.³

Severe neonatal jaundice may indicate the presence of other conditions contributing to the elevated bilirubin levels, of which there are a large variety of possibilities. These should be detected or excluded as part of the differential diagnosis to prevent the development of complications.⁴

The National Association of Neonatal Nurses (NANN) states that neonatal nurses must be proactive in the assessment and management of hyperbilirubinemia in the newborn. NANN also believes parents should be educated about untreated hyperbilirubinemia and the need for close follow up of their infant after discharge. NANN further believes neonatal nurses must take steps to increase awareness and identify strategies within their organizations to enhance the process of diagnosis and management of hyperbilirubinemia.⁵ A wide range of literature suggested that the increased incidence of neonatal jaundice is due to the lack of knowledge regarding identification and prevention of neonatal jaundice.⁴

A descriptive study was conducted on 100 mothers, to assess the knowledge and beliefs towards care of neonatal jaundice in pediatric

teaching hospital in karabala. The findings revealed that knowledge of mother's related to neonatal jaundice was low (34%). While that beliefs of mothers related to neonatal jaundice were high (78%). There is a high significant relationship between mother's knowledge and beliefs.⁶

Hyperbilirubinaemia and kernicterus are reemerging as prominent clinical concerns hypothesized to be secondary to increased breastfeeding rates, early hospital discharge and overall lack of concern for the potential impact of severe hyperbilirubinemia on healthy term newborns.⁷

MATERIAL AND METHODS

STUDY TYPE: Quantitative Research Approach.

STUDY DESIGN: Descriptive survey design

STUDY SETTING:

Selected villages of Ambala which includes Khanahemedpur, Manka, Manki and Milkdhankota.

STUDY POPULATION:

Total 350 Mothers (above 18 years of age, has less than 2 years of child or children).

Formal approval was taken from the concerned authority. The tools for the present study were based on review of literature and consultation from the experts.

EXCLUSION CRITERIA:

Mothers who were: not willing to participate in study and having any psychological disturbance.

SAMPLING:

In this study purposive sampling technique was used to collect the data.

STUDY TOOLS:

Sample characteristics, structured knowledge questionnaire and attitude scale. Content validity and reliability of tools were ensured. Data was collected with interview method.

ANALYSIS:

The collected data was entered in the MS Excel spreadsheet. Analysis was done using SPSS software version 16.0.

ETHICAL APPROVAL:

Permission for study was taken from the sarpanch of the selected villages of the Ambala, Haryana.

OPERATIONAL DEFINITION: KNOWLEDGE:

In this study knowledge refers to response to items on knowledge questionnaire given by mothers regarding neonatal jaundice and its management through structured knowledge questionnaire characterized into following levels- Very Good (>75%), Good (61-75%), Average (50-60%), Below Average (<50%)

ATTITUDE:

In this study attitude refers to those values and beliefs of mothers regarding neonatal jaundice as assessed by attitude scale characterized into following levels- highly favorable (>75%), moderately favorable (50-75%) and unfavorable (<50%).

NEONATAL JAUNDICE:

In this study it refers to excessive accumulation of unconjugated bilirubin in blood resulting in yellowish discoloration of skin and mucous membrane during the 1st week of life.

MOTHER:

Mother above 18 years of age, who has less than 2 years of child or children and residing in selected villages of Ambala.

RESULTS

Data presented in Table 1 revealed that majority of mothers (32.6%) were in the age group of 23-27 years, (22.6%) were age group of ≥ 33 years and (14.3%) were of age group 18-22 years. Out of total 1/4th of (33%) mothers had education till secondary school. Majority (87.7%) of mothers were housewife, About (41.4%) of families were Nuclear and (58.6%) families were Joint. About (46.3%) of family members had less than and equal to 5000 monthly income, (31.7%) had 5001-10000 monthly income. nearly half of (48.6%) of mothers have 2 children, (34.9%) of mothers have 1 children. More than half (58.3%) of children in family were not suffered from neonatal jaundice and about (41.7%) of children were suffered from neonatal jaundice. About (33.4%) mothers had knowledge about neonatal jaundice and 99(66.6%) mothers had no knowledge about neonatal jaundice.

Table 1: Frequency and Percentage Distribution of Sample Characteristics

N=350			
Sr. No.	Sample Characteristics	f	%
1.	Age (Years)		
	a) 18-22	50	14.2
	b) 23-27	114	32.6
	c) 28-32	107	30.6
d) ≥33	79	22.6	
2.	Education		
	a) Illiterate	33	09.2
	b) Primary	60	17.1
	c) Secondary	118	33.0
	d) Senior secondary	97	27.7
e) Graduate or above	42	13.0	
3.	Occupation		
	a) House wife	307	87.7
	b) Private service	6	01.7
c) Self employed	37	10.6	
4.	Type of family		
	a) Nuclear	145	41.4
b) Joint	205	58.6	
5.	Total Monthly income		
	a) Rs. ≤5000	149	46.3
	b) Rs. 5001-10000	111	31.7
c) Rs. ≥10001	90	22.0	
6.	No. of children in family		
	a) 1	122	34.9
	b) 2	170	48.6
c) ≥3	58	16.5	
7.	Any child in family suffered from jaundice		
	a) Yes	146	41.7
b) No	204	58.3	

8.	Previous knowledge regarding neonatal jaundice.		
	a) Yes	117	33.4
b) No	233	66.6	

The data presented in table 2 shows the frequency distribution of level of knowledge regarding neonatal jaundice among mothers residing in selected villages. The finding shows that the majority of mothers had good level of knowledge (66%). The data further shows that (33.7%) of mothers had below average level of knowledge and only (0.3%) of mothers had excellent level of knowledge regarding neonatal jaundice.

Table: 2 Frequency and Percentage Distribution of Mothers in term of level of knowledge regarding Neonatal Jaundice.

N=350				
Level Of Knowledge	Scores	Percentage	frequency	Frequency Percentage
Very Good	>15	>75%	1	0.3%
Good	12-15	61-75%	79	22.6%
Average	10-11	50-60%	112	32.0%
Below Average	<10	< 50%	158	45.1%

The data presented in table 3 indicates the frequency distribution of level of attitude regarding neonatal jaundice among mothers residing in villages of Ambala, Haryana. The findings shows that the majority (91.4%) of mothers residing in villages had moderately favourable attitude. The data further shows that only (4%) of mothers had highly favourable attitude and (4.6%) of mothers had unfavourable attitude regarding neonatal jaundice.

Table: 3 Frequency and Percentage Distribution of Mothers in terms of levels of attitude regarding neonatal jaundice.

N=350				
Levels of Attitude	Scores	Percentage	frequency	Frequency percentage
Highly Favourable	15-20	76% - 100%	14	4.0%
Moderately Favourable	9-14	51% - 75%	320	91.4%
Un Favourable	<9	<51%	33.7	4.6%

Maximum Score-100 Minimum Score 20

Data in Table 4 showed the correlation of the knowledge score and attitude score regarding the neonatal jaundice among mothers. Mean of the knowledge score of the mothers was 9.33 and SD was ±2.80 and Mean of the attitude score of the mothers was 64.49 and SD was ±7.40. Computed correlation value 0.30 was found to be statistically significant at 0.05 level of significance indicating a weak positive correlation between knowledge and attitude of mothers.

Table: 4 Co-relation between knowledge scores and Attitude scores of Mothers regarding neonatal jaundice.

N=350			
GROUP	MEAN	SD	r
Knowledge	9.33	±2.80	0.30
Attitude	64.49	±7.40	

r = 0.30 (p < at 0.05)* significant NS= Not Significant

DISCUSSION

Finding of the present study revealed that the majority of mothers had below average level of knowledge (45.1%), (32%) of mothers had average knowledge, (22.6%) had good level of knowledge and only (0.3%) of mothers had very good level of knowledge regarding neonatal jaundice. These findings were consistent with the study conducted by Rodrigo, Cooray G (2010) on knowledge, attitude and behavior on neonatal jaundice of post-natal mothers. The study revealed that below average knowledge regarding neonatal jaundice and mean attitude score (65.7±20.6) and the mothers have high level attitude about neonatal jaundice and mean percentages (55%).⁸ A cross-sectional study was conducted by Mohamed E. et. al. (2016), to assess the traditional beliefs related to neonatal jaundice among Egyptian mothers. The study revealed unexpected moderate knowledge and attitude scores of Egyptian mothers in most domains with a mean of 6.6 and 20.6 respectively, In terms of knowledge 52.3% of participants had adequate knowledge about neonatal jaundice.⁹

The data of present further revealed that the majority (91.4%) of mothers had moderately favorable attitude. A study was conducted by Rabiyeepoor S, Gheibi S, Jafari S (2004), to assess the knowledge and attitude of postnatal mothers related to neonatal jaundice also found that the level of attitude about NNJ was satisfying. Mean attitude score was 25.92 (SD=4.84) with the range of 14 to 35. Of all the responders, 37% and 63%, respectively, belonged to moderate and high attitude categories and no one had low attitude. It was concluded that most postnatal mothers had correct attitude on NNJ.¹⁰

The present study shows that there was a correlation between the knowledge and attitude score ($r = 0.30$), it shows that there is a weak positive correlation between the knowledge and attitude of neonatal jaundice among mothers. These findings were consistent with the study conducted by Rodrigo, Cooray G (2010) on knowledge, attitude and behavior on neonatal jaundice of post-natal mothers. The study revealed that there was significant correlation between the knowledge, behavioral and attitude score of postnatal mothers.⁸

RECOMMENDATIONS

On the basis of the finding of the study, following recommendations have been made for further study:

1. A similar study can be done on antenatal mothers to assess the knowledge and attitude of mothers regarding neonatal jaundice.
2. Educational programs can be held for further improvement of knowledge and attitude of mothers regarding neonatal jaundice.
3. Comparative study can be conducted between antenatal and postnatal mothers.
4. An experimental study can be conducted to assess and evaluate the effectiveness of health education regarding neonatal jaundice.

CONCLUSION

The study concluded that Majority of the mothers were having below average knowledge followed by other mothers having average level of knowledge regarding neonatal jaundice, few mothers were having good level of knowledge regarding neonatal jaundice and least mothers having very good knowledge regarding neonatal jaundice. Majority of the mothers had moderately favorable attitude and some had highly favorable attitude and least had unfavorable attitude regarding neonatal jaundice. There is positively negligible correlation between knowledge and attitude score.

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