A study to assess the knowledge regarding neonatal jaundice among mothers admitted at Bharati Hospital and Research Centre of Pune city

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Abstract
Neonatal jaundice is a common disorder worldwide and many affected babies brain damaged due to delay in seeking medical consultation. In India it is affected 60% of full term infants and 80% of preterm infants in the first three days after birth. It is a frequent cause of hospitalization of babies in the first month of life.

Problem statement: A study to assess the knowledge regarding neonatal jaundice among mothers admitted at Bharati Hospital and Research Centre of Pune City.

Objectives: 1) To assess the knowledge regarding neonatal jaundice among mothers. 2) To associate the findings with the selected demographic variables.

Materials and methods: A descriptive study was conducted to assess the knowledge regarding neonatal jaundice among mothers admitted at Bharati Hospital and Research Centre of Pune city using 15 items structured questionnaires on neonatal jaundice, 100 mothers having neonatal jaundice baby were chosen for the study through convenient sampling technique. With help of our experts final tool was prepared. Reliability was conducted on 10 mothers of neonatal jaundice through test –retest method.

Finding of the study: 52% of mother were under age group of 19-25 years, 65% of mother were housewife, 50% of mother did graduation and 65% of mother were primipara. Majority of the mother, 56% were having good knowledge, 34% of the mother were having excellent knowledge and 10% of the mother were having poor knowledge. There is no significant association between the selected demographic variables and the knowledge of the mothers regarding neonatal jaundice i.e., age, education, occupation, number of children and history of previous children with neonatal jaundice.

Conclusion: In this study it is found that most mothers were having good knowledge but still there are mothers whose knowledge level are poor regarding neonatal jaundice. It shows that knowledge regarding neonatal jaundice among mother needs to improve and it requires greater attention commitment from health professional.

Recommendation: Keeping in view the findings of the present study, the following recommendations were made.
1) The study can be done in a larger sample size to generalise the results of the study.
2) The comparative between primigravida and multigravida study can be conducted.
3) An evaluating study can be done to determine the effectiveness of structured teaching programme of mother’s knowledge regarding neonatal jaundice.

Keywords: Knowledge, neonatal jaundice, mother

1. Introduction
Neonatal Jaundice is one of the most common condition requiring medical attention in newborn babies, approximately 60% of term and 80% of preterm babies develop jaundice in the 1st week of life, and about 10% of breastfed babies are still jaundiced at 1 month of age. In most babies with jaundice there is no underlying disease, and this early jaundice (term 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.

Bilirubin is a breakdown product of the red cells in the blood. Red cell breakdown produces unconjugated (or indirect) bilirubin, which is mostly bound to albumin. Neonatal jaundice is a common disorder worldwide and many affected babies brain damaged due to delay in seeking medical consultation. In India it affected 60% of full term infants and 80% of preterm infants in the first three days after birth.
It is a frequent cause of hospitalization of babies in the first month of life.

2. Methodology
A non experimental research design was adopted to conduct the study. A total of 100 samples were selected by using non probability convenient sampling technique. Study instrument was self structured questionnaire used by the researcher, section 1 consist of demographic variables and section 2 consist of structured knowledge questionnaire. The tool was content validated by expert and translated into Marathi which was again validated. Reliability was done using test and retest method and the value is 0.72 which shows the tool reliable. The samples were selected by using non probability convenient sampling method. The collected data were analyzed by using descriptive and inferential statistics.

3. Results

Table 1: Frequency, percentage distribution table of mother demographic characteristic, N=100

<table>
<thead>
<tr>
<th>Table no.</th>
<th>Data</th>
<th>Frequency</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Age</td>
<td></td>
<td></td>
</tr>
<tr>
<td>a)</td>
<td>19 to 25</td>
<td>52</td>
<td>52%</td>
</tr>
<tr>
<td>b)</td>
<td>26 to 30</td>
<td>31</td>
<td>31%</td>
</tr>
<tr>
<td>c)</td>
<td>31 to 35</td>
<td>12</td>
<td>12%</td>
</tr>
<tr>
<td>d)</td>
<td>36 to 40</td>
<td>5</td>
<td>5%</td>
</tr>
<tr>
<td>2</td>
<td>Education</td>
<td></td>
<td></td>
</tr>
<tr>
<td>a)</td>
<td>Upto 12th standard</td>
<td>38</td>
<td>38%</td>
</tr>
<tr>
<td>b)</td>
<td>Graduation</td>
<td>50</td>
<td>50%</td>
</tr>
<tr>
<td>c)</td>
<td>Post-graduation</td>
<td>12</td>
<td>12%</td>
</tr>
<tr>
<td>3</td>
<td>Occupation</td>
<td></td>
<td></td>
</tr>
<tr>
<td>a)</td>
<td>Housewife</td>
<td>65</td>
<td>65%</td>
</tr>
<tr>
<td>b)</td>
<td>Working women</td>
<td>35</td>
<td>35%</td>
</tr>
<tr>
<td>4</td>
<td>Gravida</td>
<td></td>
<td></td>
</tr>
<tr>
<td>a)</td>
<td>Primipara</td>
<td>65</td>
<td>65%</td>
</tr>
<tr>
<td>b)</td>
<td>Multipara</td>
<td>35</td>
<td>35%</td>
</tr>
<tr>
<td>5</td>
<td>No. of baby</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1.</td>
<td>Child</td>
<td>63</td>
<td>63%</td>
</tr>
<tr>
<td>2.</td>
<td>Children</td>
<td>26</td>
<td>26%</td>
</tr>
<tr>
<td>3.</td>
<td>Above children</td>
<td>11</td>
<td>11%</td>
</tr>
</tbody>
</table>

Table 1 Shows that majority 52% of the mother were in 19-25 years of age group and 50% mother had graduated, 65% were housewife and primipara mother and 63% mother had 1 child.

Table 2: Showing score of knowledge regarding neonatal jaundice among mothers admitted at Bharati hospital and Research Centre of Pune city, N=100

<table>
<thead>
<tr>
<th>S. No</th>
<th>Level of knowledge</th>
<th>Frequency (f)</th>
<th>Percentage (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>0-5 (Poor Knowledge)</td>
<td>10</td>
<td>10%</td>
</tr>
<tr>
<td>2</td>
<td>6-10 (Good Knowledge)</td>
<td>56</td>
<td>56%</td>
</tr>
<tr>
<td>3</td>
<td>11-15 (Excellent Knowledge)</td>
<td>34</td>
<td>34%</td>
</tr>
</tbody>
</table>

The above table shows that 56% of the mother are showing good knowledge regarding neonatal jaundice, 34% are showing excellent knowledge regarding neonatal jaundice and 10% mother having poor knowledge.

Table 3: Mean and standard deviation of the knowledge of mothers regarding neonatal knowledge, N=100

<table>
<thead>
<tr>
<th>S. No</th>
<th>Categories</th>
<th>Mean N=100</th>
<th>Standard deviation N=100</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Knowledge Score</td>
<td>14.62</td>
<td>1.696</td>
</tr>
</tbody>
</table>

The data represents in table-3 shows that the mean and standard deviation is 14.62 and 1.696 respectively.

Table 4: Association of knowledge score with selected demographical variables, N=100

<table>
<thead>
<tr>
<th>Demographic Data</th>
<th>Differential Association</th>
<th>Table Value</th>
<th>Calculated Value</th>
<th>p-value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age</td>
<td>06</td>
<td>2.114</td>
<td>2.20</td>
<td>0.9</td>
</tr>
<tr>
<td>Education</td>
<td>04</td>
<td>1.4095</td>
<td>1.06</td>
<td>0.9</td>
</tr>
<tr>
<td>Occupation</td>
<td>02</td>
<td>0.0990</td>
<td>0.05</td>
<td>0.97</td>
</tr>
<tr>
<td>Gravida</td>
<td>02</td>
<td>0.10333</td>
<td>0.05</td>
<td>0.97</td>
</tr>
<tr>
<td>No. of children</td>
<td>02</td>
<td>0.836</td>
<td>0.10</td>
<td>0.95</td>
</tr>
</tbody>
</table>

Table no. 4 shows that there is no association between the knowledge of mothers with any of the demographic variables as p-value is less than 0.05.

4. Conclusion
The purpose of the present study was to assess the knowledge regarding neonatal jaundice among mothers admitted at Bharati hospital and research centre, Pune -43.
It was a descriptive research study which consist of 100 sample that were selected in the basis of the studies requirement. The result of data i.e 56 % of the sample having good knowledge, 34% sample having excellent knowledge and 10% sample shows poor knowledge regarding neonatal jaundice.

In the present study following conclusion were drawn from result of data of study, majority of sample have inadequate knowledge regarding neonatal jaundice.

In this study it is found that most mothers were having good knowledge but still there are mothers whose knowledge level are poor regarding neonatal jaundice. It shows that knowledge regarding neonatal jaundice among mother needs to improve and it requires greater attention commitment from health professional.

5. Recommendations
Keeping in view the findings of the present study, the following recommendations were made.
1) The study can be done in a larger sample size to confirm the results of the study.
2) The comparative between primigravida and multigravida study can be conducted.
3) An evaluating study can be done to determine the effectiveness of structured teaching programme of mother knowledge regarding neonatal jaundice.

6. References
5. Manju Bala Dash, Patel Salai SV. Pondicherry. 605001.