

Knowledge on infant and young feeding in first time mothers with babies aged less than one month attending out-patient department at a tertiary care rural hospital

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Abstract

Aim: To assess the knowledge on infant and young child feeding (till 2years of age) in first time mothers with babies aged less than one month attending paediatric outpatient department (OPD).

Design: Descriptive study

Results: Knowledge regarding breast feeding, breastfeeding within one hour after birth was (48.75%), 53.75% felt pre-lacteal feeds can be given, 44.75% had awareness that exclusive breast feeding to be given till 6 months of age, 46% felt breast feeding should be stopped after 1 year of age and 14.5% felt it has to be continued till 2 years of age. There was lack in awareness of age of starting, minimum times per day of feeding solid, semisolid or soft foods. There was lack in knowledge of giving food groups and 41.75% still felt that bottle feeding is not harmful and can be given.

Conclusion: There is still lack in knowledge on starting, duration and continuing breast feeding and weaning foods.

Keywords: Breast feeding, Infant and young child feeding, First time mothers, Less than one month.

Introduction

About 20 million children are not able to receive exclusive breastfeeding (EBF) for the first six months, and about 13 million do not get good, timely and appropriate complementary feeding along with continued breastfeeding according to National Family Health Survey-3 data. India has failed to witness any remarkable progress in infant feeding practices, with only a small increment being recorded in EBF rates amongst infants 0-6 months of age – from 41.2% in 1998-99 (NFHS-2) to 46.3% in 2005–2006 (NFHS-3).⁽¹⁾ Satish Tiwari et al recommends early initiation of breastfeeding within first hour of birth, exclusive breastfeeding for the first six months followed by continued breastfeeding for up to two years and beyond with appropriate complementary foods after completion of 6 months is the most appropriate feeding strategy.⁽²⁾ The practice of breastfeeding among Indian mothers is almost universal, but initiation of breastfeeding is quite late and the colostrum is usually discarded. Breastfeeding practices in rural communities are shaped by their beliefs, which are influenced by social, cultural, and economic factors. Continuous vigilance over infant feeding practices in the community is necessary for timely interventions, to ensure optimal growth and development. This information will be useful to policy makers for the formulation of interventional programs in the future.⁽³⁾ Improving infant and young child feeding (IYCF) practices have the potential to improve child health and development outcomes in poorly resourced communities.⁽⁴⁾ Malnutrition is responsible, directly or indirectly, for 60% of all deaths among children less than 5 years of age in India annually. Many of these deaths are possibly associated with inappropriate feeding practices during early years of life.⁽⁵⁾

Material and Methods

The aim of the study was to assess the knowledge on infant and young child feeding (till 2years of age) in first time mothers with babies aged less than one month attending paediatric outpatient department (OPD) at a rural tertiary care hospital. These mothers were selected because the knowledge of feeding practices in them might be deficit and to educate them at the earliest about the faulty feeding practices or perception and prevent malnutrition. Total 400 mothers attending paediatric outpatient department were interviewed with questionnaire in time period between June to November 2015. The questionnaire was self-prepared referring, WHO-Indicators for assessing infant and young child feeding practices. Consent was taken before using the questionnaire. All the mothers were educated about the infant and young child feeding till 2 years of age as per WHO guidelines after the questionnaire was completed. The results were analysed and expressed in percentage.

Results

Only 48.75% (195/400) mothers answered correctly that baby should be put to breast within one hour after birth. Out of 400, 215 mothers (53.75%) mothers felt that pre-lacteal feeds can be given to the baby. Out of 400, 179 (44.75%) mothers answered correctly that exclusive breast feeding should be given till 6months of age. About age of starting solid, semisolid or soft foods 53%(212) felt it should be started after 4 months of age and 37% (148/400) felt it should be started after 6 months of age. Rest of them 10% (40/400) did not have clarity in answering when to start solid, semisolid or soft foods. In knowledge about giving ≥ 4 food groups per day in children aged 6-23 months, only 23% (92/400) had idea about it. The 7 food groups are 1-Grains, roots and tubers, 2-Legumes and nuts, 3-Dairy products (milk,

yoghurt, cheese), 4-Flesh foods (meat, fish, poultry and liver/organ meats), 5-Eggs, 6-Vitamin-A rich fruits and vegetables and 7- Other fruits and vegetables. The details of food groups were explained before the question was answered by the mother.

Only 17.25% (69/400) had awareness about minimum number of times per day a breast fed or non-breastfed child aged 6-23 months to be fed with solid, semi-solid or soft foods or milk feeds. Minimum is defined as 2 times for breastfed infants 6–8 months, 3 times for breastfed children 9–23 months, 4 times for non-breastfed children 6–23 months.

Out of 400,163 (40.75%) had idea about iron rich foods or iron fortified foods for feeding to children aged 6 to 23 months. Only 14.5% (58/400) felt that breast feeding can be continued till 2 years of age, 46% (184/400) felt that breast feeding should be stopped after one year of age. Out of 400, 41.75% (167/400) felt that bottle feeding is not harmful and can be given. Out of 400, 78.75% (315/400) felt that a least 2 milk feeds should be given per day to children aged 6-23 months.

Discussion

The rate of early initiation of breastfeeding is low at 24.5%, while the median duration of exclusive breast feeding (EBF) among last-born children is as brief as two months. The rate of EBF drops progressively from 51% at 2-3 months of age to 28% at 4-5 months of age. In a recent Annual Health Survey conducted in India from 2010 to 2013 covering all the 284 districts (as per 2011 census) of 8 Empowered Action Group (EAG) States (Bihar, Uttar Pradesh, Uttarakhand, Jharkhand, Madhya Pradesh, Chhattisgarh, Odisha and Rajasthan) and Assam, the percentage of children breastfed within one hour of birth was observed to vary from 30% in Bihar and Uttar Pradesh to around 70% in Assam and Odisha. Children exclusively breastfed for at least 6 months ranged from 17.7% in UP to 47.5% in Chhattisgarh. Complementary feeding is introduced in only 53% infants between 6–8 months, with only about 44 % of breastfed children being fed at least the minimum number of times recommended. Overall, only 21% of breastfeeding and non-breastfeeding children are feed in accordance with the infant and young child feeding (IYCF) recommendations.^(1,2,6) N Das et al mentioned that 65.8% (225/342) mothers did not initiate breast feeding within 1 hour of birth, 41.7% (90/216) mothers of children aged 6 months or more did not exclusively breastfeed their babies up to 6 months and 28.1% (96/342) used bottles for baby-feeding. Perception scores among younger than 20-year-old mothers were found to be highest; however, practice score increased significantly with age. Though perception and practice of mothers with some education were significantly better they wane with higher education. Lowest practice score was found in the richest per capita income group. About 34.2% (117/342) children were put to breast within 1 hour of birth, 58.7% (74/126) infants aged 0-5 months

were fed exclusively with breast milk, while 66.6% (48/72) infants aged 6-8 months received solid, semi-solid or soft foods. However, 100% (12/12) children aged 12-15 months continued to be breast-fed, 56.2% (54/96) of the 28.1% (96/342) mothers who used bottle for feeding stated that it was convenient when they were busy.⁽⁵⁾

In study done by Wagh et.al, 198 (80.48%) infants received breast feeding within 1 hour after the birth (54.54% male and 45.45% female respectively). Most 122 (61.61%) of the lactating women initiated breast feeding within 1 hour were Muslim. Out of total respondent only 6 (3.03%) illiterate mother had started initiation of breast feeding within 1 hour. Most of 126 (63.63%) respondents among primary education level had started initiation within 1 hour. Majority 117(97.5%) hospital delivered women had started initiation of breast feeding within 1 hour.⁽⁷⁾

Amir Maroof Khan et al, did a cross sectional study to study the diet pattern of children less than 2 years with regard to certain infant and young child feeding (IYCF) indicators. A total of 374 children less than 24 months of age coming to the immunization clinic were studied using a standard pretested and pre-validated questionnaire. Exclusive breastfeeding was followed by 57.1% of children under 6 months of age. Minimum dietary diversity, minimum meal frequency, and minimum acceptable diet were seen adequate in 32.6%, 48.6%, and 19.7% of children between 6 months and 2 years of age, respectively.⁽⁸⁾ In study done by Syed E. Mahmood et al, most had initiated breastfeeding (78.8%) within 24 hours of delivery. About 15.4% of the infants did not receive colostrum and 22.8% of the infants were not exclusively breastfed. Ghutti (water mixed with honey and herbs), boiled water, tea, and animal milk were commonly used pre-lacteal feeds. About 47.2% of the respondents were not aware of the benefits of exclusive breastfeeding. About one quarter of the mothers started complementary feeding before the child was six months old. About half the deliveries had taken place at home and only a quarter of the females had had three or more antenatal visits during pregnancy. The birth weight of the majority (78%) of new borns was not measured. A majority (69.9%) of the mothers did not receive advice on child feeding.⁽⁹⁾

In the study done by Banapurmath et al, in villages of central Karnataka, the timely first suckling rate was 03%. All the infants received pre-lacteal feeds. Colostrum was rejected by 29% of mothers. Delayed initiation of breastfeeding was common; 35% of babies were not breast-fed even at 48 hours of birth. Exclusive breastfeeding was noted in 94% at 1 month, 83.5% at 2 months, 72.5% at 3 months, 61.2% at 4 months, 43.4% at 5 months and 26.8% at 6 months of age. Timely complementary feeding rate was 57.3% among infants from 6 to 10 months age. Continued breastfeeding rate was 99.7% at 1 year and 87.2% at 2 years. The bottle feeding rate was 49.4% among infants below 1 year age.

The ever breast-fed rate was 97.0% and the median duration of breastfeeding was beyond 24 months.⁽¹⁰⁾ Breastfeeding was initiated within the first hour after birth in 35.4% of children, 99.5% was ever breastfed, 98.1% were currently breastfed, and 3.5% were bottle-fed. The rate of exclusive breastfeeding among infants under 6 months of age was 53.1%, and the rate of timely complementary feeding among those 6 to 9 months of age was 74.7%. Mothers who made antenatal clinic visits were at a higher risk for no exclusive breastfeeding than those who made no visits. Mothers who lived in the mountains were more likely to initiate breastfeeding within 1 hour after birth and to introduce complementary feeding at 6 to 9 months of age, but less likely to exclusively breastfeed. Caesarean deliveries were associated with delay in timely initiation of breastfeeding. Higher rates of complementary feeding at 6 to 9 months were also associated with mothers with better education and those above 35 years of age. Risk factors for bottle feeding included living in urban areas and births attended by trained health personnel.⁽¹¹⁾

Limitations of the study

This study was conducted on first time mothers with infants age less than one month attending OPD. This does not represent an entire population. First time mothers with infants less than one month was selected so that early detection of false perceptions in feeding are detected and help to promote good feeding practices to improve the nutritional outcome of the children. Follow up was not done.

Conclusion

There is a need of teaching and promoting mothers on infant and young child feeding for better nutritional outcome of the children from antenatal period. Harmful practices such as giving pre-lacteal feeds, bottle feeding still exists which needs to be addressed. Exclusive breast feeding, early initiation of breast feeding should be promoted and education regarding complementary feeding needs emphasis.

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