



ISSN Print: 2394-7500
ISSN Online: 2394-5869
Impact Factor: 5.2
IJAR 2018; 4(9): 94-98
www.allresearchjournal.com
Received: 17-07-2018
Accepted: 18-08-2018

Sangeeta Ghuge
M.sc Nursing Student in
Obstetrics & Gynecology
Pune, Maharashtra, India

Jayabala Aghamkar
Assist. Professor Dr. DY Patil
College of Nursing, Pune,
Maharashtra, India

Rupali Salvi
Professor Dr. DY. Patil College
of nursing, Pune, Maharashtra,
India

A study to assess the knowledge and attitude regarding donating milk to the human milk bank among postnatal mothers of selected hospital

Sangeeta Ghuge, Jayabala Aghamkar and Rupali Salvi

Abstract

Introduction: Health is wealth. For the good health we need good nutrition. Nutrition for babies gets from mother's milk. Breast Milk is the safest and best protective food for infants and also the best choice to feed premature and ill babies. Superiority of human milk is due to its superior nutritive and protective value. It provides total nutrient requirement for the first six months of life. It also prevents malnutrition and allows the child to develop fully. But when there is not enough mothers' milk available due to some reasons like mother has insufficient milk glands, has had past breast surgery or is taking medication (e.g. chemotherapy for cancer) and has an infection that could spread to her baby through breast feeding. For these babies an alternative must be sought.

Methods research approach: Research approach: Descriptive approach is used in this study. A descriptive research approach was used to assess knowledge and attitude of postnatal mothers regarding donation of milk to human milk bank. The study was conducted in selected hospitals. The sample composed of 60 postnatal mothers of selected hospitals. The sampling technique used in this study was non probability convenience method of sampling. A structured knowledge questionnaire was used for data collection.

Research design: One group pretest posttest quasi experimental design used this study.

Result: Regarding association between the baseline variables with knowledge scores it was found that there was no significant association between the demographic variables. This result indicates that the postnatal mothers are having adequate knowledge. In order to achieve the objective analysis of overall comparison of knowledge and attitude describe the result that 78.33% of the samples had excellent level of knowledge score, 21.67% had good level of knowledge score. 53.33% of the samples had good level of attitude score and 46.67% had excellent level of attitude score. Its shows that postnatal mothers were having adequate knowledge and positive attitude towards the donating milk to the Human Milk Bank.

Conclusion: Findings of the study show that postnatal mothers were having adequate knowledge and attitude towards the donation of milk to the human milk bank.

Keywords: Human milk bank, donating milk

Introduction

Health is wealth. For the good health one needs good nutrition. Nutrition for babies is from mother's milk. Breast Milk is the safest and best protective food for infants and also the best choice to feed premature and ill babies. Superiority of human milk is due to its superior nutritive and protective value. It provides total nutrient requirement for the first six months of life. It also prevents malnutrition and allows the child to develop fully. But when there is not enough mothers' milk available due to some reasons like mother has insufficient milk glands, has had past breast surgery or is taking medication (e.g. chemotherapy for cancer) and has an infection that could spread to her baby through breast feeding. For these babies an alternative must be sought.

In the past, the practice of Wet nursing provided an alternative to maternal breast feeding for those who could access it. When a wet nurse was not available, milk from goat, sheep and other mammals were also used as substitute nourishment for babies, often with fatal results. But in late 1950's the concept of human milk banking started. In 1980's at the World Health Assembly, the WHO and UNICEF jointly declared, Where it is not possible for the biological mother to breast feed, the first alternative, if available, should be the use of human milk from other sources. Human milk banks should be made available in appropriate situations.

Correspondence
Sangeeta Ghuge
M.sc Nursing Student in
Obstetrics & Gynecology Pune,
Maharashtra, India

Methodology

Research approach: Descriptive approach is used in this study.

Research design: One group pretest posttest quasi experimental design.

Variable under study

Independent variable: The independent variable in this study is donating milk to the Human Milk Bank.

Dependent variable

The dependent variables in this study were knowledge and attitude of postnatal mothers.

The sampling technique: Used in this study was non-probability convenience method of sampling

Research setting: This study is conducted in postnatal wards selected hospitals. To avoid the contamination of sample the reliability and pilot study was conducted in the selected hospitals

Population: In this study the population consisted of all the postnatal mothers admitted in selected hospitals

Sample

Criteria for Sample Selection

Inclusive criteria:

1. Postnatal mothers admitted in selected hospitals.
2. Postnatal mothers who were willing to participate in the Study.
3. Present during the period of data collection.
4. Able to read and write Marathi.

Exclusive criteria

1. Postnatal mothers who were critically ill.
2. Postnatal mothers who were not willing to participate research study.
3. Postnatal mothers who had participated in similar programmer.

Sample Size: 60

Development of tool: Development of tool was based on research study for the collection of data knowledge questionnaire and attitude scale was used in research study. A questionnaire was formulated after reviewing of literature. There are 20 questions in knowledge questionnaire

Description of the Tool

The structured knowledge questionnaire consists of 3 sections.

Section I

Demographic data

It includes the demographic data such as Age, Education, Occupation, Monthly Income Number of parity, Family type and previous knowledge.

Section II

Knowledge Questionnaire

There are multiple choice questions to assess the knowledge of postnatal mothers regarding donating milk to the Human Milk Bank. Total 15 items were selected for the questionnaire. A blue print was prepared.

Scoring

Score 1 was given to every correct answer.

Score 0 was given to every wrong answer. Based on the percentage of scores, level of knowledge was graded as follows.

The total knowledge score were categorized into

Table 1

Grade	Score	Marks
Poor	Below 25 %	00 – 04
Average	26 – 50 %	05 – 10
Good	51 – 75 %	11 – 15
Excellent	Above 76 %	16 – 20

Validity: The content Validity of the tool was established in consultation with guide and seven experts from the field of obstetrics and gynecological Nursing. Suggestions of the experts were considered and changes were made accordingly.

Ethical consideration

The research problem and objectives were approved by the research committee and follows by procedure mentioned below.

1. Due permission from authorities was sought and obtained.
2. Consent from participants was taken.
3. Anonymity of the participants was ensured.
4. Freedom to withdraw from the study any time was assured.

Reliability: In this study, the reliability of the tool was determined by administering the questionnaire to six samples. Split half method was used for reliability.

The reliability co-efficient was calculated. The Questionnaires is said to be reliable if the co-efficient is more than 0.8

Plan of data collection

Pilot study: The pilot study was conducted from 31st August 2016 for a period of five days. Study was conducted in Bhosari hospital PCMC. A sample of 6 postnatal mothers was selected from selected hospitals. The Investigator approached each sample individually discussed the objective of study and obtained consent for participation in study.

Knowledge and attitude of postnatal mothers regarding donating milk to the Human Milk Bank was assessed by administering the Questionnaire and Attitude Scale.

The collected data was coded tabulated and analyzed by using descriptive statistics (mean, percentage, standard deviation) and coefficient correlation to find out the association between the demographic variables and knowledge and attitude score.

Result

The participants included in the study were between 60 postnatal mothers these were assessed with regard to age assessed and tabulated in table. 65% of the samples were in the age group of 20-30 years and 35% belonged to 31-40 years of age. Majority 56.7% of the samples were having secondary education. Majority 36.7% of the samples were having daily wages. 31.7% of the samples were house wives. Majority 58% of the samples belonged to Rs.5000/-to Rs.10000/-income group. Highest percentage 50% of

samples were having joint family and 46.7% of samples were having nuclear family. The mean knowledge score calculated was 13.45 and standard deviation was 1.25 whereas mean attitude score was 37.18 and standard deviation was 4.32. This result indicates that the postnatal mothers are having adequate knowledge. In order to achieve the objective analysis of overall comparison of knowledge and attitude describe the result that 78.33% of the samples had excellent

level of knowledge score, 21.67% had good level of knowledge score. 53.33% of the samples had good level of attitude score and 46.67% had excellent level of attitude score. It shows that postnatal mothers were having adequate knowledge and positive attitude towards the donating milk to the Human Milk Bank. Regarding association between the baseline variables with knowledge scores it was found that there was no significant association between the demographic variables.

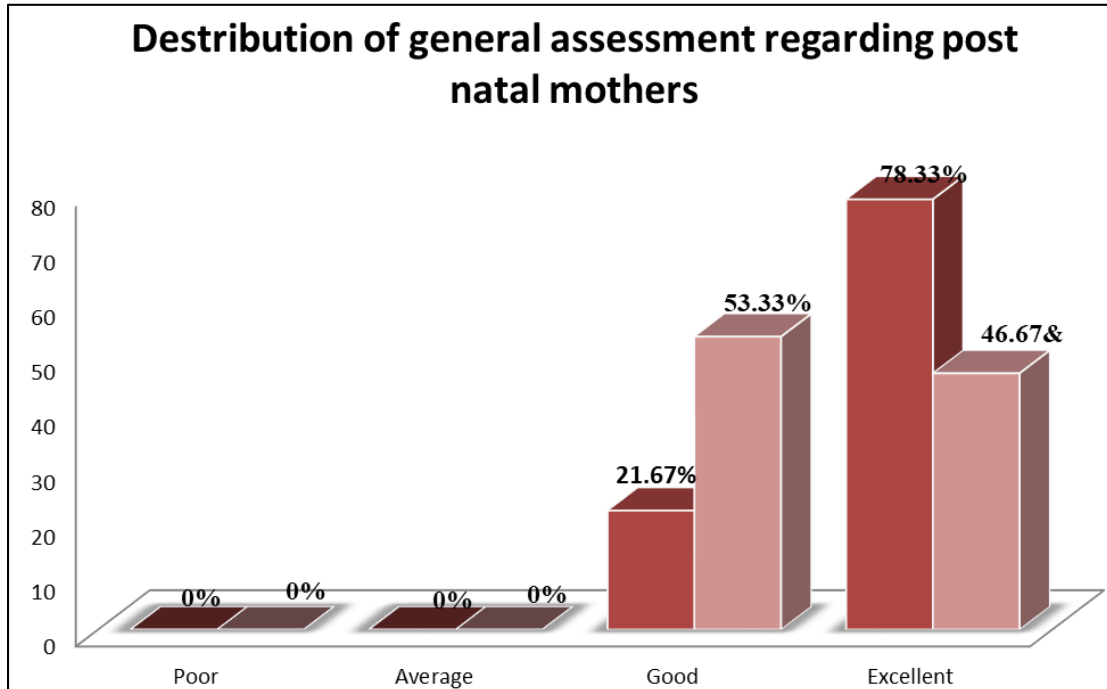


Fig 1

Interpretation and conclusion

Findings of the study show that postnatal mothers were having adequate knowledge and attitude towards the donation of milk to the human milk bank.

Conclusion

This chapter discusses the findings of the study to assess the knowledge and attitude of postnatal mothers on donating milk to the Human Milk Bank in selected Hospital. In order to achieve the objectives of the study, a descriptive research approach was adopted.

Non probability convincing sampling technique was used to select the sample. The data was collected from postnatal mothers admitted in selected hospital.

Discussion

There are cases when both these hormones are not produced properly and thus, not only the moms have to face the problems, babies are also deprived of proper nutrition. Mother's milk has many additional nutrients that are not present in cattle-produced milk such as lactones (produced from glucose in blood) and proteins (produced from amino acids).

In mother's milk, all the nutrients are present in balanced form, appropriate for baby's diet. With the advancing age of the child, the baby needs more nutrition and more nutrients that the baby can get only from the mother's milk and not from the cattle's milk or infant formulas.

Limitation: Following were the limitations of the study, it includes

1. The study is limited to only postnatal mothers, who were admitted in the selected hospitals.
2. Data collection period was limited for 3 weeks.
3. The Sample size was limited to 60 subjects.
4. Sample was small therefore the result cannot be generalized.

Recommendations

The present study recommends the following.

1. A comparative study can be done in large sample between two different hospitals to evaluate the knowledge level of postnatal mothers regarding donating milk to the Human Milk Bank.
2. A similar study can be replicated with a control group and on a larger population.
3. A survey to assess the knowledge, belief and practices can be undertaken.
4. A study to find out the effect of nursing interventions.
5. A study to find out the effect of different teaching methods in improvement knowledge of nurses.

Acknowledgement

This effort in my academic pursuit would not have been a reality but for the constructive support, guidance and encouragement by a number of people, whose help, I specially recognize through this study.

With profound joy and deep sense of gratitude, I thank God Almighty for His able providence, throughout the course of this project. It is because of the Almighty that the Investigator has been able to drive all strength to complete this study.

No words can express my heartfelt gratitude to Thanks my (Dr.) Mrs. Khurshid Jamadar Principal Dr. D.Y. Patil College of Nursing and my research Guide (Mrs.) Jayabala Aghamkar Asso. Professor, Dr. D.Y. Patil College of Nursing and Research Co-Ordinator Mrs. Rupali Salvi, Associate Professor for her expert and supportive guidance. During my darkest, stressful moment, were like the rising sun casting brightness and bringing life to the gloomiest areas. Their humor, wisdom and experience in projecting the positive aspect of any situation was the propelling force which has culminated in this dissertation the crowning glory of all my endeavors. I am thankful to her, for her inspiration constant guidance, sustained patience, valuable suggestion and support and moreover encouragement right from the inception until the completion of this study.

I am deeply indebted to Ms. Manisha Gaikwad, Class Co-ordinator for her expert guidance, sustained patience and valuable suggestions.

I am grateful to, Dr. (Mrs.) Khurshid Jamadar, Principal, Dr. D.Y. Patil guidance and support for the study.

I take this opportunity to express my sincere gratitude towards the entire faculty of Dr. D.Y. Patil College of Nursing, Pimpri, Pune-18 as well as the administrative staff for their support and assistance throughout the study period.

I would like to take this opportunity to thank all experts in the field of Pediatric preventive and social medicine as well as child health departments, community department for their valuable suggestions and validation of the data collection instrument and plan.

I would also like to convey my sincere thanks to statistician Mr. Babar who supported me to conduct this study as well as rendered his valuable time for my study.

My sincere thanks to Mrs. Archana Rathod, M.A. MPhil (English) for editing the manuscript.

I would like to thank all the participants who made this study possible. Lastly, my sincere thanks to all my family, colleagues, friends and well-wishers for their good wishes for this study.

The proverb that one can never make alone could never be truer than in this situation.

References

1. N Jayne Klossner. Introductory Maternity Nursing delphia Lipincotte Williams and Wilkins. 2006; 81(1):61-4.
2. Rebeiro KD *et al.* The effect of processing of human milk. *J Pediatric*. 2005; 84(1):61-67.
3. Lindeman PC *et al.* Characteristics of breast milk and serology of women donating breast milk to a milk bank. 2007; 89(5):440-1.
4. Roman SV *et al.* setting up a neonatal unit. *A Pediatric (Barc)*, 2009, 71(4).
5. Subiaco. Women and Newborn health service, Breast feeding and Breast care King Edward Hospital. 2007; 89(5):40-1.
6. Hestenes, Carroll AT. Awareness and Practices of management male in a rural area of East Delhi, *Indian Community Med*. 2007; 9(8):32-33.
7. Feinberg, Hauser. Field Report from National Consensus Development and Conference of behavior problem and cognitive process. 2012; 2(8):12-15.
8. J Haley W. journal Current research findings on decision role to play in the Women's health infants. 2011; 8(9):45-47.
9. Kerr. Language development during early childhood is the increasing level of comprehension knowledge and practice 'advance nurses. 2009; 9(8)42-43.
10. Mackenzie C, Javanparast S, Newman L. Mothers' knowledge of and attitudes toward human milk banking in South ustralia. 2013; 29(2):222-9.
11. Dutta, P parul. *Paediatric Nursing*, 2nd Ed. New Delhi Jaypee Brothers Medical Publishers, 2009; 2:51.
12. Willams A, Fisher C, Greasley V, Trayler H. Woofride Human milk banking. *Journal of tropical paed*. 2011; 31(4):85-190.
13. Hockenberry Wilson, Winkelstein Kline. *Nursing care infants and children*. 7th ed. India, 2011, 273-4.
14. Neeta Lal. Growing pains for India's milk banks, *South Asia*, 2008, 22-23.
15. JH Kim, Unger. Human milk banking, Canadian Paediatric Society, Nutrition and Gastroenterology Committee, *Paediatr Child Health*. 2011; 15(9):595-598.
16. Dr Carolyn Nash, Dr Lisa Amir. For the Maternal and Child Health Sub-committee, Human Milk Banking.
17. Damien Larkins, Mothers' milk bank aims to reduce infant diabetes risk, 2015.
18. Ighogboja IS, Olarewaju RS, Okuonghae HO, Mothers attitudes towards donated breast milk in Jos, Nigeria, *J Hum Lact*. 1995; 11(2):93-6.
19. Jeremy Oats, Suzanne Abraham. S Sharma. Text book. Elsevier, 2005, 94-95.
20. Arnold LDW. Global health policies that support tbanked donor human milk:a human rights issue. *International Breast feeding Journal*. 2006; 1(26).10.1186/17 46-4358-1-26.
21. Polit D, Beck C. *Nursing Research: Generating and Assessing Evidence for Nursing Practice*, 8th edi. Lippincott Williams & Wilkins publication, 2008.
22. Fishbein M, Ajzen I. *Belief, attitude, intention, behavior introduction to theory and research*. Reading, Addison-Wesley. 2011; 46-4358:1-26.
23. Ajzen I, Fishbein M. *Understanding attitudes and predicting social behavior*. Englewood Cliffs, NJ: Prentice, 2000.
24. WHO and United Nations Children's Fund, UNICEF, Protecting and supporting Breast feeding. The special role of maternity services. 1989: 1:03-08.
25. Ray G, Reddy DCS. Some aspects of feeding and weaning practices in an urban slum community. *Indian J Pub Health*, 1998: 32:207-8.
26. Reddy Sunita. Breast feeding-practices, problems and prosects. *The Journal Family Welfare*. 1995; 41(4):43-51.
27. JD BAUM. Human Milk Banking, *Indian Journal of Paed-iatrics*. 1981; 49:95-104.
28. Thimmayamma BVS, Vidyavati M. infant feeding practices of working mother in an urban area, *Indian Journal of Medical Research*. 1980; 72:834-39.
29. Dwivedi SN, Banerjee N, Yadav OP. Malnutrition among Children in an Urban Slum and Its Association".

- Indian Journal of Maternal and Child health. 1992; 2:78-81.
30. KN Newton J, Chudhari L. Grossmam Merewood. Factors associated with Exclusive Breast feeding among Lactating Womens Journal of Human Lactation. 2009; 2:28-33.
 31. Ghosh S, Shah D. Nutritional problems in urban slum children; Indian Paediatric Journals. 2004; 41(7):682-695.
 32. Ranganathan J, ns shirur IAP. Text book of pediatrics, trends in breast feeding, the journal of Indian pediatrics, 1st ed. 1999; 18(9):655-660.
 33. JH Kim, S Unger. Human milk banking, Paediatr Child Health. 2010; 15(9):595-598.
 34. Arnold LDW. Human milk banking in North America. Journal of Human Lactation. 1997; 13(2):159-162.
 35. Infant mortality rate demographics. Cited Oct 22] Available from: URL: India/ infant mortality rate, 2011.
 36. Marea Ryan. Why we need a mother's milk bank. [online] [cited Sep 5], 2010. Available from: URL: <http://www.bendigobank.com>.
 37. Wojick KY, Rechtman Lee, ML Montova, a Medo ET. Macronutrient analysis of donor breast milk. [online] [cited Sep 14] Available from: URL: [http:// www. Ncbi.nlm.gov/pubmed](http://www.Ncbi.nlm.gov/pubmed), 2002.
 38. Aprile Mda, Feterbaum R, Andreassa N, Leonac Growth, clini- cal evaluation of low birth weight infants. [Online], 2010. [cited Sep 14] <http://www.ncbi.nlm.nih.gov/pubmed>.
 39. Coustodis, Adihikari, Nair N, Coustoudis A. feasibility and setting up of a donor milk bank. [Online] 2011. <http://www.ncbi.nlm.nih.gov/pubmed>.
 40. Utrera Torres, Medina Lopez, Vazquez Roman, Alonso Diaz, Cruz Rojo, Fernandez Cooke. Beneficial effects of human milk. [Online] 2010. Cited Sep 16. <http://www.ncbi.nlm.nih.gov/>
 41. Narayanan I, Prakash K, Bala S, Verma RK, Gujral VV_Partial supplementation with expressed breast milk for prevention of infection low-birth-weight infants. 1980; 2(8194):561-3.
 42. Mackenzie C, Javanparast S, Newman L. Mothers knowledge and of attitudes toward human milk banking in South Australia:a qualitative study. 2013; 29(2):222-9. <http://23515087>
 43. Ighogboja IS, Olarewaju. Mothers' Attitudes towards Donated Breast milk. URL:<http://jhl.sagepub.Com/content/11/2/93>.
 44. Coutoudis I, Petrites A, Coutoudis A. Acceptability of donated breast milk in a resource limited South African setting. International Breastfeeding Journal. 2011, 6(3) Available from: International breast feedingjournal.com.
 45. Humana DEL, Donantes EDM. Breast milk donation: women's donor experience, 2008; 07. Available from URL: <http://www.scielo.br/scielo.php>.
 46. Thomaz ACP, Loureiro LVM. Oliveira TDS, Montenegro NCM *et al.* Al. The human milk donation experience: motives, infl uencing factors, and regular donation. Journal of Human Lactation. 2008; 24(1):69-76.
 47. Quigley MA, Henderson G, Anthony MY. Mc Guire W. Formula milk versus donor breast milk for feeding preterm or low birth weight infants. Cochrane Database Systemic Reviews. 2007, (4).
 48. Alencar LCD, Seidl EM. Breast milk donation and social support: reports of women donors. Revista Latino Americana Enfermagem. 2010; 18(3):381-9.
 49. Osbaldiston R, Mingle LA. Characterization of human milk donors. Journal of human lactation. 2007; 23(4):350-7.
 50. Thorley V, Mothers' experiences of sharing breastfeeding or breast milk co-feeding in Australia 1978-2008, Breastfeed Rev. 2009; 17(1):9-18.
 51. Winn NN. Breast feeding duration in mothers who express breast milk. Available at <http://www>.
 52. Aurbac G. athleen. Maternal employment and Breast feeding. Available at [http://www. ncbi.nih.gov/pubmed /10829](http://www.ncbi.nih.gov/pubmed/10829).
 53. Ruby Lukose MV. Shetty institute of health science. RGUHS dissertation on expression and storage of breast milk, 2003.
 54. Forte A, Mayberry LJ, Ferketich S. Breast milk collection and storage practices among mothers of hospitalized neonates. J Perinatol. 1987; 7(1):35-9.
 55. Slutzah M, Codipilly CN, Potak D *et al.* Refrigerator storage of expressed human milk in the neonatal intensive care unit. J Pediatric. 2010; 156(1):26-8.
 56. Igumbor EO, Mukura RD, Makandiramba B, Chihota V. Storage of breast milk: effect of temperature and storage duration on microbial growth. Cent Afr J Med 2000; 46(9):247-51.
 57. Sisk P, Quandt S, Parson N, Tucker J. Breast milk expression and maintenance in mothers of very low birth weight infants: supports and barriers. J Hum Lact. 2010; 26(4):368-75.
 58. Becker GE, McCormick FM. Renfrew MJ. Methods of milk expression for lactating women. Cochrane Database Syst Rev. 2008 8; (4):006170.
 59. Vijayalakshmi S, Raman AV. Breast feeding technique in prevention of nipple sore. Nursing Journal of India, 2002.
 60. Shu-Shan Lin, Chien Chen Jei Tai. Effectiveness of prenatal education programme on breast feeding outcomes in Taiwan. Journal Clinical nursing. 2007; 17(3):296-303.
 61. Vijayalakshmi. Planned teaching programme for mothers. NNT. 2007; 2(3):23-25.
 62. Dhaital AD. Structured teaching programme on adolescents. British journal of Midwifery. 2005; 6(2):63-66.
 63. Basavanthappa. Nursing research, 1stedition, New Delhi, J P. Brother, and Med Publisher limited, 2008, 56-57.
 64. Bigelow AE, Maclean K, Proctor J. The role joint attention in the development of infants' play with objects. Developmental Science. 2004; 7:518-526.
 65. Text book of Sharma' 1stedition.vol.2.jaypee publis, 2008, 7:8.
 66. Stenberg. Tamis Monda *et al.* Effects of and Infant Child Development. 2008; 12:399-419.