

Contribution of Knowledge on Breastfeeding among Mothers Who Joined Mother Support Group Program

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ABSTRACT

The infant feeding decision is complex and involves the influence of psychological, social, and economic factors, and health care system. This study aimed to determine the contribution of knowledge on breastfeeding among nonworking mothers. This was a cross-sectional study conducted in Yogyakarta, Indonesia. A total of 173 nonworking mothers with babies between 0-6 months who joined the mother support group (MSG) program participated in this study. The results showed that knowledge has significant influence on breastfeeding practice among the non working mothers (beta=.21, p=.01). MSG may be a suitable method to promote breastfeeding among Indonesian mothers.

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1. INTRODUCTION

The World Health Organization, the International Pediatric Association, the British Department of Health and Social Security, the American Association of Public Health, and the Academy of Pediatrics endorse breastfeeding. The justification for breastfeeding as the infant feeding method of choice continues to be well documented in the scientific literature. Significant nutritional, anti-allergenic, immunological and psychological benefits of breast milk have been identified. Many studies have described the unique advantages of human milk [1]-[5]. Chezem et al. (2003) stated that nutrients percentage contained in breast milk are exactly suits the needs of the infant to grow and develop. Moreover, over six months following birth, breast milk transformed from colostrums into mature milk, which protects the infant from gastrointestinal tract and respiratory organs infections, as well as providing protection during the development of the immune system while the immune system [1].

Clinical experiments have established the value of breastfeeding in preventing otitis media, gastroenteritis, asthma, shigella infection, and a variety of other diseases. For the mother, lactation facilitates a faster return to a pre-pregnant weight while suppressing ovulation for many. The economic advantage and the enhancement of the mother-infant bond have also been discussed as important benefits to breastfeeding [3]-[5]. Furthermore, demonstration the mother's love to the infant during the breastfeeding process contributes to the development of a healthy personality in an infant [2].

The infant feeding decision is complex and involves the influence of psychological, social, and economic factors, and health care system. Several authors have identified education and social support as the key factors in the promotion of breastfeeding. Due to lack of knowledge, sociocultural, economic, and personal reasons, women may choose to bottle-feed completely. Those who do intend to breastfeed may

supplement too early with formula, thus undermining the establishment of lactation, or have potentially remediable problems that lead to premature discontinuation of breastfeeding [6]. Added to the problem is the fact that in some hospital practices, attitudes of health care personnel and aggressive marketing of commercial formula encourage the choice of formula feeding.

It is recommended by the WHO/UNICEF to have the infant exclusively breastfed for approximately the first 6 month postpartum (after birth) before gradually be introduced to complementary food while the breastfeeding is continued until 2 years or more [7]. Albeit many researches around the factors affecting breastfeeding duration has been done in the past decade, including maternal demographics, attitudes and beliefs, and hospital practices [8], most countries failed to meet the WHO recommendation for exclusive breastfeeding [9].

Dennis (2002) maintained that non-modifiable demographic variables such as maternal age, marital status, educational level, and socioeconomic status contributed to premature breastfeeding discontinuations [8]. Therefore, in order to effectively improve low breastfeeding duration rates, reliably assessing high-risk women and identifying predisposing factors are amenable to intervention [10].

An empowerment program might increase a mother's perceived control over her environment by encouraging active participation based on her requests regarding the content and the program implementation, by designing a mother-oriented program, and by helping them to determine the suitable solution [11]. Consequently, improvement of the rate of breastfeeding will be produced by an empowerment program which (1) based on the requests of mothers who are willingly conduct breastfeeding, (2) helps to host mothers to share their problems regarding to breastfeeding, and (3) provide mothers with practical knowledge and skills related to breastfeeding.

2. RESEARCH METHOD

This was a cross sectional study examining the influence of knowledge on breastfeeding among nonworking mothers who joined MSG program. A total of 173 nonworking mothers with babies between 0-6 months who joined the MSG program in Yogyakarta, Indonesia participated in this study. The reliable questionnaire (Alpha cronbach's value for the questionnaire was .79) employed to collect data regarding breastfeeding knowledge. The data regarding breastfeeding practice was also collected by reliable questionnaire (Alpha cronbach's value for the questionnaire was .88).

3. RESULTS AND ANALYSIS

Linear regression showed that there was significant influence of knowledge on breastfeeding ($p = .008$). It means, the more knowledgeable the mothers in term of breastfeeding, the more they breastfeed their babies. Finding of the current study is similar with most of the previous studies. Susin, et al. (1999) found that mothers' with high level of knowledge had a 6.5 times higher chance of exclusively breastfeeding at the end of the third month, and 1.97 times higher chance of continuing breastfeeding to the end of the sixth month [10]. Kong and Lee (2004) in their mix-method study concluded that mother's knowledge was identified as important in influencing infant feeding choice [13]. Moreover, the study done by Shaker, Scott, & Reid (2004) showed that parents of breastfed infants were more knowledgeable about the health benefits and nutritional superiority of breastfeeding [12].

Finding of this study is also similar with the previous study conducted by Dungy et al. (2008). The study population included pregnant women and members of their social networks in the context of a very low-income community in Glasgow. They found that knowledge predicts breastfeeding initiation in this population [15]. In a study in Alor, Indonesia, Zama (2006) concluded that level of knowledge related to exclusive breastfeeding practice [16]. Similar with Zama (2006), Eva, (2010) also found that level of knowledge relates to exclusive breastfeeding practice. Her study was located in Sub-district of Pahandut belong to working area of Pahandut Health Center in Palangkaraya, Indonesia [14].

However, result from the present study is different from the finding by Chatman et al. (2004). A cross-sectional study was conducted in 11 health centers within the parish of Saint Ann, Jamaica. The objective of this study was to gather information about factors that influence exclusive breastfeeding and its duration. A pre-tested questionnaire collected information on breastfeeding knowledge toward intention to breastfeed and other relevant socio-demographic characteristics. Information was documented for 599 mother-child pairs. The prevalence of breastfeeding initiation was 98.2 percent; of mothers who initiated breastfeeding, 22.2 percent practiced it exclusively (at least 6 months). They found that there is no difference between exclusive and nonexclusive breastfeeding mothers in terms of knowledge about breastfeeding [15].

Mothers need to know the skills and advantages of breastfeeding so that they can continue to feed their babies and keep up their milk supply. The knowledge about benefits and technique of breastfeed is very

important for successful breastfeeding practice. Mother's knowledge was identified as important in influencing infant feeding choice [13].

From the result of present study as well as the other studies discussed above, it appears that knowledge is a predictor of breastfeeding. Almost all of the studies showed that knowledge is important in influencing breastfeeding practice.

The findings are in line with the SCT [16]. From SCT perspective, mothers' behavior can be influenced by mothers' personal factor such as knowledge. Mothers' breastfeeding practice is influenced by mothers' breastfeeding knowledge.

The results are also in line with integrated behavior model (IBM). According to the IBM Montana & Kasprzyk (2008), a particular behavior is most likely to occur if a person has the knowledge. Breastfeeding practice is most likely to occur if mother has the knowledge about breastfeeding [18].

There are some types of knowledge. Declarative knowledge is knowledge about *what*; it is knowledge about facts, terms, concepts, and generalizations. Procedural knowledge is knowledge about *how*; it is knowledge about procedures or problem-solving methods. Conditional knowledge involves knowledge of both what and how. It involves knowing the necessary information and how to apply it in the right situation [21]. In MSG, mothers share and discuss all of the types of knowledge related to breastfeeding. They got and share knowledge about *what* is breastfeeding, about *how* to breastfeed, as well as knowledge about problem solving in breastfeeding. All of the types of knowledge above were covered in MSG.

Breastfeeding knowledge is mother's understanding about breastfeeding and breastfeeding practices, especially exclusive breastfeeding. The constructs of knowledge that have significant influences on breastfeeding were examined. There are four elements of knowledge, they are: (1) Problem with breastfeeding and exclusive breastfeeding, (2) Knowledge about breastfeeding advantages, (3) Knowledge about effective feeding, (4) Knowledge about colostrum.

The result was in line with the integrated behavior model (IBM). According to the IBM, a particular behavior tends to occur if a person possess the knowledge, and there is no serious environmental constraint preventing the performance. The mothers possess the knowledge about breastfeeding, and there is no serious environmental constraint preventing breastfeeding practice, than the mothers practicing breastfeeding successfully. For nonworking mothers, usually there are fewer obstacles and barriers to breastfeed their babies than working mothers. They stay at home all the day with their babies, so they can breastfeed on demand. There are no limitation related to time and distance between mother and her baby [18].

4. CONCLUSION

Knowledge has significant influence on breastfeeding practice among nonworking mothers who joined MSG program. MSG may be a suitable method to promote breastfeeding among mothers.

This research has examined contributions knowledge on breastfeeding practice among Indonesian MSG mothers. Research in this field is fundamental as it can be a vehicle that brings forward MSG program and the benefits that can be gained by the mothers. However, there are other factors involved and may contribute to breastfeeding practice. As the respondents may only represent the mothers who are involved in MSG program, future studies involving non-MSG mothers can be carried out.

REFERENCES

- [1] Kim, H.S. "Potential indicators of insufficient milk supply syndrome", *Journal of Korean Academy of Nursing*, Vol/Issue: 24(1). Pp. 33-46, 1994.
- [2] Ball TM, Bennet DM. "The economic impact of breastfeeding", *Pediatric Clinic North America*, Vol/Issue: 48(1). Pp. 253-62, 2001.
- [3] Labbok M, Perez A, Valdes V. "The lactational amenorrhea method: a new postpartum introductory family planning method with program and policy implications", *Adv Contracept*, Vol. 10. Pp. 93-109, 1994.
- [4] Avery, M., Duckett, L., Dodgson, J, K. & Henly, S.J. "Factors associated with early weaning among primiparas intending to breastfeed", *Maternal and Child Health Journal*, Vol/Issue: 2(3). Pp. 167-179, 1998.
- [5] WHO. *The global strategy on infant and young child feeding*. A joint WHO/ UNICEF statement. World Health Organization, Geneva, Switzerland, 2003.
- [6] Dennis, C.L. "Breastfeeding initiation and duration: a 1990-2000 literature review", *JOGNN*, Vol/Issue: 31(1). Pp. 12-32, 2002.

- [7] WHO. World Health Organization. *The optimal duration of exclusive breastfeeding*. Note for the press no.7. Available at: <http://www.who.int/inf-pr-2001/en/note2001-07.html>, 2001.
- [8] Dennis, C.L. "Theoretical underpinnings of breastfeeding confidence: a self-efficacy framework", *Journal of Human Lactation*, Vol. 15. Pp. 195-201, 1999.
- [9] Dunst, C.J., Trivette, C.M., Deal, A.G., *Enabling and empowering families: principles and guidelines for practice*. Brookline Books, Cambridge, MA, 1998.
- [10] Susin, L.B, Giugliani, E.R, Kummer, S.C., Maciel, M, Simon. C., and da Silveira, L.C. "Does parental breastfeeding knowledge increase breastfeeding rates?" *Birth*, Vol/Issue: 26(3). Pp. 149-156, 1999.
- [11] Kong, S.K.F., and Lee, D.F.T. "Factors influencing decision to breastfeed", *Journal of Advanced Nursing*, Vol/Issue: 46(4). Pp. 369-379, 2004.
- [12] Shaker, I, Scott, J.A., and Reid, M. "Infant feeding attitudes of expectant parents: breastfeeding and formula feeding", *Journal of Advanced Nursing*, Vol/Issue: 45(3). Pp. 260-268, 2004.
- [13] Dungy, C.I., McInnes, R.J., Tappin, D.M., Wallis, A.B, Oprescu, F. "Infant feeding attitudes and knowledge among socioeconomically disadvantaged women in Glasgow", *Matern Child Health J*, Vol. 12. Pp. 313-322, 2008.
- [14] Eva, M.K. "Faktor yang berkaitan dengan praktek pemberian ASI eksklusif (studi di kelurahan Pahandut Kota Palangkaraya Propinsi Kalimantan Tengah)", *Skripsi*. Surabaya: Universitas Airlangga, 2010.
- [15] Chatman, L.M, Salihu, H.M, Roufe, M.E.A., Wheatle, P., Henry, D., Jolly, P.E. "Influence of knowledge and attitudes on exclusive breastfeeding practice among rural Jamaican mother", *Birth*, Vol/Issue: 31(4). Pp. 265-271, 2004.
- [16] Bandura, A. "Health promotion by social cognitive means", *Health Education and Behavior*, Vol. 31. Pp. 143-164, 2004.
- [17] Montano, D.E., & Kasprzyk, D. "Theory of Reasoned Action, Theory of Planned Behavior, and the Integrated Behavioral Model", in K. Glanz, B.K Rimer, & K. Viswanath (eds.). *Health behavior and health education theory, research, and practice*: San Fransisco: Josey-Bass, 2008.
- [18] O'Donnel, A.M., Reeve, J., Smith, J.K. *Educational psychology reflection for action*. Hoboken, NJ: Wiley, 2009.