

Research Article

Increasing Mothers' Knowledge and Attitude on Exclusive Breastfeeding Using Booklets as Media in Watershed Areas

Agrina*, Ainil Hasanah, Bayhakki

Faculty of Nursing, Universitas Riau

ORCIDAgrina: <https://orcid.org/0000-0001-6633-7755>**Abstract.**

There are various factors related to the failure of giving exclusive breastfeeding in the first six months of life, one of which is the knowledge and attitude of breastfeeding mothers. This study aims to assess the effectiveness of booklets as a medium in increasing the knowledge and attitudes of breastfeeding mothers on exclusive breastfeeding for infants 0-6 months in the watershed areas of Kampar district. Quasy-experiment design with one group pretest and posttest research design on 34 respondents, which was taken using a purposive sampling technique. Health education using booklets were given to the mothers of 0-6 month-old babies for three days. The research questionnaire used was valid and reliable. A t-test dependent sample t-test analysis was used for a statistical test. The results showed that the majority of mothers did not exclusively breastfeed their babies (67.60%). The range of the mothers' age was 20-35 years (82%), where most were high school graduates (61.8%) and housewives (73.5). The average knowledge and attitudes of breastfeeding mothers increased after being educated using the booklets, as much as 3.85 for knowledge and 33.91 for attitudes. Education using the media of booklets was statistically effective in increasing the knowledge and attitudes of breastfeeding mothers on exclusive breastfeeding for infants aged 0-6 months in the watershed areas. The use of booklets in breastfeeding education is an effective medium for the counseling of breastfeeding mothers.

Keywords: exclusive breastfeeding, booklet, knowledge, attitude, breastfeeding mothers, watershed

Corresponding Author: Agrina;
email: agrina@lecturer.unri.ac.id

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1. INTRODUCTION

Breast milk is the best nutrition for babies and can affect the child's growth and development. Breast milk contains the vitamins, minerals, protein, carbohydrates, and fats that babies need for their growth and development. Study results have shown that the benefits of exclusive breastfeeding are enormous as the baby's main nutrition (1). The World Health Organization in this case recommends that breast milk be given at least until infants are aged 6 months and can be continued by giving additional food until the baby is two years old (2).

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Although breastfeeding has many benefits, there are still many mothers who do not exclusively breastfeed their babies for various reasons. This phenomenon also occurs in several other countries. Therefore, this problem has attracted the attention of many countries in the world (3). As many as 50% in the world based on WHO in 2018 have not reached the target coverage in breastfeeding in the age range of 0-6 months. The results of the Basic Health Research (Riskesdas) showed that the rate of exclusive breastfeeding for infants aged 0-6 months was 37.3%; this figure has not attained the target of the Ministry of Health which must reach 80% (4). The Riau Provincial Health Office stated that in 2020 46.8% of mothers gave exclusive breastfeeding in Riau Province; similarly, this was also the condition in Kampar Regency, which also had not yet reached the target (5).

The failure of exclusive breastfeeding in mothers, especially in the first six months of a baby's life, is caused by several factors such as age, support from health workers, mother's work, knowledge, attitudes, family support, husband support, and culture (6)(7) argues that there is a significant relationship between exclusive breastfeeding and mother's knowledge and mother's attitude where the majority of mothers have low knowledge. Likewise, the results of research conducted by Wimen (2021) and by Rosmega (2019) (8)(9) also stated that the majority of mothers' knowledge regarding exclusive breastfeeding was low. The higher the mother's knowledge, the more likely she is to give exclusive breastfeeding, and vice versa. Likewise, the greater the mother's opportunity to give exclusive breastfeeding, the better the mother's attitude (10).

Low knowledge is due to low education, lack of information obtained by the mothers, the ability of mothers to understand the information, as well as lack of education from health workers; this affects the mothers' knowledge on exclusive breastfeeding (10). Providing education on exclusive breastfeeding is one of the efforts to increase mothers' knowledge. For the education delivered so that it can be understood by the respondents requires effective and correct media. Booklets are one type of media that can be used when providing education. Research by Faiqoh (2021) (11); Melati., et al (2021)(12); Simanjuntak (2021) (13) showed results that booklets were quite effective in increasing mothers' knowledge.

Much research has been done on increasing knowledge and attitudes of mothers using media, but the use of booklet media to improve knowledge and attitudes on exclusive breastfeeding practices for infants aged 0-6 months in watershed areas is still limited. The purpose of this research is to analyze the effect of using booklets in improving mothers' knowledge and attitudes on exclusive breastfeeding for infants aged 0-6 months in watershed areas in the Kampar area.

2. MATERIALS AND METHODS

The research design used in this research is the quasi experiment with one group pre-test and post-test research design. A total of 34 mothers with babies aged 0-6 months in the working area of the Sawah Health Center, North Kampar District, Kampar Regency were selected as research respondents. The measuring instrument used was a valid and reliable questionnaire. A research ethics permit was obtained, with the number 408/ UN.19.5.1.KEPK.FKp/2022. Respondents were given material about exclusive breastfeeding using booklets. Data were taken before and after being given health education using the booklet for three days. A t-test dependent sample t-test was used as an analysis to test the effectiveness of the use of booklets on the knowledge and attitudes of breastfeeding mothers

3. RESULTS

The study results based on respondent characteristics showed that the majority of mothers did not exclusively breastfeed their babies (67.60%). The range of the mothers' age was 20-35 years (82%), where most were high school graduates (61.8%) and work as housewives (73.5). Table 2 displays the mean of knowledge and attitude that increased.

TABLE 1: Differences in the results of using booklets on the knowledge and attitudes of breastfeeding mothers.

Variable	N	Mean	Std. Deviation	pvalue
Knowledge <i>Pre Post</i>	34	3.91	1.69	0.000
	34	7.76	1.32	
Attitude <i>Pre Post</i>	34	24.26	3.75	0.000
	34	33.91	1.84	

The average increase in knowledge after being given treatment was 3.85 while the increase in attitude was 9.64. The use of booklets on the increase of mother's knowledge and attitudes on exclusive breastfeeding in infants aged 0-6 months is quite statistically significant.

4. DISCUSSION

The practice of giving breast milk to infants in this study was predominantly non-exclusive. Most mothers gave additional food and drinks before the baby is six months

old because the mother feels that their breastmilk is difficult to come out, the milk is not enough, feels the baby is hungry, the baby continues to cry, and even from the advice of parents or in-laws to provide additional food and drinks. Honey, baby formula, bananas, and instant porridge were the types of food given by the mothers to their babies before they were six months old. Baby formula in instant porridge was the type of food most parents gave to their babies. The results of this study indicate that although most respondents were mothers who have had more than one child and were believed to have previous breastfeeding experience, the mothers in this study were more likely to give additional food and drinks to their babies. Mothers with multiparous birth status have a three times greater chance of giving exclusive breast milk than mothers with primiparas (14).

Burhan et al (2017) (15) mention that baby formula is a type of prelacteal food that is widely given in the community. One of the factors of providing additional food before the age of 6 months is the tradition and knowledge of breastfeeding mothers. Based on the results of this study, it was found that mothers who gave non-exclusive breastfeeding had less knowledge than mothers who gave exclusive breastfeeding. Of the 23 non-exclusive breastfeeding respondents, only 5 had sufficient knowledge and 18 had less knowledge. The results of this study are in line with the research of Rohmin et al (2015) (16) who explain that 21% of mothers who give food to their babies having less knowledge about prelacteal food and as many as 9% of families have a tradition of giving prelacteal food to their babies.

On average, there was a significant difference in knowledge in the before and after values, with an increase of 3.85. Meanwhile, attitude increased by 9.64 after the health education by using booklets was carried out. Booklet media is more about increasing knowledge (17). It was found that the use of booklets during health counseling proved to be effective in terms of increasing mother's knowledge regarding the prevention of ARI in toddlers (18). Research by Reinhard 2019 (19) also argue that the knowledge and attitude scores of respondents can be increased by giving booklets about 1000 HPK. This shows that the knowledge and attitudes of respondents can be increased by providing booklets at the time of counseling.

The increase or change in knowledge and attitudes after being given an intervention by using booklets was influenced by age. In this study, the majority of the respondents were in the young age range. A person's activity and motivation can be affected by age. A good age for reproduction is at the age of 20-35 years and most of the lactation abilities that are reversed are assessed from this age. This age range is also considered to have good breastfeeding experience from a young age as well as related knowledge.

The development of comprehension and mindset can be seen from the increase in age, where the higher the age, the better the knowledge (20).

Providing information is increasing knowledge with one strategy, namely behavior change, where awareness will arise in the person and the person will behave according to his knowledge. Health education for breastfeeding mothers is one way of providing information. In terms of providing health education to breastfeeding mothers, methods and media are used, where the method used in counseling is the method of giving booklets. A booklet is printed media that contains information that is reliable, easy to understand, clear and interesting because it uses pictures and its small size makes it easy to carry anywhere (21). According study by Ritznor & Elisabeth (2018)(22), the advantages of booklets are that they are not thick so are easy to carry around everywhere, the information conveyed is clearer, more detailed, and quite easy to understand. Booklets can also be studied repeatedly because they are in the form of books and contain relatively more information than posters. Furthermore, booklets are print media which have lower production costs compared to using visual and audio media. It can be concluded that mothers who get enough information support about breastfeeding will be successful in providing exclusive breastfeeding as a result of research that has been carried out by Agrina, et al in 2021 (23).

5. CONCLUSION

In the practice of breastfeeding in watershed areas, the majority of the respondents in this study were non-EBF breastfeeding mothers. Interventions were given using booklets, which saw an increase in the knowledge and attitudes of breastfeeding mothers. Providing health education by using booklets is statistically effective in increasing breastfeeding mothers' knowledge and attitudes on breast milk. Therefore, booklets can be used as an ideal health education medium for health workers.

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CONFLICT OF INTEREST

There is no conflict of interest for this study.

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