



## The Influence of Breastfeeding Education on the Effectiveness of Breastfeeding in the Bajoe Community Health Center Work Area, Bone Regency

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### Abstract

The effectiveness of the breastfeeding process is defined as an interactive process between mother and baby that results directly in the transfer of milk from the mother's breast to the baby, in a behavior that reflects the fulfillment of the needs of the mother and baby. This research was conducted in the Bajoe Community Health Center, Bone Regency, with a research time design starting from June-September 2020 which aims to determine the effect of breastfeeding education on the effectiveness of postpartum maternal breastfeeding. This research method uses a pre-experimental design approach with one group pre-post test design approach. In this study, before the intervention was given, a pre-test was given which aimed to assess the effectiveness of breastfeeding. After the intervention was given, a post-test was given with a total sample of 46 people. The sampling technique used total sampling. The data analysis used was univariate and bivariate analysis presented in the frequency distribution table. For statistical tests, the level of significance used was  $p < 0.05$ . The analysis used to determine the effect of breastfeeding education on the effectiveness of breastfeeding was a paired statistical test with a nonparametric test, namely the Wilcoxon test. Based on the results of statistical tests, it was found that the  $p$  value was  $0.001 < 0.05$ , which means that there was a significant effect of breastfeeding education on the effectiveness of breastfeeding for postpartum mothers in the working area of the Bajoe Community Health Center, Bone Regency.

## Introduction

Breastfeeding has been shown to offer remarkable advantages to both mothers and infants worldwide, as supported by several studies conducted since 1980 (Hoddinott et al., 2008). Breastfeeding exclusively can lower the risk of death in newborns because breast milk includes antibodies that preserve immunity and fight pathogens in large amounts (Kementerian Kesehatan Republik Indonesia, 2016). Although the World Health Organisation (WHO) recommended breastfeeding exclusively for six months in 2003, breastfeeding rates in developing countries remained low until the 20th century due to the influence of pseudoscience, medical dogma, and massive social promotion of breast milk substitute products (Dykes, 2011).

The Riskesdas study from 2013 demonstrated a pattern in the breastfeeding process for infants 0–23 months old. It is projected that the breastfeeding process takes less than an hour, and it increased from 29.3% in 2010 to 34.5% in 2013. Nonetheless, the propensity for this

breastfeeding style would diminish with the baby's age, peaking at 30.2% in newborns 6 months old, compared to 52.7% in babies 0 months old (Risksedas, 2013).

A variety of policies, such as leave for nursing mothers, breastfeeding rooms in workplaces, policy monitoring and evaluation, sanctions for healthcare providers who distribute and provide formula milk, and optimising the quality of prenatal care, are necessary for exclusive breastfeeding to be successful (Hernández-Cordero et al., 2022; Souza et al., 2023; Hentges & Pilot, 2021).

2013 saw 62.70% of neonates in South Sulawesi Province receive their breast milk exclusively; however, in 2014, that percentage dropped to 56.31%. It was 57.48% in Bone Regency, in contrast. There are 8,330 newborns in the Bone district, and only about 4,788 of them are exclusively breastfed. This means that, in comparison to the Ministry of Health's aim of 80%, the district has not met the minimum threshold (Dinas Kesehatan Provinsi Sulawesi Selatan, 2015).

Mothers give a variety of reasons for quitting breastfeeding, such as worries about not producing enough breast milk, sore, enlarged, or inverted nipples, a baby that won't nurse, swollen breasts, a baby that won't accept the mother's breast, the baby crying, the mother's exhaustion, the baby's weight not appearing to be increasing, and the issue that the breast milk isn't produced in the early postpartum days so that the mother doesn't give the baby any other drink than breast (Kronborg et al., 2015; Lebron et al., 2020).

According to Bourdillon et al. (2020) and Laageide et al. (2021), that one issue that nursing moms frequently deal with is aching nipples. Painful, painful nipples are experienced by around 57.4% of nursing moms; 54.9% of these mothers are primiparous. 95% of occurrences of painful nipples are caused by breastfeeding mothers who do it incorrectly. When a baby is breastfeeding, their mouth just attaches to the nipple and does not cover the full areola, which is an indication of how well the breastfeeding is working, leading to mistakes in breastfeeding technique (Trisanti et al., 2021; Noble & Rosen-Carole, 2022). One more error It might also be brought on by the mother's practices. You get careless when you stop nursing. Many postpartum moms continue to make mistakes when it comes to breastfeeding, namely (Rinata & Iflahah, 2015).

Breast characteristics, such as flat nipples that make it harder for the baby to latch on during the breastfeeding process, can have an impact on breastfeeding technique errors (Wang et al., 2021; Coentro, 2021; Anders et al., 2022). Experience factor: moms who have breastfed their children will know how to nurse them. The knowledge factor the mother's ignorance of good breastfeeding techniques may create the illusion that nursing is a natural procedure, leading any new mother to believe she can nurse her child well without having to acquire the necessary skills (Veile & Miller, 2021). Aside from that, very few healthcare professionals support breastfeeding and offer advice on proper technique. 7. This is consistent with research from Onah et al. (2014) conducted in Nigeria, which showed that a number of factors affect exclusive breastfeeding (Onah et al., 2014).

Effective breastfeeding behaviour is essential for the provision of exclusive breastfeeding. According to Mulder (2006) and Peñacoba & Catala (2019), a mother and baby engage in an interactive process during nursing that immediately results in the transfer of breast milk from the mother's breast to the baby, as well as behaviour that shows the satisfaction of the mother and baby's demands. To achieve this nursing efficacy, it is also crucial to have solid knowledge and comprehension of breast milk and breastfeeding (De Roza et al., 2019; Antonanzas-Baztan et al., 2020). Understanding all of the benefits of breast milk, how to deal with issues that arise while nursing, and using appropriate and effective breastfeeding practices (Azad et al., 2021; Onah et al., 2014).

It is imperative to offer prenatal and postnatal care providers with information regarding appropriate breastfeeding procedures, since multiple studies have demonstrated the efficacy of breast feeding education in enhancing knowledge, attitudes, and internal satisfaction (Andriani & Fiska, 2017). In addition, research by Glaser et al. (2015) demonstrated that favourable views and understanding of breast milk will rise when early information on the beverage is provided (Glaser et al., 2016).

## Methods

Pre-experimental design approach with a one group pre-post test design approach. In this research design, before the intervention is given, a pre-test is given which aims to assess the effectiveness of breastfeeding. After the intervention is given, a post-test will be given (Sugiyono, 2014). The interventions that will be implemented in this study include providing respondents with breastfeeding support and instruction on proper breastfeeding methods through demonstrations. A total of 46 postpartum women from the Bajoe Health Center's working region between June and September 2020 comprised the study's sample. Total sampling is used in the sampling technique.

The purpose of this study's data collection instrument was to assess the effectiveness of breastfeeding using the Unicef Breastfeeding Observation Aid, a tool that measures the process using 31 general assessment items. Other important indicators of a successful breastfeeding process included the baby's position, attachment, and condition, as well as the mother's breasts. excellent and high-quality. A frequency distribution table is the result of the univariate and bivariate data analysis that was performed. The threshold of significance for statistical tests is set at  $p < 0.05$ . A paired statistical test and a non-parametric test, the Wilcoxon test, which measures variations in ability between before and after treatment, are utilised in the analysis to ascertain the impact of breastfeeding education on breastfeeding effectiveness.

## Results and Discussion

Table 1. Frequency Distribution of Respondent Characteristics

No	Characteristics	Frequency (n)	Percentage (%)
1	<b>Age</b>		
	< 20 years	7	15.2
	20-35 years	32	69.6
	> 35 years	7	15.2
2	<b>Parity</b>		
	Primipara	7	15.2
	Multiparous	36	78.3
	Grandemultiparous	3	6.5
3	<b>Education</b>		
	Elementary School	15	32.6
	Junior High School	10	21.7
	Senior High School	13	28.3
	<b>College</b>	8	17.4
4	<b>Work</b>		
	Housewife	22	47.8
	Mother works	24	52.2
5	<b>History of breastfeeding</b>		
	No	16	34.8
	Yes	30	65.2

According to the aforementioned data, of the 46 respondents surveyed, 7 were under the age of 20 (15.2%), 32 were between the ages of 20 and 35 (69.6%), and 7 were above the age of

35 (15.2%). Seven respondents (15.2%) had primiparous parity; 36 respondents (78.3%) had multipara; and 3 respondents (6.5%) had grandemultipara. There were fifteen (32.6%) respondents who had completed elementary school, ten (21.7%) who had completed junior high school, thirteen (283.3%) who had completed high school, and eight (17.4%) who had completed postsecondary education. Twenty-two respondents (47.8%) are housewives, and twenty-four (52.2%) are working mothers. Thirty respondents (65.2%) fit this description; the number of respondents who have never breastfed is as high as sixteen (34.8%).

Table 2. Frequency Distribution of Mother's Breastfeeding Effectiveness

Variable	Effectiveness of Breastfeeding			
	Effective		Ineffective	
	n	%	n	%
Pre-Education	22	47.8	24	52.2
Post Education	34	73.9	12	26.1

According to the above statistics, 24 postpartum moms (47.8%) breastfed ineffectively and 22 (52.2%) postpartum women breastfed well prior to receiving breastfeeding education. Following breastfeeding education, 34 postpartum moms (73.9%) breastfed their babies successfully, while 12 mothers (25.1%) breastfed their babies ineffectively.

Table 3. Effect of Breastfeeding Education on Breastfeeding Effectiveness

Variable		n	Mean	SD	99% Confidence Interval of The Difference		p
					Lower	Upper	
Effectiveness of breastfeeding	Pre-Education	46	25.13	6,220	0,000	0.001	0.001
	Post Education	46	30.50	1,188			

There is a difference in the mean scores of respondents who were educated before and after, as indicated by table 3 above. The respondents' average score increased to 30.50 with a standard deviation of 1.188 in the post-education phase, from an average pre-education score of 25.13 with a standard deviation of 6.220. Additionally,  $p = 0.001 < 0.05$  is the significance value, indicating that there is a difference in the effectiveness of breastfeeding before and after breastfeeding education is provided.

A person's ability is developed through the process of education or upbringing. A procedure known as "health education" is intentionally designed to give people the chance to continuously learn how to raise their awareness and acquire new information and abilities for the sake of their own and others' health (Nursalam & Efendi, 2012).

According to Riordan & Wambach (2010) breastfeeding education is very important (Wambach & Spencer, 2010). The aim of this education is to expand breastfeeding knowledge and assist families in having an enjoyable time with nursing. The accomplishment of three objective domains cognitive, emotive, and psychomotor is a result of quality education. To guarantee that the learning objectives are met, it is necessary to guarantee the accomplishment of these three learning domains. One way to address issues faced by postpartum mothers and achieve breastfeeding efficacy is through education on breastfeeding procedures (Isyti'aroh et al., 2015).

The results of the research indicate that postpartum moms' ability to breastfeed successfully is influenced by their level of breastfeeding instruction. This is evident from the study findings displayed in table 2 above, which indicates that 24 (47.8%) postpartum moms breastfed ineffectively and 22 (52.2%) postpartum mothers successfully breastfed prior to receiving breastfeeding education. Following breastfeeding education, 34 postpartum moms (73.9%) breastfed their babies successfully, while 12 mothers (25.1%) breastfed their babies

ineffectively. Most parts of nursing effectiveness that were not correctly performed by the mother prior to receiving education have been carried out correctly after the mother was educated on good and right breastfeeding procedures. This might be viewed as evidence that the teaching efforts have been successful because most postpartum women now know proper and effective breastfeeding procedures after receiving education (Kehinde et al., 2023).

The results of previous research conducted by Astuti & Surasmi (2016) showed that there was a significant influence between providing breastfeeding education carried out using the demonstration method on the mother's ability to breastfeed (Astuti & Surasmi, 2016). This study complements research by Marshella (2014), who found that most mothers were able to breastfeed successfully after receiving health education on proper techniques. Dr. Soewondo Kendal of RSUD reported that following this intervention, the majority of postpartum mothers were able to breastfeed with increased ability (Marshella, 2010). Another study conducted by Hasyati, et al (2019) stated that mothers who had not received information about IMD had a poor level of knowledge about IMD (Hasyati, 2019).

The results of the research indicate that postpartum moms' ability to breastfeed successfully in the Bajoe District Health Center's service area is influenced by breastfeeding education. Bone, as demonstrated by a value of  $p=0.001$  ( $p<0.05$ ), indicating a noteworthy impact of breastfeeding education on postpartum moms' ability to breastfeed successfully. The findings of this study are consistent with previous research by Munawarah (2018) regarding the influence of breastfeeding technique education on the effectiveness of postpartum mothers in breastfeeding at PKU Muhammadiyah Hospital Yogyakarta with a p-value of  $0.000 < 0.05$  which shows that there is an influence of breastfeeding technique education on effectiveness of breastfeeding (Munawarah, 2018). Similar things were also expressed in research conducted by Jannah (2018) which stated that there was an influence of providing effective breastfeeding education on the effectiveness of breastfeeding for postpartum mothers at the Batua Makassar Community Health Center (Jannah, 2018).

In this study, there were still mothers who did not breastfeed effectively before and after breastfeeding education. The mother and the infant might both have an impact on this in different ways. Blisters on the nipples, fussiness in the baby, the woman not being in a comfortable position when breastfeeding, and the breast not emptying after breastfeeding were all markers of breastfeeding efficacy that were not met, according to the research's observations. One of the things that health professionals, particularly midwives, may do to help postpartum mothers minimise the number of breastfeeding hurdles is to educate them about breast milk and nursing.

## Conclusion

In the research, over 50 percent of the respondents breastfed effectively after providing education about breast milk and breastfeeding, which means it can be concluded that there is significant impact of providing breastfeeding education on the effectiveness of breastfeeding for post partum mothers in the Bajoe Community Health Center Working Area, Bone Regency. It is intended that health professionals, particularly midwives, will educate postpartum moms more about breastfeeding. It is important to start breastfeeding education as early as possible in the pregnancy. It is envisaged that women will take a more active role in spreading awareness about breastfeeding and breast milk, particularly for primigravida mothers who will be better equipped to breastfeed their children when using the proper techniques.

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