

The Relationship between Exclusive Breastfeeding and Stunting Incidents in Toddlers in the Working Area of the UPT Puskesmas Susut I Bangli

Ni Ketut Muniari¹, Ni Gusti Ayu Pramita Aswitami², Putu Mastiningsih³
Stikes Bina Usada Bali
muniariketut@gmail.com

Abstract

Stunting affects the growth and development of the brain. The problem of stunting occurs starting from the womb and will only be seen when the child is two years old. Stunting can be prevented by several things such as exclusive breastfeeding, providing nutritious food according to the needs of the child's body, implementing and getting used to clean living behaviors, and doing physical activity. The purpose of this study was to determine the relationship between exclusive breastfeeding and stunting in toddlers. 24-59 Months in the Working Area of UPT Puskesmas Susut I Bangli. The research conducted was a retrospective analytic research with a cross-sectional study design that emphasized the measurement/observation of independent and dependent variable data only once, at one time. The selection of the sample in this study is using a total sampling technique. The sample of this study were 31 toddlers aged 24-59 months. The results of the analysis using the Fisher's Exact test showed that out of 31 mothers, it was shown that 23 respondents (95.8%) were not given exclusive breastfeeding and 23 respondents (95.8%) were of normal height and 1 respondent (6.2%) were given breast milk. Exclusively with short height 0 respondents (0.0%) and with normal height 7 respondents (100%). The results of the study were declared significant if $p < 0.05$ and not significant if $p > 0.05$ and the statistical test results obtained $p = 0.00 < 0.05$ meaning that there was a relationship between exclusive breastfeeding and the incidence of stunting in toddlers aged 24-59 month in the Working Area of UPT Puskesmas Susut I Bangli. Based on the results of this study, it is hoped that stunting can be prevented by providing exclusive breastfeeding.

Keywords : Exclusive breastfeeding, stunting, toddlers aged 24-59 months

INTRODUCTION

Stunting is a condition of failure to thrive in children under five due to chronic malnutrition, especially in the first 1,000 days of life (HPK). Stunting affects brain growth and development. Stunted children also have a higher risk of suffering from chronic diseases in adulthood (WHO, 2018). The problem of stunting starts from the womb and only becomes visible when the child reaches the age of two years. UNICEF defines stunting as the percentage of children aged 0 to 59 months, with a height below minus two standard deviations (moderate and severe stunting) and below minus three standard deviations (chronic stunting). This is measured from the child growth standards issued by WHO (UNICEF, 2017).

According to the Child stunting data visualizations dashboard, WHO, Indonesia is included in the third country with the highest prevalence in the South-East Asia Regional (SEAR). The average prevalence of stunted toddlers in Indonesia in 2005-2017 was 36.4%, below first place Timor Leste at 50.2% and second place India at 38.4% (Indonesian Ministry of Health, 2018).

The stunting rate in Bali in 2013 reached 32.6%. Then in 2015 the stunting rate fell to 20.7%, and in 2016 it fell again to 19.7%. In the following year, 2017, the stunting rate was improved to 19.1%. It's just that in 2018 there was a slight increase to 19,8% and increased again to 21.9% in 2019, which of course still exceeds the WHO target of 20% (Darmawan, 2019).

The percentage coverage of babies 0-6 months receiving exclusive breastfeeding in Bali Province in 2017 was 73.7%. However, in 2017, the percentage of coverage for babies 0-6 months

who received exclusive breastfeeding decreased drastically to 31.57%. Of course, with this decrease, the percentage of coverage for babies 0-6 months who received exclusive breastfeeding has not yet reached the 2017 Strategic Plan target of 44%. (Indonesian Ministry of Health, 2018)

Based on Riskesdas 2018, the proportion of very short toddlers in Indonesia is 11.5% and the proportion of short toddlers is 19.3%. The prevalence of stunting in Bali Province in 2018 was 21.7%. This requires cross-program and cross-sector participation in efforts to reduce stunting in Bali Province (Indonesian Ministry of Health, 2018). The incidence of stunting in Bangli Regency is 19.8% of toddlers whose height is measured (Bangli Health Office, 2020)

Stunting can be prevented by several things, such as providing exclusive breastfeeding, providing nutritious food that suits the child's body needs, implementing and getting used to clean living behavior, doing physical activity, balancing energy expenditure and nutrient intake into the body, and monitoring the child's growth and development. regularly (Millennium Challenge Account Indonesia, 2017).

Research conducted by Siagian and Herlina, (2018) states that mothers who do not give exclusive breast milk are 5.23 times more likely to have stunted baby development compared to mothers who give exclusive breast milk. Researchers conducted a preliminary study considering that the stunting rate is still high in Bali, especially in Bangli Regency, which is 19.8% and at the Susut I Community Health Center there are 31 toddlers aged 24-59 months. Susut I Community Health Center has 929 toddlers aged (24-59 months), of which 704 are toddlers with no stunting, 194 people at risk of stunting, and 31 people with stunting. From interviews with 7 mothers who had children aged 24-59 months at the posyandu, 2 people said their children were shorter than their peers, 3 people said their children were short and thinner than their peers and 2 people said their children had normal growth and development according to the graph in KIA book and out of 7 mothers 5 mothers said they had not given exclusive breast milk for 6 months.

So researchers are interested in conducting research on the relationship between exclusive breastfeeding and the incidence of stunting in

toddlers aged 24-59 months in the UPT work area of the Bangli I Susut Health Center.

METHOD

The research carried out was a retrospective analytical study with a cross sectional study design. The population in this study was all 31 stunted toddlers. The sampling technique used was total sampling. The sample in this study was 31 stunted toddlers in the UPT Puskesmas Susut I Bangli Working Area.

The instruments used in this research were questionnaires, TB measuring instruments (microtoise), BB (scales). The questionnaire in this study contains the identity of the respondent, characteristics of the sample/toddlers, and the exclusive breastfeeding behavior questionnaire contains statements to identify exclusive breastfeeding to toddlers. Data were analyzed univariately using the Statistical Package for Social Science (SPSS) program. The statistical test used is the Fisher's Exact test.

Results and Discussion

RESULTS

a. Characteristics of Respondents Based on Exclusive Breastfeeding

Table 1. Distribution of respondents based on exclusive breastfeeding

No	Breastfeeding	F	%
1	No	24	77,4
2	Yes	7	22,6
	Total	31	100,0

Source: primary data, 2023

Based on table 1, it can be seen that the characteristics of respondents based on Exclusive Breastfeeding show that the majority do not provide exclusive breastfeeding as many as 24 respondents with a percentage (77.4%) while respondents who provide exclusive

breastfeeding are 7 respondents with a percentage (22.6%).

a. Characteristics of Respondents Based on Body Height

Table 2. Distribution of Respondents Based on Body Height

No	Height	F	%
1	Short	7	22,6
2	Very Short	24	77,4
Total		31	100,0

Source: primary data, 2023

Based on table 2, it can be seen that the characteristics of respondents based on height show that the majority of respondents are very short, namely 24 respondents (77.4%) and respondents with short height, namely 7 respondents (22.6%).

The relationship between exclusive breastfeeding and the incidence of stunting among toddlers in the UPT working area of Susut I Bangli Health Center Table 3. Relationship between exclusive breastfeeding and the incidence of stunting among children under five in the UPT work area Puskesmas Susut I Bangli

Pemberian ASI Eksklusif	Tinggi Badan				Total		p- value
	Pendek		Sangat pendek				
	f	%	f	%	f	%	
Tidak	5	17,2	24	82,8	29	93,5	0,04
Ya	2	100	0	0,0	2	6,5	
Jumlah	7	22,6	24	77,4	31	100	

Based on table 5.3, the results of the analysis using the Fisher's Exact test show that mothers who do not give exclusive breast milk are known to have toddlers with very short height who are taller (93.5%) than mothers who give exclusive breast milk (6.5%). From the statistical test results, it was found that the p value = 0.04 <0.05, meaning that there is a relationship between exclusive breastfeeding and the incidence of stunting in toddlers aged 24-59 months in the UPT Working Area of the Bangli I Susut

Health Center and it is significant.

DISCUSSION

1. Characteristics of respondents based on exclusive breastfeeding

Based on research that has been carried out, it was found that the characteristics of respondents based on Exclusive Breastfeeding showed that the majority did not provide exclusive breastfeeding, 24 respondents with a percentage (77.4%) while 7 respondents gave exclusive breastfeeding with a percentage (22.6%). The results obtained showed that there were more mothers who did not give exclusive breast milk (77.4%) which resulted in stunting, compared to mothers who gave exclusive breast milk, the incidence of stunting was lower (22.6%).

Exclusive breastfeeding is breast milk given to babies from birth for six months without adding and/or replacing it with other foods or drinks. The current nutritional situation of toddlers in the world is 155 million stunted toddlers, 52 million wasted toddlers and 41 million overweight toddlers (Ministry of Health of the Republic of Indonesia, 2018).

Exclusive breastfeeding is recommended for a period of at least 4 months, but optimal breastfeeding is up to 6 months. The introduction of fluids or foods other than breast milk, especially before 4 months of age, is associated with an increased risk of gastrointestinal diseases, which can result in growth retardation, micronutrient deficiencies and susceptibility to various infectious diseases in the first 2 years of life (Mastiningsih and Agustina, 2019).

The research results obtained are in accordance with the theory of Louis et al., (2022) and this shows that there is a relationship between exclusive breastfeeding and the incidence of stunting in toddlers. Meanwhile, in the odds ratio test, the value OR = 61 was obtained, which means that toddlers who were not given exclusive breast milk were 61 times more likely to experience stunting than toddlers who were given exclusive breast milk. Exclusive breastfeeding can reduce the risk of stunting.

1. Characteristics of Respondents Based on Body Height

Based on the research that has been carried out, it can be seen that the characteristics of respondents based on height show that the majority of respondents are very short, namely 24 respondents (77.4%) and respondents with short height, namely 7 respondents (22.6%). after birth is a reflection of inappropriate exclusive breastfeeding and also causes stunting. Efforts to reduce the incidence of stunting are by optimizing exclusive breastfeeding for 6 months, because appropriate and optimal exclusive breastfeeding for 6 months can provide protection against gastrointestinal infections which can cause nutritional depletion.

Stunting (dwarf) is a condition where a toddler has less length or height compared to age. This condition is measured by body length or height that is more than minus two standard deviations from the median child growth standard from WHO (WHO, 2018).

Based on research that has been carried out. According to the results of research conducted by (Woldehanna et al., 2018), the effect of stunting on the cognitive development of toddlers in Ethiopia in 2017, states that stunting has a real negative effect on the cognitive development of toddlers. The main causes of stunting begin in the womb and manifest at 2-3 years of age, and include intrauterine growth retardation and malnutrition, often combined with frequent infections such as diarrhea. Other predictors of stunting include suboptimal breastfeeding and complementary feeding practices, low birth weight, child neglect or negative parent/child interactions, and low maternal education (Huey and Mehta, 2019).

2. The Relationship between Exclusive Breastfeeding and Stunting Incidents in Toddlers Aged 24-59 Months in the Working Area of the UPT Puskesmas Susut I Bangli

The results of the analysis using the Fisher's Exact test showed that mothers who did not give exclusive breast milk were known to have toddlers with very short height (93.5%) compared to mothers who

gave exclusive breast milk (6.5%). From the statistical test results, it was found that the p value = 0.04 <0.05, meaning that there is a relationship between exclusive breastfeeding and the incidence of stunting in toddlers aged 24-59 months in the UPT Working Area of the Bangli I Susut Health Center and it is significant.

According to Louis et al., (2022) Toddlers who are not given exclusive breast milk are 61 times more likely to experience stunting than toddlers who are given exclusive breast milk. Exclusive breastfeeding can reduce the risk of stunting. Stunting is a problem of chronic malnutrition caused by insufficient nutritional intake over a long period of time due to the provision of food that is not in accordance with nutritional needs.

Stunted toddlers are a chronic nutritional problem caused by many factors such as socio-economic conditions, maternal nutrition during pregnancy, pain in babies, and lack of nutritional intake in babies. Stunted toddlers in the future will experience difficulties in achieving optimal physical and cognitive development (Ministry of Health of the Republic of Indonesia, 2018).

This research is in line with research conducted by Lestari et al., (2019) which found that there was a significant relationship between non-exclusive breastfeeding and stunting and breastfeeding could be a protective factor against stunting in toddlers. In the research discussion it was also stated in a study in 2010 in Banda Aceh also reported that stunting in toddlers was associated with non-exclusive breastfeeding, with the risk of stunting 5 times higher than toddlers who had received exclusive breastfeeding.

CONCLUSIONS AND RECOMMENDATIONS

CONCLUSION

There is a relationship between exclusive breastfeeding and the incidence of stunting in toddlers aged 24-59 months in the Working Area of the UPT Puskesmas Susut I Bangli and it is significant.

SUGGESTION

The researcher hopes that this research can become a reference for future researchers who will conduct related research by paying attention to other factors that have not been examined in this research.

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