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Overview of Mothers' Knowledge on Infant and Young Child Feeding (IYCF) Among Stunted Toddlers in Tatui Village

Harnianti¹, Dedy Arisjulyanto^{1*}, Lindawati², Ardhanari Hendra Kusuma³

¹Universitas Karya Persada Muna ^{1,2,3}Poltekkes Kemenkes Jayapura

Addres: Padang Bulan II Street, Heram District, Jayapura City, Papua, Indonesia Corresponding: dedvarisjulyanto@gmail.com

Abstract. Malnutrition remains one of the leading causes of child morbidity and mortality, particularly during the first five years of life. Inappropriate infant and young child feeding (IYCF) practices contribute significantly to the high prevalence of stunting in Indonesia. This study aimed to describe the knowledge of mothers of stunted toddlers regarding IYCF in Tatui Village, working area of Kosiwo Public Health Center, Yapen Islands Regency. The study employed a quantitative descriptive design with a cross-sectional approach. The population consisted of 45 mothers of stunted toddlers, selected using a total sampling technique. Data were collected using a structured questionnaire developed based on WHO and Ministry of Health guidelines. The results showed that most respondents had low knowledge about IYCF before the educational intervention but demonstrated a substantial improvement afterward. The findings indicate that nutrition education plays a crucial role in enhancing mothers' understanding of appropriate feeding practices, including exclusive breastfeeding, complementary feeding, and balanced nutrition. Strengthening community-based nutrition education programs is essential to empower mothers and support stunting prevention efforts in Yapen Islands Regency.

Keywords: Infant and Young Child Feeding, Knowledge, Education, Stunting, Mothers

1. INTRODUCTION

Malnutrition is one of the leading causes of child mortality, particularly within the first five years of life. Factors such as poverty, low education levels, natural disasters, and limited access to healthcare services are the root causes of this issue. Protein-energy deficiency generally appears in children aged 6 months to 2 years, often due to early weaning, delayed introduction of complementary foods, inadequate protein intake, and severe infections (Trisnawati & Sulistyowati, 2021; Lailia et al., 2021).

According to data from the Central Statistics Agency (BPS, 2019), the prevalence of undernourished children aged 0–59 months in Indonesia reached 17.70%. In the Bangka Belitung Islands Province, the percentage of undernourished children increased from 13.24% in 2016 to 17% in 2018 (Trijuliana et al., 2020). In Papua Province, the prevalence of stunting also rose by 5.1% in 2022. The Indonesian Nutritional Status Survey (SSGI) reported that the prevalence of stunted children in Papua reached 34.6%, the third highest nationally, while in Yapen Islands Regency it was 31.1%, still higher than the national average (Widiyanti et al., 2021).

The Yapen Islands Regency Government has implemented eight integrated actions in its stunting reduction program. However, these efforts have not yet produced significant results, as shown by the relatively small decline in stunting rates 4.62% in 2021 and 3% in 2022 with Kosiwo District identified as one of the areas with the highest prevalence at 25% (Yapen Islands Health Office, 2022). Current programs tend to focus on providing nutritional aid for families with stunted children but have not effectively improved mothers' knowledge regarding Infant and Young Child Feeding (IYCF) practices.

Maternal knowledge of IYCF is crucial as it directly influences exclusive breastfeeding practices, the timely introduction of complementary feeding, and the adequacy of children's nutritional intake. Low maternal knowledge may result in feeding practices that do not meet children's nutritional needs, ultimately contributing to stunting. Therefore, improving maternal knowledge through nutrition education is a key strategy in stunting prevention and management efforts in Yapen Islands Regency. Based on this context, this study aims to describe the knowledge of mothers with stunted children regarding Infant and Young Child Feeding (IYCF) in Tatui Village, as a foundation for strengthening community nutrition intervention programs within the working area of Kosiwo Health Center

2. METHODE

This study employed a quantitative descriptive design with a cross-sectional approach. The research aimed to describe the level of knowledge among mothers of stunted toddlers regarding Infant and Young Child Feeding (IYCF) practices in Tatui Village, working area of Kosiwo Public Health Center, Yapen Islands Regency. The population in this study consisted of all mothers with stunted toddlers in Tatui Village, within the working area of Kosiwo Public Health Center, totaling 45 respondents. The sampling technique used was total sampling, in which the entire population was included as the study sample, resulting in 45 participants. The research instrument used was an IYCF knowledge questionnaire developed based on guidelines from the World Health Organization (WHO) and the Indonesian Ministry of Health. The questionnaire covered aspects such as exclusive breastfeeding, the introduction of complementary feeding, feeding frequency, and dietary diversity and adequacy. The collected data were analyzed using univariate analysis to describe the frequency distribution and percentage of respondents' knowledge levels. The data analysis process included several stages: editing, coding, scoring, and tabulating. The results were then presented in tables and narrative form to illustrate the level of maternal knowledge regarding IYCF practices

3. RESULT AND DISCUSSION

a. Result

1) Respondent Characteristics

The characteristics of respondents in this study are presented in the following table:

Table 1. Respondent Characteristics

Variable	n	%
Child's Gender		
Male	17	37.8
Female	28	62.2
Mother's Education Level		
No formal education	4	8.9
Elementary school	14	31.1
Junior high school	4	8.9
Senior high school	23	51.1
Mother's Age (years)		
17–25	12	26.7
26–35	22	48.9
36–45	11	24.4

Based on the data in Table 1, most of the children were female (62.2%), while male children accounted for 37.8%. The majority of mothers had a senior high school education (51.1%), followed by elementary school (31.1%), junior high school (8.9%), and no formal education (8.9%).

2) Mothers' Knowledge of Infant and Young Child Feeding (IYCF)

The distribution of mothers' knowledge levels on Infant and Young Child Feeding before and after the intervention is shown in the following table:

Table 2. Mothers' Knowledge of Infant and Young Child Feeding

Knowledge Level	Pretest		Posttest	
	N	%	n	%
Good	-	-	37	82.2
Fair	4	8.9	8	17.8
Poor	41	91.1	-	-

Based on Table 2, prior to the intervention, most mothers had poor knowledge of Infant and Young Child Feeding (91.1%). After the intervention, there was a significant improvement, with 82.2% of mothers demonstrating good knowledge and 17.8% showing a fair level of knowledge.

b. Discussion

Based on the analysis results, the average knowledge score of mothers regarding Infant and Young Child Feeding (IYCF) before the educational intervention was 12.89, and it increased to 24.00 after the intervention. The statistical test showed a p-value of 0.000 (<0.05), indicating a significant effect of education on improving mothers' knowledge about IYCF. This finding demonstrates that the educational intervention effectively enhanced mothers' understanding of appropriate feeding practices for infants and young children.

This result is consistent with the study by Arisjulyanto and Puspita (2024), which found that education on IYCF significantly improved mothers' knowledge about nutritional status and feeding practices for stunted children. Mothers with better knowledge tend to provide adequate nutrition and maintain healthy feeding patterns because knowledge directly shapes positive attitudes and behaviors.

Education on IYCF plays a crucial role in increasing maternal knowledge about nutrition and stunting prevention. Several studies have confirmed that IYCF education improves mothers' comprehension of infant nutrition, which is essential to prevent stunting (Idawati et al., 2023; Mustajab & Resmi, 2023). Health education aims to transfer knowledge from educators to participants to modify behaviors and habits that are inconsistent with healthy practices in this context, promoting proper feeding to prevent stunting in toddlers (Mustajab & Resmi, 2023).

According to Rahmanindar et al. (2020), effective IYCF education can lead to better dietary practices and reduce stunting prevalence among children. For instance, the *Pawon* Simbok program showed that practical cooking demonstrations could enhance mothers' breastfeeding and complementary feeding practices. Similarly, Sukmawati et al. (2021) emphasized that continuous education and monitoring during pregnancy can significantly decrease childhood stunting rates, highlighting the importance of maternal nutrition education.

Stunting remains a major nutritional problem in Indonesia, characterized by growth failure and height-for-age below the standard. One of its main causes is inadequate nutrient intake during the first 1,000 days of life. Proper IYCF practices play a vital role in stunting prevention; however, limited maternal knowledge often hinders appropriate feeding behaviors. Structured and continuous education can significantly enhance mothers' understanding and skills in providing balanced and nutritious meals for their children. A study by Hikmah and Sunarsih (2024) found that nutrition counseling and practical training effectively improved mothers' knowledge of IYCF and reduced stunting prevalence, even though it did not directly affect underweight outcomes (Dewi & Aminah, 2016).

Moreover, education helps mothers understand the importance of food variety, meal frequency, and micronutrient intake. With better knowledge, mothers become more aware of and committed to applying appropriate feeding practices, ultimately improving children's nutritional status and preventing stunting. Educational interventions that incorporate demonstration and hands-on practice have also been shown to effectively enhance maternal knowledge of food preparation, quantity, and nutrient adequacy (Kumala & Sianipar, 2019).

In conclusion, effective education on Infant and Young Child Feeding substantially improves maternal knowledge, influences feeding behavior, and contributes to stunting prevention. Therefore, nutrition education programs should be integrated into community-based stunting prevention strategies, particularly in regions with high stunting prevalence such as Yapen Islands Regency

4. CONCLUSION

This study found that educational interventions play an important role in increasing mothers' knowledge about Infant and Young Child Feeding (IYCF). Improved understanding enables mothers to apply appropriate feeding practices, such as proper breastfeeding, timely introduction of complementary foods, and adequate nutritional intake, which are essential to prevent stunting among children under five. Strengthening maternal knowledge through continuous and structured nutrition education should be integrated into community health programs to promote better child nutrition and reduce stunting prevalence, particularly in Yapen Islands Regency.

REFERENCES

Arisjulyanto, D., & Puspita, N. I. (2024). Pengaruh Pemberdayaan PMBA Terhadap Sikap Keluarga Balita Stunting Di Kabupaten Lombok Tengah. *Jurnal Kesehatan Tropis Indonesia*, 1(4).

Badan Pusat Statistik. (2019). Data Balita Gizi Kurang.

- Dewi, M., & Aminah, M. (2016). Pengaruh Edukasi Gizi terhadap Feeding Practice Ibu Balita Stunting Usia 6-24 Bulan. Indonesian Journal of Human Nutrition, 3(1), 42-53. www.iihn.ub.ac.id
- Dinas Kesehatan Kepulauan Yapen. (2022). Data Stunting Kabupaten Kepulauan Yapen.
- Hikmah, F. N., & Sunarsih, T. (2024). Pengaruh Pendidikan Kesehatan terhadap Pengetahuan dan Sikap Ibu tentang Pemberian Makan Bayi dan Anak Stunting. Oksitosin: Jurnal Ilmiah Kebidanan, 11(2), 130–141.
- Idawati, I., Rosmawardiani, R., Ummi Salamah, Nasriah, N., & Dian Rahayu. (2023). Pemberian Makan Bayi dan Anak (PMBA) dengan Kejadian Stunting. SEHATMAS: Jurnal Ilmiah Kesehatan Masyarakat, 2(3), 651–660. https://doi.org/10.55123/sehatmas.v2i3.2054
- Kumala, D., & Sianipar, S. S. (2019). Pengaruh Pemberian Makanan Bayi Dan Anak (PMBA) Sesuai Tahapan Pada Balita Usia 0–24 Bulan Dalam Upaya Penurunan Risiko Stunting Pada 1000 Hari Pertama Kehidupan Di Posyandu Wilayah Kerja Puskesmas Kereng Bangkirai Kota Palangka Raya Kalimantan Tengah. Dinamika Kesehatan Jurnal Keperawatan, Kebidanan Dan 10(2),https://doi.org/10.33859/dksm.v10i2.499
- Lailia, I., Kismartini, & Rahman, A. Z. (2021). Peran Stakeholders dalam Implementasi Kebijakan Intervensi Gizi Sensitif di Kota Semarang. Journal of Public Policy, 3, 103-111.
- Mustajab, A. A., & Resmi, D. C. (2023). Pengaruh Pendidikan Kesehatan Pemberian Makanan Bergizi untuk Pencegahan Bayi dan Balita Stunting terhadap Pengetahuan Ibu. MANUJU: Malahayati Nursing Journal, 5(10), 3338–3346.
- Nursalam. (2021). Metodologi Penelitian (1st ed.). Gramedia.
- Rahmanindar, N., Nisa, J., & Qudriani, M. (2020). Pembuatan Makanan Bayi dan Anak (PMBA) Melalui Program Pawon Simbok untuk Mencegah Stunting di Puskesmas Kramat. JPM: Jurnal Pengabdian Masyarakat, 1(2), 46-47.
- Sukmawati, S., Hermayanti, Y., Fadlyana, E., & Mediani, H. S. (2021). Stunting Prevention with Education and Nutrition in Pregnant Women: A Review of Literature. Open Access Macedonian Journal of Medical Sciences. 9(T6), 12-19.https://doi.org/10.3889/oamjms.2021.7314
- Trijuliana, D., Rizki, M. F., & Argenti, G. (2020). Komitmen Politik: Penegakan Hukum & Keberlanjutan Usaha Pemerintah Kota Tasikmalaya dalam Upaya Menurunkan Angka Stunting. *Journal of Government and Political Studies*, 3(2).
- Trisnawati, Y., & Sulistyowati, N. (2021). Status Gizi dan Karakteristik yang Berhubungan dengan Malnutrisi pada Balita di Posyandu Saliara Kota Tanjungpinang. Seminar Nasional Syedza Saintika, 1(1).
- Widiyanti, H., Saimi, & Khalik, L. A. (2021). Pengaruh Pemberdayaan PMBA terhadap Kesadaran Kritis Keluarga Balita Stunting di Kabupaten Lombok Tengah. Jurnal Keperawatan, 13(3), 625-636.
- Wulandari, R. C., & Muniroh, L. (2020). Correlation between Adequacy Levels of Nutrition, Mother's Knowledge Level, and Height of Parents with the Incidence of Stunting in Toddlers at Puskesmas Tambak Wedi Surabaya. Amerta Nutrition, 4(2), 95-102. https://doi.org/10.20473/amnt
- Rahayu, A., Suryani, N., & Widyaningsih, W. (2022). Pengaruh Edukasi Gizi terhadap Pengetahuan Ibu tentang Pemberian Makanan Bayi dan Anak (PMBA) pada Balita Stunting. Jurnal Gizi dan Pangan, 17(3), 180–189.
- Ministry of Health Republic of Indonesia. (2021). Pedoman Pemberian Makanan Bayi dan Anak untuk Mencegah Stunting. Jakarta: Ministry of Health RI.

- UNICEF. (2020). Improving Infant and Young Child Feeding Practices to Prevent Stunting: A Guide for Program Action. New York: UNICEF.
- WHO. (2018). Complementary Feeding: Report of the Global Consultation. Geneva: World Health Organization.