PREVENTING STUNTING IN INFANTS AND TODDLERS MATTERS

Dyah Woro Kartiko Kusumo Wardani ¹, Agustina Ida Pratiwi ^{2*}, Yetty Irawan ³, Dewi Novitasari Suhaid ⁴, Eviyani Margaretha Manungkalit ⁵, Margaretha Kusmiyanti ⁶

STIK Sint Carolus,

Jl. Salemba Raya No. 41 Jakarta Pusat

¹ <u>dyahworo0@gmail.com</u>, ^{2*} <u>agustinap56@gmail.com</u>, ³ <u>yettyirawan@gmail.com</u>, ⁴ dewinovitasarisuhaid@gmail.com, ⁵ evikalit@gmail.com, ⁶ margarethakusmiyanti@yahoo.com

Abstract

Stunting or short stature is defined as a condition where the length or height has a z-score below -2SD based on growth standards, depending on age. Stunting can also be interpreted as a condition of children under the age of five who, due to chronic malnutrition (since the womb and in the first days after birth), develop stunted growth that does not appear until the age of 2 years. The most critical intervention to reduce stunt prevalence occurs in the first 1000 days of life in children under the age of five or before the age of 2, as children aged 2 to 3 experience a slowdown in growth and catch up with children's Growth opportunities at this age are lower than children aged 6 to 24 months. The prevalence of stunting is 19.7% in Central Jakarta, second only to North Jakarta. One of the actions that can be taken to prevent stunting is to provide information and education to mothers at Posyandu Dahlia in Paseban on the definition of stunting, effects, dangers, and how to prevent and correct stunting in children under the age of 2. With increasing knowledge one hopes to be able to prevent stunting. From the results of the pre- and post-tests conducted on 45 participants, there was an 83% increase in knowledge. This demonstrates that this health promotion intervention has succeeded in expanding knowledge and providing participants with knowledge benefits related to stunting.

Keywords: Children's Growth, Posyandu, Stunting.

INTRODUCTION

Stunting or short stature is defined as a condition in which the length or height has a z-score below -2 SD based on WHO growth standards, depending on age. This occurs in children aged 0 to 5 years. Stunting can also be interpreted as a condition of children under the age of five who, due to chronic malnutrition (since the womb and the first few days after birth), experience stunted growth that does not appear until the age of 2 years (Kementerian Kesehatan RI, 2016; Kementrian Kesehatan Republik Indonesia, 2019). Stunting can be caused by chronic malnutrition in children, so length/height may take a long time to recover depending on age (Gibney MJ, Margetts BM, Kaerney JM, 2009).

WHO data from 2018 shows that 149 million (21.9%) children under the age of five suffer from stunting worldwide and 55% of them occur in Asia. Of all parts of the Asian continent, Southeast Asia ranks first in the incidence of stunting (57.9%). Indonesia is one of the countries

that count among the countries of the Southeast Asian continent. Of several countries in Southeast Asia, Indonesia has the second highest prevalence of stunting after Cambodia. The Riskesdas 2018 recorded a decrease in the incidence of stunting since 2013 (47.2%) to 30.8% in 2018 or about 9 million babies and 29.9% occurred in children under 2 years (Kementerian Kesehatan Republik Indonesia, 2019; Kementerian Koordinator Bidan Pembangunan Manusia dan Kebudayaan, 2018; Kementrian Kesehatan, 2019; Tim Riskesdas 2018, 2019; Unicef/WHO/The World Bank, 2019). The prevalence of stunting that occurred in Indonesia in 2019 was 27.6%, and the prevalence of stunting in DKI Jakarta was 19.9% (Kementerian Kesehatan Indonesia, 2021). The stunting problem in DKI Jakarta continues to increase by 2.2%, with the stunting rate was 17.7% in 2018 (Kementerian Kesehatan Republik Indonesia, 2018).

Stunting disorders can impair brain development, resulting in impaired cognitive and motor development, creating a generation that is less competitive and disrupting the metabolic system, putting people at risk of diseases such as obesity, stroke, diabetes and heart disease. In Indonesia, stunting is a major problem as it affects the country's economy and increases poverty, resulting in losses of up to 3% per year.

Indonesia and several ASEAN countries have launched the SDGs program, the second goal of which focuses on overcoming hunger and poverty, which are closely linked to stunting. The SDGs aim to eliminate malnutrition and meet the nutritional needs of pregnant and breastfeeding women by 2030, thereby reducing the incidence of stunting. The Department of Health concluded in 2019 that diet-related interventions have been shown to be effective in achieving up to 70% success in improving community nutrition, particularly in reducing the incidence of stunting (Tim Riskesdas 2018, 2019).

The most crucial intervention to reduce the prevalence of stunting occurs in the first 1000 days of life for children under the age of five or before their second year of life, i.e. after the age of two (TNP2K, 2017). Research by Kusumas in 2013 concluded that children's growth slowed between the ages of 2 and 3, so the process of catching up with growth at that age had less chance than in children aged 6 to 24 months (Kusuma, 2013).

The coronavirus is a type of virus that causes symptoms ranging from a common cold (common cold) to more complex illnesses such as SARS-CoV (Severe Acute Respiratory Syndrome) which emerged in China in 2003 and MERS-CoV (Middle East Respiratory Syndrome), which occurred in China in 2003, occurred in Saudi Arabia in 2012 (WHO, 2020). Covid-19 caused 15.6% of workers in Indonesia to be laid off, even 13.8% did not receive severance pay, affecting the ability to eat adequately, especially in pregnant women and young children who are in the first 1000 days of life At that time, the growth factor was growing rapidly and required adequate nutrition to achieve maximum growth. Given the huge impact of stunting in Indonesia, it is important to have knowledge of stunting as a basis for stunting prevention.

IMPLEMENTATION METHOD

The method used in this community service is counseling. The guidance material provided was in the form of stunting in infants under five and ways for parents to identify and prevent stunting in infants under five using PowerPoint media with pictures and discussions to improve understanding. The first phase of the activity carried out consisted in assessing the

knowledge of advising participants on the subject of stunting using a questionnaire (pre-test). The next step is to educate about the prevalence of stunting and get counseling on how to identify and prevent stunting. In addition, the civil service team provides case studies and possible solutions. At the end of the activity, participants completed the same questionnaire as in the pre-test to measure participants' knowledge gains.

RESULTS AND DISCUSSION

Community Service activities run smoothly. Community Service Activities will be held on Friday, January 20, 2023 at 09.00 WIB. The counseling participants were 45 women who came to Posyandu Dahlia in Paseban.

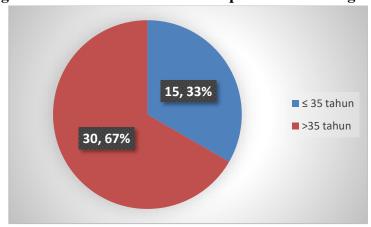


Diagram 1. Characteristics of Participants Based on Age

There were 45 participants who came to Posyandu Dahlia whose ages ranged from 40-80 years with the majority aged 50 years (50%). This age is categorized as the elderly which shows that the participants who come to the posyandu are the grandmothers of their grandchildren.

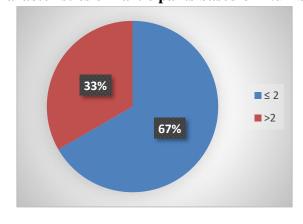


Diagram 2. Characteristics of Participants based on Number of Children

The age of the last child of the participants who came to Posyandu RW 7 was between 2 and 6 years. And the majority are 4 years old.

Before the activity started the participants were asked to fill out a pre-test questionnaire of 15 questions for 10 minutes with a questionnaire sheet. The counseling with the theme "Preventing Stunting in Infants and Toddlers Matters" was opened with the MC from STIK Sint Carolus students with enthusiastic applause.



Figure 1. Pretest activity

After that, the activity began with the delivery of material about stunting in toddlers. The material is equipped with interesting illustrations as well as questions and answers and discussions so that participants understand more about the material presented about stunting and how to detect it.

After that the second material themed How parents detect and prevent stunting in babies under five was delivered by the speaker. In the presentation the participants looked enthusiastic because it was accompanied by examples and pictures.



Figure 2. Provision of stunting counseling materials

The activities are carried out offline so that the consultation is conducive and interactive. The questions asked by the participants also varied, including: When a child is late, is that called stunting? What to do if the child has difficulty walking? If a normal child is suddenly paralyzed

and unable to walk, what is growth retardation? The questions asked can be answered well by the moderator and the mother understands the answers well. During the session, all participants were enthusiastic.



Figure 3. Discussion with counseling participants

At the end of the MC activity, the guide distributed gifts to mothers who could ask questions and answer questions from the moderators on the definition of stunting and the consequences of stunting. After the question-and-answer session, participants were guided to take the post-knowledge measurement test after a 10-minute consultation with a total of 15 questions. All participants were able to complete the post-test well.

From the evaluation results of the 45 participants who completed the post-test, it was found that the participants' knowledge increased after they were given information on how parents can recognize and prevent stunting, so this advice can increase the participants' knowledge about infants and the health of young children, particularly in relation to growth retardation.

CONCLUSION

The charitable activity with the theme "Preventing Stunting in Infants and Toddlers Matters" at Dahlia Posyandu went smoothly and well. The counseling participants are parents or caregivers who bring babies and toddlers to visit Posyandu. Comprehensive counseling material is available that addresses the prevalence of infant and young child stunting and ways for parents to prevent infant and young child stunting. The increased knowledge of the counseling participants is reflected in an 86% increase in the evaluation results of the participants.

REFERENCES

- Gibney MJ, Margetts BM, Kaerney JM, A. L. (2009). *Gizi kesehatan masyarakat*. Penerbit Buku Kedokteran EGC.
- Kementerian Kesehatan Indonesia. (2021). Buku saku Hasil Studi Status Gizi Indonesia (SSGI) Tingkat Nasional, Provinsi, dan Kabupaten/Kota Tahun 2021. In *SSGI*.
- Kementerian Kesehatan Republik Indonesia. (2018). Profil Kesehatan indonesia 2018.
- Kementerian Kesehatan Republik Indonesia. (2019). Riskesdas 2018.
- Kementerian Kesehatan RI. (2016). Situasi balita pendek. In *Info Datin* (pp. 2442–7659). https://doi.org/ISSN 2442-7659
- Kementerian Koordinator Bidan Pembangunan Manusia dan Kebudayaan. (2018). *Strategi Nasional Percepatan Pencegahan Anak Kerdil (Stunting)*. www.wapresri.go.id
- Kementrian Kesehatan, R. (2019). Warta-Kesmas-Edisi-1-2019_1357.pdf.
- Kementrian Kesehatan Republik Indonesia. (2019). Wartakesmas; Gizi seimbang, Prestasi Gemilang.
- Kusuma, K. eka dan N. (2013). Faktor Risiko Kejadian Stunting Pada Anak Usia 2-3 Tahun (Studi Di Kecamatan Semarang Timur). *Journal Of Nutrition College*, 2(4), 523–530. https://doi.org/10.1111/1467-9868.00143
- Tim Riskesdas 2018. (2019). Riskesdas 2018.
- TNP2K. (2017). 100 Kabupaten/Kota Prioritas untuk Intervensi Anak Kerdil (stunting).
- Unicef/ WHO/The World Bank. (2019). Levels and Trends in Child malnutrition Unicef WHO The World Bank Joint Child Malnutrition Estimates, key findings pf the 2019 edition. *Unicef*, 4. https://doi.org/10.1016/S0266-6138(96)90067-4
- WHO. (2020). *Pertanyaan dan jawaban terkait Coronavirus*. https://www.who.int/indonesia/news/novel-coronavirus/ga/ga-for-public