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The Effect of Stunting Prevention Intervention Education on Pregnant Women's Understanding Of Overcoming Gisoya



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ABSTRACT

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KEY W O R D S

Education, Stunting,

Overcoming Gisoya

Stunting or short is defined as a condition of failure in growth in infants aged 0-12 months, toddlers aged 1-5 years caused by chronic malnutrition starting in the first 1000 days of a child's life so that the child's body looks shorter compared to children of the same age..2There are many factors that can cause stunting including the condition of the mother during pregnancy. These factors can be direct or indirect. The direct cause of stunting during pregnancy is inadequate nutritional intake in addition to the height of genetic parents also History of infectious diseases suffered by pregnant women, while Education, ANC, maternal nutritional status, iron consumption, maternal occupation and economic status are indirect factors. Socio-cultural factors are the prohibitions on eating when pregnant, this is the cause of stunting. The purpose of this study was to determine the effect of stunting prevention intervention education on pregnant women's understanding of ATASI GISOYA. The mixed method research method is by means of quantitative pre-experimental design in the form of One Group Pretest-Posttest for antenatal care, iron tablets and nutrition for pregnant women. While qualitatively about socio-culture related to food and drink taboos. The population quantitatively of pregnant women was 32 respondents and qualitatively as many as 5 pregnant women. The results of the pre-test and post-test of the Ante Natal Care (ANC) variable found that the t count was -17,667 with a significance level of 0.000 (p value <0.05). testing between the pre-test and post-test of the iron tablet provision variable, the t count was -14,923 with a significance level of 0.000 (p value < 0.05), testing between the pre-test and post-test of the pregnant women's nutrition variable, the t count was -14,647 with a significance level of 0.000 p value <0.05). Conclusion: There is an influence of stunting prevention intervention education on pregnant women's understanding of ATASI GISOYA.

1. INTRODUCTION

Stunting or short is defined as a condition of growth failure in infants aged 0-12 months, toddlers aged 1-5 years caused by chronic malnutrition starting in the first 1000 days of a child's life so that the child's body looks shorter compared to children of the same age.2

World Health Organization (WHO) prevalence of stunting in toddlers Indonesia is the third country with the highest prevalence in the Asian region (Ministry of Health of the Republic of Indonesia, 2018). 3 Based on global data, stunting in children under 5 years of age in 2020 amounted to 149.2 million or around 22% (World Health Organization, 2021). 4,5 According to the Indonesian Toddler Nutrition Status Survey (SSGBI) in 2019, the stunting rate in South Kalimantan was 31.7%. 6 The



prevalence of stunting in several regencies in South Kalimantan has increased significantly, Banjar Regency is ranked first for regencies with a significant increase in stunting cases, namely from 26.1% in 2017 to 29.1% in 2018, and in 2021 to 40.2%.

Stuntingcan be caused by a variety of factors, including the mother's condition during pregnancy. These factors can be direct and indirect. The direct causes of stunting are food intake, parental height, and history of infectious diseases while the indirect causes are education factors, ANC history, exclusive breastfeeding, maternal nutritional status, iron (fe) consumption, occupational factors, and family economic status (Wellina, Kartasurya, & Rahfiludin, 2016).

Based on an initial survey of 10 pregnant women. Of the 10 people who had a pregnancy check-up, not all knew the standard visit, did not know the minimum amount of iron tablets to drink, did not know the source of nutritious food and all did food or drink restrictions during pregnancy. This is thought to be due to the lack of knowledge of mothers about pregnancy check-ups, consumption of iron tablets and good food sources to consume during pregnancy. The results of Rizki Kurnia Illahi's research show that the socio-cultural practice of prohibiting food during pregnancy is closely related to the incidence of stunting..One way to prevent stunting is to provide pregnant women with education about the Influence of Stunting Prevention Intervention Education on Pregnant Women's Understanding of ATASI GISOYA (ANC, Iron Tablets, Nutrition, and Socio-Culture).

2. METHOD

This study is a mix method Quantitatively, pre-experimental with a One Group Pretest-Postest design with questions about antenatal care, iron tablets and nutrition for pregnant women. Qualitatively, questions about socio-culture related to food and drink taboos. In data collection, initial observation measurements were carried out treatment and observations after treatment. Samples were taken using a total sampling technique of 32 respondents. The population in the quantitative study was all pregnant women in Sungai Tuan Ulu and Sungai Tuan Ilir villages as many as 32 respondents and qualitatively as many as 5 pregnant women. The instruments used in this study questionnaires, leaflets and calendars.

This research was conducted with the proposal stage, proposal seminar, requesting permission from the Head of STIKes Intan, the National Unity and Politics Service (Kesbangpol). The researcher made SAP (Counseling Event Unit), leaflets, attendance lists and questionnaires. Then contact the village midwife to determine the schedule for data collection activities. At the implementation stage, the researcher had gathered all respondents in the room. Then conduct pre-test bv distributing a questionnaires to all respondents within 20 minutes before explaining how to fill out the questionnaire correctly. Furthermore, researcher distributed leaflets and provided counseling/education on stunting prevention interventions including ATASI GISOYA (ante natal care, iron tablets (Fe), nutrition for pregnant women and socio-culture).

Data processing involves editing, coding, processing and clearing. Univariate data analysis describes the independent variable of stunting prevention intervention education and the dependent variable of pregnant women's understanding of ATASI GISOYA. Bivariate analysis using the independent T-Test test analyzes the differences in pregnant women's understanding of ATASI GISOYA before and

after intervention education and to analyze the effect of stunting prevention education intervention on pregnant women's understanding of ATASI GISOYA.

Based on the research results, the characteristics of respondents based on age, education, occupation and number of pregnancies can be seen in Table 1.

3. RESULT AND DISCUSSION

Quantitative Approach Results

Table 1. Respondent characteristics based on age, education, occupation and number of pregnancies.

Characteristics	Frequency	%
Age		
< 20 years	0	О
20-35 years	28	87.5
>35 years	4	12.5
Education		
JUNIOR HIGH SCHOOL	4	12.5
SENIOR HIGH SCHOOL	20	37.5
S1	8	50
Work		
Housewife	24	75
Farmer	8	25
Number of Pregnancies/Parity		_
1-3	32	100

Based on Table 1, the characteristics consisting of the most age at the age of 20 - 35 years 28 respondents (87.5%). the most education is high school 20 respondents (37.5%) and the most work as a housewife 24 respondents (75%). The number of respondents

based on the number of pregnancies/parities the most in parity 1 - 3 as many as 32 respondents.

Table 2. Distribution of Knowledge Before and After Intervention Education

	Level of Knowledge					
Variables	Pre-test			Post Test		
variables	Good	Enough	Not	Good	Enough	Not
			enough			enough
ANC	O	7 (22%)	25 (32	0	0
			78%)	(100%)	U	0
Iron Tablets	0	0	32	32	0	0
	O	O	(100%)	(100%)	U	O
Nutrition	0	0	32	2 (16%)	12 (33	18
	U	U	(100%)	2 (10/0)	%)	(50%)

Based on Table 2, the respondents' knowledge before the intervention education, the level of knowledge about ANC, Iron Tablets and Nutrition was mostly lacking. After the

intervention education, the knowledge about ANC, Iron Tablets was mostly in the good category, while about nutrition, the most was in the lacking category.

Table 3. Paired Sample T-Test Results between ANC Pre Test - ANC Post Test

	P	Paired Differences			DF	Sig (2- tailed)
	95% Confidence Mean Interval		t			
		Lower	Upper			
Pair 1: Pre Test ANC - Post Test ANC	-3.3125	-3.694909	-2.930091	-17,667	31	0.000

Based on Table 3, in the test between the pre-test and post-test of the Ante Natal Care

(ANC) variable, the calculated t is -17.667 with a significance level of 0.000 (p value < 0.05)

Table 4. Results of Paired Sample T-Test between Pre-Test Iron Tablets - Post-Test Iron Tablets

	Paired Differences					
	Mean	95% Confidence Interval		t	DF	Sig (2- tailed)
		Lower	Upper			
Pair 3: Pre Test Iron Tablet - Post Test Iron Tablet	-3.125	-3.552086	-2.697914	-14,923	31	0.000

Based on Table 4, in the test between the pre-test and post-test of the variable of giving

iron tablets, the calculated t is -14.923 with a significance level of 0.000 (p value < 0.05)

Table 5. Results of the Paired Sample T-Test between Nutrition Pre-Test - Nutrition Post-Test

	Paired Differences					
	Mean		Confidence nterval t		DF	Sig (2- tailed)
		Lower	Upper			
Pair 2: Pre Test Nutrition - Post Test Nutrition	- 3.59375	- 4.0941 6	-3.0933	- 14,647	31	0.000

Based on Table 5, in the test between the pre-test and post-test of the nutritional variables of pregnant women,

t count is -14.647 with a significance level of 0.000 p value < 0.05).

Qualitative Approach Results

Qualitative data collection was conducted on 5 informants, who met the inclusion criteria. The characteristics of the informants can be seen in Table 6

Table 6. Characteristics of respondents based on age, education, occupation and number of pregnancies

Characteristics	Frequency	%
Age		
20-35 years	3	
>35 years	2	
Education		
JUNIOR HIGH SCHOOL	1	
SENIOR HIGH SCHOOL	3	
S1	1	
Work		
Housewife	3	
Farmer	2	
Number of Pregnancies/Parity		
1-3	5	
S1 Work Housewife Farmer Number of Pregnancies/Parity	1 3 2	m.1

Socio-cultural

Of the five respondents, there was a culture of abstaining from eating and drinking during pregnancy.

a. Food or drink taboos

"abstain from eating kanas, durian" (inf 1,2,5)

"Ulun Kada Wani eats a lot of fish" (inf 3)
"I never drink iced drinks, especially those with soda in them" (inf 4)

b. Reasons for abstaining from eating or drinking

"Child born with gallbladder" (inf 1)

"health is not good" (inf 2,3)

"Just afraid" (inf 4)

"Just avoid what you don't want" (inf 5)

c. Abstinence from food/drink is recommended
"kuitan, because kuitan ulun also
abstains from food or drink". (inf 1,3,4)
"I am someone who wants to abstain"
(inf 2.5)

Quantitative Discussion

Based on the results of the study of respondents' knowledge before the intervention education, the level of knowledge about ANC, Iron Tablets and Nutrition showed a poor category. After the intervention education, knowledge about ANC, Iron Tablets showed a good category, while knowledge about nutrition was in the poor category. The results of the test between the pre-test and post-test of the Ante Natal Care (ANC) variable, showed that the t count was -17.667 with a significance level of 0.000 (p value < 0.05). The results between the pre-test and post-test of the iron tablet provision variable, showed that the t count was -14.923 with a significance level of 0.000 (p value <0.05). The results between the pre-test and post-test of the pregnant woman's nutrition variable, showed that the t count was -14.647 with a significance level of 0.000 (p value <0.05) then Ho was rejected or both population averages were not identical (the average pre-test significantly and post-test values were different). It can be concluded that there is a difference in the average understanding of Ante Natal Care (ANC), Iron Tablets and Nutrition before and after the implementation of stunting prevention interventions.

Mother's knowledge before intervention education showed poor results, this was due to secondary education level and work as a housewife. This level of education influences a person's knowledge, because low levels education will affect the understanding of information and experience gained. In terms of education, mothers who have completed higher education are better at preventing stunting so that they can increase their active role in posyandu activities and behave, act, and act to encourage health behavior (Alifah AP). Stunting prevention behavior is better in working mothers because working mothers will find it easier to obtain information than those who do not work, but previous studies have shown that mothers are working more risk experiencing stunted children (Fikadu T, Habimana).

Changes in maternal knowledge occurred after intervention education about ANC, Iron Tablets and Nutrition. Educational activities are an effort to provide information so that it can influence people's knowledge as expected by the educator. Knowledge is one of the determining factors for someone in health behavior. If someone has good health knowledge, it is expected that they will also have good health behavior. With increased knowledge, mothers are expected to be able to improve their behavior and attitudes and understand ANC standards, benefits, how to consume and side effects of iron tablets and good nutrition during

pregnancy in preventing stunting.

Stunting can be prevented early. The most effective prevention of stunting can be done in the first 1000 days of a child's life.Addressing the problem of stunting must begin before the child is born or while the child is still in the womb and even better, it must begin during adolescence as an action to break the chain of stunting in the child's life cycle. Since the time of pregnancy, the baby in the womb gets enough and good nutrition, pregnant women must routinely consume iron tablets at least 90 tablets during pregnancy, women always monitor their pregnant pregnancy through ANC. (MCAI, 2016)

Based on this, attention is needed during pregnancy, especially in terms of fulfilling adequate and good nutrition which is carried out since before pregnancy so that prevention of stunting in toddlers can be carried out optimally.

Qualitative Discussion

Socio-culture in this study is the beliefs, values and norms that are adhered to, and all food taboos during pregnancy. South Kalimantan is predominantly inhabited by the Banjar tribe. In South Kalimantan, food taboos are called dangan pamali or pemali.

Bibi Ahmad Cahyanto et al.'s 2018 research on taboo foods for pregnant women stated that the culture of taboo foods for pregnant women is still widely believed and

even practiced by people in Indonesia. Food taboo is an activity to avoid or limit eating certain foods so that one of them has an impact on health and nutrition. While medical food taboos are taboos on certain foods that are justified based on science. (Mustika & Deapati, 2019)

Based on the results of this study, avoiding or abstaining from eating in pregnant women is like consuming pineapple, durian, ice water and eating fish. Pineapple contains serotonin which also plays a role in stimulating uterine contractions. Several studies have proven that there is a significant relationship between consumption of young pineapple and uterine contractions. However, in principle, the bromelain content will decrease along with the increasing level of ripeness of the pineapple.

The results of the study by Apsari et al. 2014 showed a significant relationship between the administration of young or old pineapple extract on uterine contractions. Pineapple is considered taboo for consumption in the first trimester to the beginning of the second trimester for pregnant women because it can stimulate uterine contractions, causing miscarriage. Some people think that consuming pineapple at the end of pregnancy can also be to the mother and baby. harmful administration of young pineapple extract has a stronger effect increasing on uterine contractions than old pineapple extract. Consumption of durian by pregnant women is

not allowed for reasons related to the fear of miscarriage and the burning sensation caused in the stomach by consuming these fruits. Likewise with ice water which is believed to cause large babies and difficulty giving birth.

Other foods that are taboo for pregnant women are animal side dishes. These types of taboo foods are avoided because they cause a fishy smell in the blood during childbirth. When viewed from a nutritional aspect, animal side dishes are highly recommended for pregnant women. During pregnancy, protein needs increase to 20g per day for fetal growth and to maintain the mother's health. In addition, animal side dishes also have a high iron content in the form of heme. The need for iron during pregnancy increases because it is used for the formation of new cells and tissues (Ministry of Health, 2014). Fitriyani (2015) revealed that there is a relationship between the consumption of animal protein foods and the hemoglobin levels of pregnant women

When the mother's nutritional needs are not met, protein energy deficiency (KEK) can occur, and if it continues, pregnant women can experience chronic energy deficiency (KEK), which is a condition where the mother suffers from chronic food deficiency which results in health problems. KEK in pregnant women has an impact on the mother and the baby to be born, such as poor fetal growth and increased risk of neonatal death, increased risk of stunting, and low birth weight or LBW. (Rahayu

et al., 2014).

In principle, the mother's forbidden foods make various nutritional needs of the mother and baby not met. So the possibility of the child being short or stunted is greater.

4. CONCLUSION

Stunting is a condition of growth failure in children caused by chronic malnutrition starting from the first 1,000 days of life, influenced by direct factors—such as inadequate maternal nutrition and infectious diseases during pregnancy—and indirect factors like education, economic status, and socio-cultural food taboos. This study demonstrates that stunting prevention intervention education significantly improves pregnant understanding of ATASI GISOYA, as evidenced by statistical tests on Ante Natal Care (ANC), iron tablet consumption, and maternal nutrition variables, all showing p-values Therefore, providing targeted education to pregnant women is proven effective enhancing knowledge and supporting early stunting prevention efforts.

5. REFERENCES

- Apriluana, G. And Fikawati, S. (2018) 'Analisis Faktor-Faktor Risiko Terhadap Kejadian Stunting Pada Balita (0-59) Di Negara Berkembang Dan Asia Tenggara', Media Litbangkes, 28(4), Pp. 247–256
- Alifah AP. Faktor-Faktor yang Berhubungan dengan Tingkat Partisipasi Ibu Balita dalam Kegiatan Posyandu di Wilayah Kerja Puskesmas Cibeureum Kota Cimahi. Politek Kesehat Kemenkes Bandung Jur Gizi Progr Stud Diploma 3. 2018;
- A, Aziz, Hidayat. (2017). Metode penelitian Keperawatan dan Teknik Analisis Data. Jakarta: Salemba Medika
- Budhathoki SS, Bhandari A, Gurung R, Gurung A, Kc A. Stunting Among Under 5- Year-Olds in Nepal: Trends and Risk Factors. Matern Child Health J. 2020;24(s1):39-47. (1-faktor-determinan-balita-stunting-2019)
- Chahyanto,bibi Ahmad. (2018). Aspek Gizi dan Makna Simbolis Tabu Makanan Ibu hamil di Indonesia. Jurnal Ekologi Kesehatan.https ://doi,org/10.20473/mgi.v.l2il.21-26

- Djauhari T. (2017). Gizi dan HPK 1000. Saintika Madika.
- Fikadu T, Assegid S, Dube L. Factors associated with stunting among children of age 24 to 59 months in Meskan district, Gurage Zone, South Ethiopia: A case control study. BMC Public Health. 2014;14(1):1–7.
- Fitriyani, Hubungan Konsumsi Makanan Protein Hewani, Konsumsi Tablet Besi dan Pendapatan Keluarga dengan Kadar Haemoglobin Ibu Hamil di Wilayah Keja Puskesmas Tirto I Kabupaten Pekalongan. Universitas Sebelas Maret. Surakarta
- Habimana S, Biracyaza E. Risk Factors Of Stunting Among Children Under 5 Years Of Age In The Eastern And Western 104 Provinces Of Rwanda: Analysis Of Rwanda Demographic And Health Survey 2014/2015
 Pediatr Heal Med Ther. 2019; Volume 10:115–30.
- Hanum N. Pengaruh Pendapatan, Jumlah Tanggungan Keluarga Dan Pendidikan Terhadap Pola Konsumsi Rumah Tangga Nelayan Di Desa Seuneubok Rambong Aceh Timur. J Samudra Ekon. 2018;2(1):75-84.
- Irwansyah I, Ismail D, Hakimi M. (2016). Teenage pregnancy and the incidence of stunting in children aged 6-23 months in West Lombok. Berita Kedokteran Masyarakat, Volume 32 No. 6
- Kesehatan Kementerian Kesehatan RI,2019
- Kemenkes RI. 2018. Cegah Stunting Itu Penting. Jakarta: Warta Kesmas. https://www.google.com/url?sa=t&so http://www.kes mas.kemkes.go.id
- Kementrian Kesehatan RI, Pedoman Pelayanan ANC Terpadu, tahun 2020.
- Kementrian Kesehatan RI, Pedoman Pelayanan Antenatal Terintegrasi, tahun 2015.
- Kemenkes RI. Pedoman pelayanan antenatal, persalinan, nifas, dan bayi baru lahir di Era Adaptasi Baru. 2020. 98 p
- Laporan Akhir Penelitian Studi Status Gizi Balita Di Indonesia Tahun 2019, Pusat Litbang Upaya Kesehatan Masyarakat Badan Penelitian Dan Pengembangan
- Losong, N. H. F. And Adriani, M. (2017) 'Perbedaan Kadar Hemoglobin, Asupan Zat Besi, Dan Zinc Pada Balita Stunting Dan Non Stunting', Amerta Nutrition, 1(2), Pp. 117–123. Doi: 10.20473/Amnt.v1i2.6233.
- Maravilla JC, Betts K, Adair L, Alati R. Stunting of children under two from repeated pregnancy among young mothers. Sci Rep. 2020;1–9 (1-faktor-



- Milenium Chalengge Account Indonesia/MCAI), 2016.Stunting dan Masa Depan Indonesia. http://mcaindonesia.go.id. diunduh 15 Juli 2023
- Mustika,M.,&Deapati,A.A (2019).Hubungan Kebiasaan mengkonsumsi teh (Camellia Senensis) dengan gejala anemia defisiensi besi pada ibu hamil dipuskesmas Malimongan Baru.UMI Medical Journal
- Notoatmodjo ,2014.Ilmu Perilaku Kesehatan,Jakarta.Rineka Cipta
- Rabbania Hiksas, Rima Irwanda, Noroyono Wibowo. Anemia Defisiensi Besi. Persatuan Obstetri dan Gynekologi Indonesia. Jakarta; 2021:p.58-43)16
- Rahayu dkk (2015)Riwayat Berat Badan Lahir dengan Kejadian Stunting pada Anak Usia Bawah Dua Tahun, Jurnal Kesehatan Masyarakat Nasional Vol 10, No 2, Tahun 2015

- Rahayu A, Yulidasari F, Putri AO, Anggraini L. Study guide- stunting dan upaya pencegahannya. Yogyakarta: Penerbit CV Mine; 2018.
- Ramayulis, Dkk. 2018. Stop Stunting Dengan Konseling Gizi. Jakarta: Penerbit Plus+
- Pedoman Pelayanan Antenatal, Persalinan, Nifas dan Bayi. Baru Lahir di Era Adaptasi Kebiasaan Baru.— Jakarta : Kementerian Kesehatan RI.2020
- Supariasa, I., Dewa, NH. 2016. Ilmu Gizi Teori dan Aplikasi. Jakarta: EGC.
- World Health Organization, 2021. Stunting Prevalence Among Children Under 5 Years Of Age (%). [Online] Available At: Https://Www.Who.Int/Data/Gho/ Data/ Indi Cators/Indicator-Details/Gho/Gho-Jme-St Unting-Prevalence> [Accessed 14 September 2023].