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THE RELATIONSHIP BETWEEN KNOWLEDGE AND ATTITUDES OF PREGNANT WOMEN WITH COMPLIANCE WITH IRON TABLET CONSUMPTION (FE) AT THE BANDA SAKTI HEALTH CENTER, LHOKSEUMAWE CITY YEAR 2023

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ABSTRACT

Background: Anemia is a condition of low levels of red blood cells, hemoglobin capacity, and hematocrit volume in each milliliter of blood when it is sufficient to meet the body's physiological needs. If a person has hemoglobin levels below 12 g/100 ml in their blood, it can be said that the person has anemia. Anemia is one of the health problems experienced by many pregnant women. One way to prevent anemia in pregnant women is to consume iron (Fe) tablets. However, the compliance of pregnant women in consuming iron tablets is still low, this is caused by various factors such as attitudes and knowledge which will later influence the formation of health behavior. This research aims to determine the relationship between knowledge and attitudes of pregnant women and compliance with consuming iron (Fe) tablets at the Banda Sakti Health Center in 2023. Methods: This research is an observational analytic research with a cross sectional approach with sampling using the accidental sampling method with 100 respondents. Data analysis used in the research includes univariate analysis and bivariate analysis using the chi-square test. Results: The research results showed that the majority of respondents had insufficient knowledge, namely 44%, and the majority of respondents had a very negative attitude, namely 39%, and the majority of respondents, namely 56% of respondents, were disobedient. Proven by the chi-square statistical test which shows the relationship between knowledge and adherence to consuming iron (Fe) tablets. Conclusions: the researchers concluded that there was a significant relationship between knowledge and compliance of pregnant women in consuming iron tablets. Keywords: Anemia., ANC., folic acid.

INTRODUCTION

Anemia is a state of low levels of red blood cells, hemoglobin capacity, and hematocrit volume in each milliliter of blood when it is sufficient to meet the physiological needs of the body. If a person has a hemoglobin level below 12 g/100 ml in their blood, it can be said that the person is anemic.¹ Anemia is the most common condition experienced during pregnancy.²

Based on the World Health Organization (WHO) in 2019, worldwide, 36.5% of pregnant women suffer from anemia; this number is much greater in poor countries and among countries with low socioeconomic backgrounds.³This figure reaches 57% in Africa, 48.2% in Asia, 25.1% in Europe, and 24.1% in the Americas among pregnant women suffering from anemia.⁴ In 2019, the prevalence rate of anemia among pregnant women in Indonesia was 48.9%.⁵

Based on statistical data compiled by the Lhokseumawe City Health Office, the Banda Sakti Health Center recorded 202 pregnant women who experienced anemia in 2020. The following year the number dropped to 125, but in 2022 it increased again to 169. In 2020, 91 pregnant women were

http://ojs.unud.ac.id/index.php/eum doi:10.24843.MU.2024.V13.i05.P11 diagnosed with anemia at the Mon Geudong Health Center, then decreased in 2021, when 69 pregnant women were found, and when 2022 stagnated at 69 people, at another Puskesmas, namely Muara Satu Health Center, 18 pregnant women were found to have anemia in 2020, this number decreased in 2021 when 8 pregnant women had anemia, and an increase in 2022 when 22 pregnant women had anemia. This shows that Banda Sakti Health Center will experience the largest increase in the number of pregnant women with variable anemia in 2022.⁶

The increased need for iron during pregnancy increases, and is not adequately met by consuming food alone. Therefore, if iron stores are low or iron absorption is limited, this may result in lower blood hemoglobin levels, leading to anemia.²

Providing supplemental blood tablets is one of the suitable initiatives to prevent anemia, such as iron tablets. Iron, also known as Fe, is an essential microelement required by the body for hemoglobin synthesis. The content of iron sulfate and folic acid in Fe pills is 200 mg and 0.25 mg, respectively. During pregnancy, you should take one pill per day for a total of ninety pills.⁷

Based on data from the Ministry of Health, it can be said that the coverage of providing Fe to pregnant women in Indonesia in 2021 reached 84.2%, it can be said that this figure has increased when compared to 2020 which reached 83.6%, although the increase is not so significant. Bali Province has the highest level of coverage in providing supplementary blood pills to pregnant women (92.6%), followed by Jambi (92.1%) and East Java (91.3%). In contrast, Southeast Sulawesi (64.1%), Papua (56.8%), and West Papua (37.5%) were the lowest achieving provinces. The low intake of iron tablets in pregnant women is due to various factors, one of which is the level of knowledge.⁴

Knowledge is a factor that influences the formation of health attitudes. When a pregnant woman knows and then realizes the consequences of anemia as well as how to prevent it, it is expected that her health behavior will be positive, helping to avoid the risks and impacts of anemia in pregnancy. This behavior can contribute to reducing the incidence of anemia in pregnant women. The behavior of pregnant women who are not adherent when taking iron tablets reflects the potential risk of developing anemia, as knowledge plays an important role in ensuring adherence of pregnant women when taking iron tablets.⁸

This situation has the potential to compromise maternal and fetal health, particularly the risk of morbidity and mortality, according to a baseline study conducted by researchers at the Banda Sakti Community Health Center in Lhokseumawe. The study involved 240 pregnant women who underwent ANC between January and May, and 86 of them, or about 36%, had anemia. pregnancy-related anemia affects both the mother and the unborn baby. Based on this context, the purpose of this study was to determine the relationship between knowledge, attitudes, and compliance of pregnant women in taking iron (Fe) tablets with the prevalence of anemia at the Banda Sakti Health Center in Lhokseumawe City.

MATERIAL AND METHOD

To determine the relationship between knowledge, attitudes, and compliance of pregnant women in taking iron (Fe) tablets at the Banda Sakti Health Center in Lhokseumawe when 2023 was the purpose of this cross-sectional study. The sample was taken from the subject itself, making it an example of incidental sampling, a non-probability sampling approach. happened to be found along with the data collection process and met the inclusion and exclusion criteria. The sample of this research amounted to 100 samples because the inclusion and exclusion criteria were met. Data collection was carried out by distributing questionnaires to respondents, before that the researcher first submitted a request for data collection at the relevant institution. The researcher then set the date and time, then data collection was carried out at a predetermined time until it met the number of research samples. Data analysis used univariate analysis and bivariate analysis.

RESULTS

Table 1 Charateristics of respondent

Charateristics	Frequency (n=100)	Percentage (%)		
Usia Ibu				
Remaja Akhir	40	40		
Dewasa Awal	60	60		
Pendidikan				
SD	0	0		
SMP	11	11		
SMA	75	75		
Perguruan Tinggi	14	14		

Table 1 shows that most mothers' ages are in the early adult category, totaling 60%. While in the Education category, the highest number is in the high school category, 75%.

 Table 2
 Frequency Distribution of Respondents'

 Knowledge Level
 Image: Comparison of Compari

(n=100)	Percentage (%)		
24	24		
32	32		
44	44		
100	100		
	24 32 44		

Based on table 2 indicates the frequency distribution of knowledge levels in 100 respondents, the majority of respondents have a level of knowledge in the poor category totaling 44%, while the number of respondents with the lowest level of knowledge is in the good category totaling 24%.

Attitude	Frequency (n=100)	Percentage (%)
Sangat setuju	32	32
Setuju	10	10
Netral	7	7
Tidak setuju	12	12
Sangat tidak	39	39
setuju		
Total	100	100

Based on table 3, it is found that the frequency distribution of attitudes in 100 respondents with the highest number of frequencies is in the category of strongly disagreeing at 39%. and the lowest is in the neutral category at 7%.

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Table	4	Frequency	Distribution	of	Compliance	to	Fe
Tablet	Co	onsumption a	among Respo	nde	nts		

Compliance	Frequency (n=100)	Percentage (%)
Patuh	44	44
Tidak Patuh	56	56
Total	100	100

Based on table 4, the results showed that the frequency distribution of Fe tablet consumption compliance was in the non-compliant category, totaling 56%.

Table 5 Relationship between Knowledge andCompliance of Fe Tablet Consumption

	Kepatuhan							
Penget ahuan	Pa	Patuh		Tidak patuh		tal	p val ue	
	n	%	n	%	n	%	ие	
Baik	16	66 ,7	8	33 ,3	24	10 0		
Cukup	21	65 ,6	11	34 ,4	32	10 0	0,00 01	
Kurang	7	15 ,9	37	84 ,1	44	10 0		

ased on table 5, it is obtained that the number of respondents with a lack of knowledge and noncompliance as the largest category is 37 people or as much as (84.1%) and from these results the p number is 0.0001 (p < 0.05), so the two variables studied in this study have a relationship where the less knowledge means the more non-compliant with Fe tablet consumption.

Table 6 Relationship between Attitude and Compliance to

 Fe Tablet Consumption

Sikap	Patuh		Tidak patuh		Total		p value
	n	%	n	%	n	%	
Setuju	29	74,4	10	25,6	39	100	
Netral	7	70	3	30	10	100	0,0001
Tidak setuju	8	15,7	43	84,3	51	100	0,0001

Based on table 6, it was found that most respondents were in the disagree and non-compliant categories with a total of 43 respondents (84.3%), also obtained a p value of 0.0001 (p < 0.05), so the two variables had a significant relationship where the more disagreeable the respondent's attitude, the more non-compliant the Fe tablet consumption

DICUSSION

Charateristics of Respondent

Based on Table 1, it can be concluded that the most dominant age group is the early adulthood category, which includes the age range of 26-35 years, in which in general a woman has been married and pregnant at least once. The best age range for a woman to conceive is around 20 to 35 years as during this time the uterus has developed and is better equipped to handle pregnancy on both a psychological and physical level. The duration of pregnancy and delivery procedures are significantly affected by age. Nutritional competition between the growing mother and the fetus in relatively young pregnant women. Compared to older mothers, younger mothers are 3.7 times more likely to experience Chronic Energy Deficiency (CHD). These results are comparable to research conducted by Oktaviani from 2020, where the majority of participants were between 26 and 35 years old.⁹

The characteristics of respondents based on the education category, the majority of participants had the last educational background at the high school level. Based on Sholihah (2013), the higher a person's level of education, the superior their ability to filter the information obtained. Lawrence Green's theory states that education plays an important role in changing behavior. This means that individuals with a good level of education relatively indicate positive behavior, including in maintaining health. Education and awareness are closely related; those with lower levels of education usually have lower awareness and knowledge of healthy actions.¹⁰

The Knowledge Level of Respondents

Based on the knowledge table, the majority of respondents had a low level of knowledge. Knowledge is a factor that influences how health behavior is formed. If a pregnant woman is aware of the dangers of anemia and how to avoid it, it is expected that her health behavior will be better, so that she can avoid various risks and consequences that may arise from anemia in pregnancy.¹¹

Similar findings were also found in Kusumawati and Rahardjo's (2020) study, where 66.7% of participants had a high level of knowledge. The results of the study indicate that a lack of knowledge, understanding or awareness of iron deficiency will have an impact on the action of consuming foods that are high in iron content or taking iron supplements to improve maternal iron status. Highly educated pregnant women have the ability to determine the types of foods that are rich in iron.¹² Iron is very important for hemopoesis (blood formation), namely in the synthesis of hemoglobin and can be conjugated with protein in the form of iron or ferric in the body, so it is needed especially in pregnant women whose iron needs are increasing Pregnant women who adhere to taking Fe tablets are influenced by other factors such as good maternal education so that awareness arises to take Fe tablets regularly.¹³

Knowledge is the result of a person's sensing of certain information (Yusriani and Alwi, 2018). Good knowledge will generally produce relativity in individuals to increase the level of vigilance when taking action. This is due to the important role of knowledge in shaping the attitudes and actions of an individual.¹⁴ Referring to Notoatmodjo, action is the result of an internal response that arises after a process of thought, response, inner attitude, and knowledge.

Attitude of Respondents

Based on the attitude table, it shows that almost all respondents have a strongly disagreeing attitude. This is the result of the respondents' lack of knowledge. knowledge is a factor in the formation of attitudes. Poor knowledge can also have an impact on the attitude shown. Based on the research, it can be concluded that attitude has a significant impact on the level of compliance in taking iron (Fe) tablets. The level of adherence to taking iron (Fe) tablets and the level of attitude of respondents are correlated, meaning that the more positive the attitude of respondents, the higher their level of adherence to taking iron

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(Fe) tablets. Conversely, respondents are unlikely to adhere to iron tablets if their attitudes are generally negative.

A person's attitude is formed by various factors, such as the knowledge they possess their own experiences, the influence of others and cultural elements. Patterns of behavior, relativity, or anticipatory preparation that indicate a person's relativity to adjust in a social environment are known as attitudes. In short, attitudes are conditioned reactions to social stimuli.¹⁶ The results obtained in this research are in line with research conducted by Misriani (2018), which indicated that the majority of participants indicated non-positive attitudes.¹⁷

Compliance of Fe Tablet Consumption of Respondents

The level of compliance of respondents in the consumption of Fe tablets indicates that the majority are in the non-compliant category. This is directly proportional to the level of knowledge of respondents who are also lacking. Ignorance can affect the level of compliance where if someone has a poor understanding then it means that the individual does not know clearly regarding the importance of Fe consumption during pregnancy so that their compliance is also low.

Pregnancy increases the body's need for iron, which cannot be met adequately alone. As a result, inadequate iron storage or insufficient iron absorption can reduce hemoglobin levels in the blood, causing anemia.10 Providing supplemental bloodboosting tablets is one of the effective initiatives in preventing anemia, such as providing iron (Fe) tablets. Iron (Fe) is an essential microelement required by the body for hemoglobin synthesis. These iron tablets contain 200 mg ferrous sulfate and 0.25 mg folic acid, and are recommended to be consumed at least 90 tablets at a dose of 1 tablet per day during pregnancy.¹⁴

The act of consuming high iron foods or taking iron supplements to improve maternal iron status will be influenced by a lack of knowledge, understanding or awareness of iron deficiency. Higher levels of education during pregnancy allow pregnant women to choose foods high in iron.¹⁷

Relationship between Knowledge and Compliance with Fe Tablet Consumption

Table 4.5 presents the research findings, indicating a strong correlation between knowledge and adherence to Fe tablet use (p = 0.0001). In addition, it was evident that the majority of respondents belonged to the group that had inadequate knowledge and were not compliant.

This is in line with research conducted by Hastanti (2019) who examined the knowledge and compliance of pregnant women towards the use of iron (Fe) tablets in the Lawanga Health Center Working Area, Poso Regency. The results provided an explanation for the relationship between mothers' compliance with taking Fe tablets and their level of knowledge about deficiency anemia. On the other hand, adherence to taking Fe tablets was negatively correlated with mothers' level of understanding about deficiency anemia. Next, in accordance with previous research by Shofiana FI and her colleagues at Puskesmas Maron, Probolinggo Regency when 2018 found a statistically significant correlation between pregnant women's understanding of anemia with iron tablet consumption patterns. Referring to the statement by Regina Pricilia Yunika from the Nutrition Study Program, Faculty of Health, Bumigora University in 2021, compliance with consuming blood-

University in 2021, compliance with consuming bloodboosting tablets at the Narmada Community Health Center, West Lombok Regency, poses a significant threat to a person's knowledge of anemia. Nadia Fatma also concluded that

http://ojs.unud.ac.id/index.php/eum doi:10.24843.MU.2024.V13.i05.P11 pregnant women's compliance in using Fe supplements destroys the significance of their knowledge, attitudes and educational attainment in the same year.

A comprehensive mindset is formed largely through knowledge. Better attitudes can be formed with increased information, which inspires people to act morally. Pregnant women who understand information about the importance of iron and the consequences of iron deficiency during pregnancy have a relatively good attitude in complying with and consuming iron supplements. The large number of respondents in this study indicates a lack of understanding, which can be attributed to a number of things, such as motivation, family support, environment, or level of education.

Almost all pregnant women at the Banda Sakti Community Health Center have insufficient knowledge, referring to data. Pregnant women may not be aware of the need to take iron supplements due to ignorance. Pregnant women's noncompliance with taking iron tablets is influenced by low awareness. This is what makes non-compliance with consuming iron tablets a factor that contributes to an increase in the incidence of anemia. Pregnant women can receive information from health professionals during Antenatal Care (ANC) visits regarding iron needs, benefits, foods containing iron, effects of iron deficiency, and related topics.

Relationship between Attittude and Compliance with Fe Tablet Consumption

The research results indicate that 32% of respondents' attitudes are very positive, 7% of respondents' attitudes are positive, 10% of respondents' attitudes are neutral, 12% of respondents' attitudes are negative, and 39% of respondents' attitudes are very negative.

The results of this research are in line with research conducted at the Seberang Padang Community Health Center by Erwin and colleagues (2017), which found a substantial correlation between pregnant women's compliance with taking iron tablets and their attitudes. The results of this investigation are consistent with Selnia's (2017) research conducted at the Cempaka Putih Inpatient Health Center, which indicated a relationship between the attitudes of pregnant women and their compliance with taking blood-boosting pills. Putri's research (2019) at BPM Mardiani Ilyas Aceh also produced similar results, indicating a relationship between the attitudes of pregnant women and their compliance in using Fe pills. The findings of this research confirm the findings of Nurrohmah and colleagues (2020) at the Klari Community Health Center, indicating a relationship between the views and compliance of pregnant women regarding the use of Fe.

Referring to the theory described by Mar'at, attitude includes three main and interrelated components. The first component is the cognitive component, also known as the perceptual component, which includes an individual's experience, knowledge, and personal beliefs. A person's capacity to evaluate an object is correlated with the second component, which is the emotive (or emotional) component and the conative component, also known as the behavioral component, is related to the individual's relativity to act.¹⁸ Attitudes are dispositions to influence behavior. A positive outlook will probably make pregnant women more compliant when it comes to taking iron supplements. On the other hand, pregnant women are relatively unlikely to take iron supplements as directed if they have a bad attitude. Attitude is an element in humans that has the potential to move or trigger a certain action. However, developing attitudes is a process that requires several steps, one of which is experiencebased learning. Pregnant women can use their experiences to help them decide how they feel about the actions they plan to take.

From the research results, it was found that most respondents continued to have an unfavorable opinion about taking iron supplements. Pregnant women at the Banda Sakti Community Health Center continue to have low levels of compliance with taking iron tablets, which can be associated with negative attitudes that lead to non-compliant activities. Failure to address these problems may have adverse effects on maternal and fetal health

CONCLUSION AND SUGGESTIONS

Kesimpulan riset ini yaitu usia ibu hamil di Puskesmas Banda Sakti ketika 2023 terutama masuk dalam kategori dewasa awal. Selain itu, kebanyakan wanita hamil telah menyelesaikan sekolah menengah. Pada riset ini, sikap dan kepatuhan ibu mengonsumsi pil zat besi (Fe) dipengaruhi oleh usia dan karakteristik pendidikan. Distribusi frekuensi tingkat pengetahuan ibu hamil Puskesmas Banda Sakti tahun 2023 menandakan bahwa kategori terbanyak masuk dalam kelompok kurang. Sikap ibu hamil di Puskesmas Banda Sakti tahun 2023 kebanyakan bersikap sangat negatif. Ketika 2023, mayoritas ibu hamil di Puskesmas Banda Sakti tidak mengonsumsi suplemen zat besi sesuai anjuran (Fe). Pengetahuan dan sikap ibu hamil di Puskesmas Banda Sakti tahun The conclusion of this research is that the age of pregnant women at the Banda Sakti Community Health Center in 2023 will mainly be in the early adulthood category. Additionally, most pregnant women have completed high school. In this research, mothers' attitudes and compliance with taking iron (Fe) pills were influenced by age and educational characteristics. The frequency distribution of the level of knowledge of pregnant women at the Banda Sakti Health Center in 2023 indicates that the highest category is in the poor group. The attitude of pregnant women at the Banda Sakti Health Center in 2023 will mostly be very negative. By 2023, the majority of pregnant women at the Banda Sakti Health Center will not take iron supplements as recommended (Fe). The knowledge and attitudes of pregnant women at the Banda Sakti Health Center in 2023 regarding compliance with the use of Fe pills are significantly correlated.

Suggestions from this research are for future researchers to use this research as evaluation material and additional information in future research. Also, take another population to find out the differences in results and characteristics between populations. For the public to pay more attention to things that can cause anemia in pregnancy and consume Fe tablets more regularly. As well as for Community Health Centers to improve health education about pregnancy anemia and its prevention. This may emphasize how important it is to promote Fe tablets while pregnant.

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BIBLIOGRAPHY

- 1. Price, S. A., & Wilson L. Patofisiologi: Konsep Klinis Proses-Prosesnya. Jakarta: EGC; 2012.
- Hudono ST. Penyakit Darah. Dalam: Wiknjosastro H, Saifuddin AB, editor. Ilmu Kebidanan. Edisi Ke-4. Jakarta: Yayasan Bina Pustaka Sarwono Prawirohardjo; 2010.
- WHO. Anaemia in women and children [Internet]. World Health Organization. 2023 [cited 2023 Jun 4].Availablfrom:https://www.who.int/data/gho/data/themes/t opics/anaemia_in_women_and_children
- 4. Nuristigfarin A, Maulina I, Islami R. Hubungan Kepatuhan Konsumsi Tablet Fe Dengan Kejadian Anemia Pada Ibu Hamil. Universitas Nurul Jadid; 2021.
- Kemenkes RI. Anemia dalam Kehamilan. Riskesdas 2019. 2019;
- 6. Dinkes Lhokseumawe. Data Ibu Hamil dengan Anemia. Lhokseumawe; 2022.
- Kemenkes RI. Pedoman Pemberian Tablet Tambah Darah (TTD) Bagi Ibu Hamil. Kementeri Kesehat Republik Indones. 2020;24.
- Putri Wulandini.S TT. Hubungan Pengetahuan Ibu Hamil Tentang Anemia Dengan Kepatuhan Mengkonsumsi Tablet Fe Di Wilayah Puskesmas RI Karya Wanita Pekanbaru. MENARA Ilmu. 2020;XIV(02):122–8.
- Oktaviani A, Elsanti D. Hubungan diantara Panjang Lingkar Lengan Atas (LILA) Dengan Kadar Hemoglobin (Hb) Pada Ibu Hamil Di Wilayah Kerja Puskesmas Purwokerto Selatan. J KeperawatanMuhammadiyah. 2020;(September):177–84.
- Adventus, Jaya IMM, Mahendra D. Buku Ajar Promosi Kesehatan. 2019;1–107.
- 11. Natalia L, Yuwansyah Y, Setiawati AE. Gambaran Tingkat Pengetahuan Ibu Hamil Primigravida Tentang Anemia Pada Kehamilan. J Midwifery Care. 2022;3(01):11–22.
- Kusumawati E, Rahardjo S. Hubungan Tingkat Asupan Zat Gizi dengan Anemia Ibu Hamil di Puskesmas Purwokerto Timur II dan Puskesmas Baturaden di Kabupaten Banyumas. J Kesehat Masy. 2020;12(2):145–58.
- Sasono HA, Husna I, Zulfian Z, Mulyani W. Hubungan Tingkat Pendidikan Dengan Kejadian Anemia Pada Ibu Hamil Di Beberapa Wilayah Indonesia. J Med Malahayati. 2021;5(1):59–66.
- Yusriani, Alwi. Buku Ajar Promosi Kesehatan dan Pemberdayaan Masyarakat. Ponorogo: Forum Ilmiah Kesehatan (FORIKES); 2018.
- 15. Notoadmodjo. Pendidikan dan Perilaku Kesehatan. Jakarta: Rineka Cipta; 2003.
- 16. Yuliani DA, Maesaroh S. Hubungan Pengetahuan Dan Sikap Terhadap Kepatuhan Konsumsi Tablet Fe Pada Ibu Hamil Trimester III Di Puskesmas Sumbang II. NERSMID J Keperawatan dan Kebidanan. 2023;6(1):69–76.

- 17. Misriani. Hubungan Pengetahuan Dan Sikap Ibu Hamil Dengan Kepatuhan Konsumsi Tablet Besi (Fe) Di Puskesmas Hamparan Perak Kabupaten Deli Serdang Tahun 2018. Poltekes Medan; 2018.
- Azmi U, Puspitasari Y. Literature Review: Risk Factors of Anemia in Pregnancy Women. J Qual Public Heal. 2022;6(1):244–56.

