

# HIV Test Utilization

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## UTILIZATION FACTORS OF HIV TESTING BY PREGNANT WOMEN IN PRIMARY HEALTH CARE

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### ABSTRAK

**Background:** Utilization of HIV testing during pregnancy is one of the policy efforts to prevent pregnant women from contracting the HIV virus or transmitting it to the unborn fetus. Deli Serdang has always been in second place in the district with the most HIV cases over the last 3 (three) years in North Sumatra. On the other hand, HIV testing by pregnant women in this district is relatively low, with a number of factors assumed to be the cause.

**Purpose :** This study, therefore, aimed to investigate several factors with the use of HIV testing by pregnant women so that strategic efforts can be obtained to prevent HIV transmission by pregnant women.

**Methods:** This research was a quantitative, analytical research with a cross-sectional design. The sample was obtained using a cluster random sampling technique so that 285 pregnant women were obtained. Data were collected using a questionnaire that had been tested for validation and reliability, and then analyzed univariately, bivariately using the Chi-Square test, and multivariately using Binomial logistic regression.

**Results:** This study found a significant relationship between the variables of knowledge ( $p=0.000$ ), social support ( $p=0.000$ ), facilities and infrastructure ( $p=0.000$ ), and the perspective of vulnerability ( $p=0.036$ ) with the use of HIV testing.

**Conclusion:** The conclusion of this study found that there was a relationship between the utilization of HIV testing by pregnant women in the work area of the Puskesmas with knowledge, attitudes, facilities and infrastructure as well as a vulnerability perspective. Strategic and tactical efforts in the form of appropriate interventions in the provision of supporting facilities and infrastructure desired by pregnant women will enable an increase in HIV testing.

## INTRODUCTION

Human Immunodeficiency Virus (HIV) is a type of virus that infects white blood cells which causes a decrease in human immunity. Acquired Immune Deficiency Syndrome (AIDS) is a group of symptoms that arise due to a decrease in the body's immunity caused by HIV infection[1]. The immune system becomes weak, and one or more diseases may arise. Because the immune system is weak, serious diseases can become more serious than usual[2]. Based on sources from the United Nations Program on HIV and AIDS (UNAIDS) in 2019, the largest HIV-infected population in the world is on the African continent (25.7 million people), then in Southeast Asia (3.8 million). The high population of HIV-infected people in Southeast Asia requires Indonesia to be more vigilant about the spread and transmission of this virus[1].

According to the Sustainable Development Goals (SDGs) Health Indicators in Indonesia, HIV/AIDS is included in the 3rd Goals which will guarantee a healthy life and promote prosperity for all people of all ages by 2030<sup>2</sup>. Based on data from reports on the development of HIV/AIDS and Infectious Diseases in 2021, the number of HIV/AIDS cases in Indonesia over the last six years, the number of HIV cases in Indonesia reached its peak in 2019, namely 50,282 cases. One of them is North Sumatra (695 cases). The highest percentage of PLWHA was found in the MSM group, 26.3%; pregnant women 20.9%; and TB patients 11.5%[3].

Based on gender, the number of women suffering from HIV is 31%, this is less than men, but women are a population that is vulnerable to infection transmission. This occurs because women, especially those of reproductive age, are able to become pregnant, give birth and breastfeed. HIV infection in pregnant women can threaten the life of the mother and the mother can transmit the virus to her baby. More than 90% of cases of children infected with HIV are transmitted through the Mother To Child Transmission (MTCT) process[4].

Currently, North Sumatra Province is ranked 5th for the highest cumulative number of HIV/AIDS cases in 2021. Based on HIV case report data from the North Sumatra Health Service in 2021, it is known that as of January 2022, three districts with the highest proportion of HIV are Medan (51.60%), Deli Serdang (14.20%), and Pematangsiantar (6.55%).

So far, health service facilities for preventing mother-to-child transmission of HIV are adequate. In Deli Serdang Regency, HIV/AIDS ART (Anti Retroviral Therapy) and VCT (Voluntary Counseling and Testing) Referral Hospitals have been established, namely Deli Serdang District Hospital and Bandar Baru Community Health Center.[5].

Utilization of health services is the result of the process of seeking health services by an individual or group (Tambunan et al., 2020). Meanwhile, according to Azwar (1999) in[6] Utilization of health services is the use of service facilities provided such as outpatient care, inpatient care, or other forms of activities[7].

Apart from that, it is also known that the HIV control program is included in the priority budget for minimum service standards (SPM) of the Deli Serdang District Health Office and has received support from the Global Fund and strengthening health workers in partnership with the Kasih Suvitno Foundation (YKS) in the Deli Serdang Health Sector SPM Implementation Report for 2018. In 2021, it was stated that there were still a number of health facilities that did not have this service because there had not been optimal guidance for strengthening programs in the community health center network and there was no draft regional regulation regarding HIV prevention in Deli Serdang Regency.

The low number of visits and utilization of HIV testing services among pregnant women can be seen from Green's Theory (1980) which mentions factors that influence health behavior, namely predisposing, driving and reinforcing factors. Predisposing factors are manifested in knowledge, attitudes, beliefs, values, habits, social norms and culture.

According to Notoatmodjo (2010) who quotes the opinion of Anderson R (1974) in[8] There are 3 main categories of health system models in health services, namely, Predisposing Characteristics, Enabling Characteristics, Need Characteristics. Lawrence Green (1980) in[9] explains that there are three factors that influence health behavior, namely predisposing factors, enabling/supporting factors, reinforcing factors. According to Dever (1984) in[10] The utilization of health services is influenced by the following factors: socio-cultural, factors related to the organization, factors related to consumers, factors related to providers.

Driving factors such as the existence of facilities, the environment, or special sources that support and the affordability of health resources and facilities. Reinforcing factors include the attitudes and behavior of officers, support from husbands or families, and community leaders[11]. Research conducted[12] shows that there is a relationship between staff support for counseling behavior and HIV testing of pregnant women. Study[13] also shows that the level of knowledge and social support has a significant relationship with HIV testing in pregnant women and support

Social behavior towards pregnant women is the most dominant factor influencing HIV testing in pregnant women. Apart from that, research conducted by[14] also shows that there is an influence of knowledge, attitudes, distance and family support on the participation of pregnant women in HIV/AIDS screening.

Based on previous research that the researcher has presented, it is known that the aspects studied are knowledge, attitudes, social support, patient perception & psychology. So researchers want to study more deeply by looking at other aspects which include knowledge, attitudes, husband's support, the role of health workers, completeness of facilities & infrastructure, as well as perceptions of vulnerability to HIV. Apart from that, so far no research has been carried out regarding HIV testing services for pregnant women at Puskesmas health service facilities so researchers are interested in conducting research on this theme. Therefore, the researcher intends to conduct research on "Factors Associated with the Utilization of HIV Testing by Pregnant Women in the KIA Program at the Deli Serdang District Health Center".

## METHOD

3 The type of research used in this study is analytic quantitative research with a cross sectional design approach. This study was conducted in the work area of the Deli Serdang District Health Office, North Sumatra with a cluster selection of Bandar Khalipah Health Center, Batang Kuis Health Center, Sibolangi Health Center, Lubuk Pakam Health Center and Tanjung Morawa Health Center. The research was conducted from June to December 2023.

The population in this study were all pregnant women in the working area of the Deli Serdang District Health Office 5 (five) health centers totaling 10,74 pregnant women. The sampling technique was carried out by Cluster Random Sampling with the criteria of residing in the working area of the Deli Serdang health center, mothers who were pregnant in the third trimester and had had a previous pregnancy examination at a health care facility.

Data were collected using a questionnaire that had been tested for validation and reliability, and then analyzed univariately, bivariately using the Chi-Square test, and multivariately with binary logistic regression.

## RESULT AND DISCUSSION

### Characteristic responden

Table 1. Characteristic respondents

Variables (n = 285)	f	%	CI95 %
<b>Age (Years)</b>			
Min 17, Max 49, Mean 28.24, Md 27, Mo 27, SD 5.962			
<b>Gestational age (weeks)</b>			
Min 4, Max 45, Mean 24.83, Md 26, Mo 28, SD 7.993			
<b>Education</b>			
No school	-	-	-
elementary school	6	2.1	0.7 - 3.9
Junior High School	45	15.8	11.2 – 20.7
Senior High School	214	75.0	70.5 – 80.4
PT	19	6.6	3.9 – 9.8

Job status			
Doesn't work	235	82.3	77.2 – 86.3
Work	50	17.7	13.7 – 22.8

Based on the table above, the 285 pregnant women who underwent HIV testing were on average 28 years old with an average gestational age of 25 weeks. Apart from that, it is known that the highest proportion of respondents' education was high school graduation (75%) and they were not currently working (82.3%).

### Univariate Analysis

The purpose of the analysis is to characterize the nature of each variable. The following table shows the univariate analysis.

**Table 2. Univariate Analysis Table Frequency Distribution of Variables**

Variable	Frequency (N)	Percentage (%)	CI 95%
<b>Knowledge</b>			
Not good	105	36.8	30.9 – 42.1
Good	180	63.2	57.9 – 69.1
<b>Attitude</b>			
Not good	3	1.1	0.0 – 2.5
Good	282	98.9	97.6 – 100
<b>Social support</b>			
Does not support	93	32.6	27.0 – 37.9
Support	192	67.4	62.1 – 73.0
<b>Vulnerability Perspective</b>			
Negative	35	12.3	8.4 – 16.1
Positive	250	87.7	83.9 – 91.6
<b>Facilities and infrastructure</b>			
Inadequate	169	59.3	53.3 – 64.9
Adequate	116	40.7	35.1 – 46.7
<b>Utilization of HIV Testing</b>			
Not Utilizing	149	52.3	46.3 – 58.2
Utilise	136	47.7	41.8 – 53.7

Based on the univariate analysis table above, the majority of respondents had good knowledge regarding HIV testing, namely 180 (63.2%) and the rest had poor knowledge, namely 105 (36.8%). Based on the table above, the majority of respondents had a good attitude towards HIV testing, namely 282 (98.9%) and a small percentage of respondents, namely 3 (1.1%). Based on the analysis table above, the majority of respondents received social support, namely 192 (67.4%) and some did not receive social support, namely 93 (32.6%). Based on the analysis table above, the majority of respondents assessed that they had a positive vulnerability perspective, namely 250 (87.7%) and the majority of respondents had a negative vulnerability perspective, namely 35 (12.3%). Based on the analysis table above, the majority of respondents assessed the facilities and infrastructure as inadequate, namely 169 (59.3%) and the remainder assessed the facilities and infrastructure as adequate, namely 116 (40.7%). Based on the analysis table above, the majority of respondents did not use HIV testing, namely 149 (52.3%) and some others had used HIV testing, namely 136 (47.7%).

### Bivariate Analysis

**Table 3. Bivariate Analysis Results with Chi-square test**

Factors	Utilization of HIV Testing				p-value	POR (95% CI)
	Not Utilizing		Utilise			
	N	%	n	%		

Commented [rhs1]: Cari nilai POR dari output SPSS

<b>Knowledge</b>								
Not good	74	70.5	31	29.5	285	100		3.299 (1.983 - 5.489)
Good	75	41.7	105	58.3	285	100	<b>0,000*</b>	
<b>Attitude</b>								
Not good	2	66.7	1	33.3	285	100		1.878 (0.168 - 20.940)
Good	147	52.1	135	47.9	285	100	1,000	
<b>Social Support</b>								
Does not support	90	96.8	3	3.2	285	100		69.153 (21.034 - 227.351)
Support	59	30.7	133	69.3	285	100	<b>0,000*</b>	
<b>Facilities and infrastructure</b>								
Inadequate	145	85.8	24	14.2	285	100		173.698 (58.609 - 514.782)
Adequate	4	3.4	112	96.6	285	100	<b>0,000*</b>	
<b>Vulnerability Perspective</b>								
Negative	25	71.4	10	28.6	285	100		2.134 (1.027 - 4.434)
Positive	124	49.6	126	50.4	285	100	<b>0,025*</b>	

The bivariate test results in the table above show that pregnant women who have good knowledge tend to make more use of HIV testing (58.8%), but on the other hand, the mother's good attitude is not enough or does not necessarily encourage mothers to take an HIV test (52.1%). On the other hand, evidence was obtained that social support from husbands and health workers encouraged pregnant women to make more use of HIV testing (69.7%). At the same time, it was also shown that the availability of facilities and infrastructure to support the program tended to encourage mothers to check their pregnancies with HIV tests (96.6%) and more than half of pregnant women who had a positive perspective on their own vulnerability encouraged mothers to undergo HIV tests. (50%).

Statistical results show that each factor of knowledge, social support, facilities and infrastructure and vulnerability perspective is proven to be related to the use of HIV testing by pregnant women (each  $p < 0.05$ ). Meanwhile, the attitude factor was found to be insignificant.

#### Multivariate Analysis

Table 4. Results of the Logistic Binary Regression Test on the Use of HIV Testing in Pregnant Women

Variable	B	Sig.	AOR	95% CI	
				Lower	Upper
Knowledge	1,022	0,032	2,778	1,091	7,073
Social support	3,194	0,000	24,378	5,743	103,481
Facilities and infrastructure	4,485	0,000	88,691	27,763	283,333
Perspective	-1,069	0,084	,343	,102	1,153
Constant	-3,829	0,000	,022		

- Abbreviations: AOR=adjusted odds ratio; CI=confidence interval.

- Nagelkerke R Square = 0.796

- Hosmer and Lemeshow Test ( $p=0.689$ )

Based on the results of the binary logistics test, it was found that support for facilities and infrastructure was the most dominant factor encouraging mothers to take an HIV test, where mothers who felt that the facilities and infrastructure of health facilities were adequate would be 88.7 times more likely to use an HIV test compared to mothers who felt that the facilities were adequate, and the infrastructure is not yet appropriate.

The multivariate results above also explain that the combination of factors, knowledge, social support, facilities and infrastructure as well as the perspective of pregnant women influences the use of HIV testing by pregnant women by 79.6%, while the other 20.4% is influenced by other factors.

#### The relationship between knowledge and utilization of HIV testing

The results of statistical tests that were carried out using chi square found a value of  $p = 0.000 < 0.05$ . This means that there is a relationship between respondents' knowledge of the benefits of HIV testing for pregnant women. Mothers who have good knowledge are more likely to make good use of HIV testing.

According to Notoatmodjo (2012). Knowledge can occur after people sense <sup>2</sup> particular object [15]. Without knowledge, a person has no basis for making decisions and determining actions regarding the problems faced [9]. The results of this research are in line with research that was conducted on pregnant women in the Langsat Health Center working area in Pekanbaru City in 2020 by carrying out HIV tests. It was

found that the results of this study found a P value = 0.010. This means that there is a relationship between pregnant women's knowledge of the use of HIV testing. In this study, it was also found that pregnant women who did not have good knowledge had a risk of 3.357 times not taking advantage of HIV testing. [17].

The results of this research found that pregnant women have good knowledge and can make good use of HIV testing because they search for good information on the internet and learn from social media that broadcast information about HIV and its impacts. When compared with research at the Langsat Community Health Center, pregnant women have good knowledge because during consultations, doctors provide knowledge and prevention so as not to contract HIV during pregnancy so they have better anticipation and level of knowledge compared to other pregnant women.

#### The relationship between social support and the use of HIV testing

The results of statistical tests that were carried out using chi square found a value of  $p = 0.000 < 0.05$ . This means that there is a relationship between social support among respondents and the use of HIV testing among pregnant women. Mothers who receive social support are more likely to make good use of HIV testing than those who do not receive social support. Husband's support for pregnant women is physical and psychological support given by the husband in the form of encouragement/motivation or encouragement and advice to pregnant women [18]. The results of this research are in line with research that was conducted on pregnant women in the Langsat Health Center working area in Pekanbaru City in 2020 by carrying out HIV tests. It was found that the results of this study found a P value = 0.002. This means that there is a relationship between social support and the use of HIV testing. In this study, it was also found that pregnant women who did not receive social support were 4.357 times more likely to risk not taking advantage of HIV testing at the Community Health Center. [16].

Based on the results of this research, it was found that most pregnant women took advantage of HIV testing because of information from their families and husbands regarding the dangers of HIV in pregnant women which could have an impact on the health of mothers and children. Apart from that, my husband also suggested it because he had received counseling regarding HIV transmission. This is in line with research at the Langsat Community Health Center which states that pregnant women who receive support from their husbands and families have extensive information regarding the importance of HIV testing during pregnancy. Therefore, social support greatly influences physical and mental health during pregnancy.

#### The relationship between facilities and infrastructure and the use of HIV testing

The results of statistical tests using the chi square test showed a value of  $p = 0.000 < 0.05$ , meaning, there is a significant relationship between facilities and infrastructure and the use of HIV testing. The results are in line with research conducted in the Medan Community Health Center working area, which obtained a p value =  $0.001 < 0.05$ , which means there is a significant relationship between facilities and infrastructure and the use of HIV testing. In addition, the study found that inadequate facilities and infrastructure had 8,706 times the risk of not taking advantage of HIV testing for pregnant women. Then, similar results were also found in research conducted at the Idi Rayeuk Health Center, East Aceh Regency in 2021, finding  $p=0.036 < 0.05$ . This means that there is a significant relationship between facilities and infrastructure and the use of HIV testing [18].

Based on the results of this research, it was found that the work area of the Deli Serdang community health center was considered inadequate because the infrastructure to the local health center was difficult and far to access, so many of the respondents chose to carry out HIV tests at the clinic rather than at the community health center. Then, there is no special room to carry out HIV testing on pregnant women, such as a separate room, so it is done at the health center registration area. Compared with previous research, it was also found that there was a shortage of laboratory space to check HIV test results. This causes pregnant women to assess that the health center still lacks adequate facilities and infrastructure.

#### The relationship between the vulnerability perspective and the use of HIV testing

Judging from the results of statistical tests using chi square, it was found that  $p=0.025 < 0.05$ . This means that the vulnerability perspective has a significant relationship with the utilization of HIV testing. This result is in comparison with previous research, it was found that in the Darul Aman health center working area, East Aceh Regency, when HIV AIDS screening was carried out on pregnant women, the p value was found to be 0.002. This means that there is a significant relationship between the perspective of vulnerability to HIV testing and the use of HIV testing during pregnancy [19].

The positive perspective in this research is more due to information being obtained more easily on various social media due to technology and the acceleration of globalization, especially for pregnant women and families. Pregnant women can easily access information regarding transmission and its impact on the health of the mother and baby. Media functions to help overcome many obstacles in a person's understanding, make it easier to convey material or health information and make it easier for the target/community to receive information [20]. Media is a tool (means) of communication such as newspapers, magazines, radio, television, films, posters and banners [21]. In addition, a positive perspective has an influence on a mother's actions to check and utilize the HIV tests provided in the health center health program.

#### CONCLUSION

From the results of this research it can be concluded that The conclusion of this study found that there was a relationship between the utilization of HIV testing by pregnant women with knowledge, attitudes, facilities and infrastructure as well as a vulnerability perspective. Together the factors of knowledge, social support, facilities and infrastructure as well as the perspective of pregnant women influence the use of HIV testing by pregnant women by 79.6%.

It is recommended that pregnant women increase their participation in the use of HIV testing to prevent transmission and the serious impact of HIV on the health of mothers and babies. It is recommended for pregnant women to actively seek information related to HIV as a prevention effort and to increase their insight in utilizing information related to HIV. It is recommended that Health officers in the working area of the Deli Serdang Community Health Center actively participate in providing information to the community, especially pregnant women, especially in areas far from the location of the Community Health Center.

**BIBLIOGRAPHY**

- [1] Kemenkes RI, "Infodatin HIV AIDS," *Kemeteri. Kesehat. Republik Indones.*, pp. 1–8, 2020.
- [2] R. Asmalia, E. Maulana, and L. Permatasari, "Perbandingan Jumlah Tes Hiv/Aids Ibu Hamil Pada Pemeriksaan K1 Dan K4," *J. 'Aisyiyah Med.*, vol. 5, no. 1, 2020, doi: 10.36729/jam.v5i1.323.
- [3] Direktur Jenderal P2P, "Laporan Perkembangan HIV AIDS & Penyakit Infeksi Menular Seksual (PIMS) Triwulan I Tahun 2021," *Kemeteri. Kesehat. RI*, vol. 4247608, no. 021, pp. 613–614, 2021.
- [4] T. M. Kun, "Karakteristik Ibu Hamil Dengan HIV-AIDS di Rumah Sakit Umum Pusat Haji Adam Malik Medan Tahun 2012-2016," p. 69, 2017.
- [5] Dinas Kesehatan Provinsi Sumatera Utara, "Profil Kesehatan Provinsi Sumatera Utara," *Dinas Kesehat. Provinsi Sumatera Utara*, pp. 1–422, 2020.
- [6] M. Tambunan, S. Sarumpaet, and Syarifah, "Factors Associated with the Use of HIV Screening in the PMTCT Program by Pregnant Women," *Int. Arch. Med. Sci. Public Heal.*, vol. 1, no. 3, pp. 1–12, 2020.
- [7] N. Maghfirah, *Faktor-Faktor Yang Berhubungan Dengan Rencana Pemanfaatan Pelayanan Persalinan Oleh Pasien Antenatal Care Di Rumah Sakit Muhammadiyah Taman Puring Tahun 2017*. 2017.
- [8] T. Siadari, "Program studi s1 kesehatan masyarakat fakultas kesehatan masyarakat universitas sumatera utara 2020," 2020.
- [9] Irwan, *Etika dan Perilaku Kesehatan*. 2017.
- [10] Z. A. Basith, "Faktor - faktor yang Berhubungan dengan Pemanfaatan Pelayanan Kesehatan di Puskesmas Gayamsari Kota Semarang," p. 67, 2019.
- [11] N. K. Arniti, L. P. L. Wulandari, and D. N. Wirawan, "Faktor-faktor yang Berhubungan dengan Penerimaan Tes HIV oleh Ibu Hamil di Puskesmas Kota Denpasar," *Public Heal. Prev. Med. Arch.*, vol. 2, no. 1, p. 63, 2014, doi: 10.15562/phpma.v2i1.125.
- [12] D. Ertiana, "DUKUNGAN PETUGAS TERHADAP PERILAKU KONSELING DAN TES HIV ( HUMAN IMMUNODEFICIENCY VIRUS ) IBU HAMIL HEALTHY SERVICE TO COUNSELING BEHAVIOR AND TEST HIV ( HUMAN IMMUNODEFICIENCY VIRUS ) PREGNANCY," vol. 9, no. 2, pp. 120–129, 2020.
- [13] H. Yuni, M. Andika, F. K. Masyarakat, U. Andalas, A. Kebidanan, and P. Andalas, "Determinan Perilaku Tes Hiv pada Ibu Hamil di Kota Padang Tahun 2019," vol. 5, no. May 2019, pp. 46–57, 2020.
- [14] S. F. Soli, T. P. Nadapdap, and R. S. Nasution, "Journal of Healthcare Technology and Medicine Vol . 7 No . 2 Oktober 2021 Universitas Ubudiyah Indonesia ANALISIS FAKTOR YANG MEMPENGARUHI KEIKUTSERTAAN IBU HAMIL DALAM MELAKUKAN SKRINING HIV / AIDS DI WILAYAH KERJA UPT PUSKESMAS STABAT LAMA Analysis of F," vol. 7, no. 2, pp. 1439–1451, 2021.
- [15] S. Dinyanti, "Digital Repository Repository Universitas Universitas Jember Jember Digital Digital Repository Repository Universitas Universitas Jember Jember," *Digit. Repos. Univ. Jember*, no. September 2019, pp. 2019–2022, 2021.
- [16] K. Pati and J. Tengah, "Kerentanan Perempuan Terhadap Penularan HIV & AIDS :," *Palastren*, vol. 6, no. 1, pp. 185–200, 2013.
- [17] W. Milayanti, "Faktor Yang Berhubungan Dengan Upaya Ibu Hamil Dalam Pencegahan Penularan Hiv Dari Ibu Ke Anak Di Wilayah Kerja Puskesmas Jumpandang Baru Kota Makassar," 2018.
- [18] Fauziani, Thomson, and M. Elisa, "Faktor-Faktor Yang mempengaruhi ibu hamil dalam pemeriksaan HIV di Puskesmas IDI Rayeuk Kabupaten Aceh Timur," *Healthc. Technol. Med.*, vol. 7, no. 1, pp. 352–363, 2020.
- [19] A. W. Nainggolan, S. Lumbanraja, and J. T. Sibero, "Faktor yang Memengaruhi Skrining HIV/AIDS pada Ibu Hamil di Puskesmas Darul Aman Kabupaten Aceh Timur Tahun 2020," *J. Healthc. Technol. Med.*, vol. 7, no. 1, pp. 335–351, 2020.

2021.

- [20] L.- Maydianasari and E.- Ratnaningsih, "Analisis Kebutuhan Media Promosi Kesehatan Layanan Provider Initiated Testing and Counseling (PITC) bagi Ibu Hamil," *J. Kesehat. Vokasional*, vol. 6, no. 1, p. 1, 2021, doi: 10.22146/jkesvo.61700.
- [21] D. Mahendra, "Buku Ajar Promosi Kesehatan," *Progr. Stud. Diploma Tiga Keperawatan Fak. Vokasi UKI*, pp. 1–107, 2019.



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