

Analysis of Pregnant Women's Participation in Covid-19 Vaccination at Cilamaya Health Centre

Shinta Novelia¹, Siti Syamsiah¹, Siti Herawati Widyasafitri Salim¹

¹Department of Midwifery, Faculty of Health Sciences,
Universitas Nasional, Jakarta, Indonesia

Correspondence should be addressed to:
Shinta Novelia
shinta.novelia@civitas.unas.ac.id

Abstract:

Pregnant women are included in a group that is vulnerable to COVID-19. The maternal mortality rate in Karawang Regency had touched the highest data in West Java in 2021 as many as 117 cases, with 48 cases (41%) of deaths caused by Covid-19. The low number of vaccinations for pregnant women at the Cilamaya Health Center at dose 1 was 54 people (41.17%), dose 2 was 30 people (22%), and dose 3 was 20 people (14.7%). This study aims to determine the relationship between knowledge and the participation of pregnant women in the covid-19 vaccination program, the relationship between family support and the participation of pregnant women in the covid-19 program, and the relationship between anxiety and the participation of pregnant women in the covid-19 program at the Cilamaya Health Center. This research is an analytic observational study with a cross-sectional approach. The sample of this research is 117 pregnant women, taking the total sampling. The instrument for data collection is the Observation Sheet. Data analysis used the Chi-square statistical test with an α value of 5% ($\alpha = 0.05$). Based on statistical tests, there is a relationship between knowledge of pregnant women p-value $0.003 < 0.05$, a relationship between family support p-value $0.00 < 0.001$, and no relationship to anxiety p-value $0.406 > 0.05$. A significant relationship exists between the mother's knowledge and family support in participating in the Covid-19 vaccination program at the Cilamaya Health Center. It is hoped that pregnant women who have not participated in the Covid-19 vaccination can participate in the Covid-19 vaccine.

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INTRODUCTION

Corona Virus Disease (COVID-19) emerged from a group of human pneumonia cases in Wuhan City, China, at the end of December 2019. Global trends recorded a spike in cases at the end of 2021 of 70.48%, with the highest peak of additional cases occurring in mid-January 2022 with 440 million cases. And conditions have started to improve, with a decrease in cases of 68.94% at the end of February 2022. As of 31 December 2022, 13,107,022,929 vaccines have been administered (WHO, 2022). Research is needed to explore the participation in covid-19 vaccination among pregnant women.

The Covid-19 vaccination rate in Indonesia with a total target of 234,666,020 people, at dose 1 totaled 204,184,380 people (87.01% of the national target), dose 2 amounted to 175,010,804 people (74.58% of the national target), dose 3 totaling 69,215,619 people (29.50% of the Provincial target) and dose 4 totaling 1,234,896 people (5.36% of the Provincial target) (Ministry of Health, 2022). The Covid-19 vaccination rate in West Java at dose 1 totaled 36,777,381 people (86.31% of the provincial target), dose 2 amounted to 32,561,151 people (76.42% of the provincial target),

dose 3 totaled 15,693,945 people (36.83% of the Provincial target) and dose 4 totaling 154,451 people (4.30% of the Provincial target) (Ministry of Health, 2022).

The Covid-19 vaccination rate in Karawang Regency at dose 1 was 1,835,078 people (76.8%), dose 2 was 1,601,738 people (67%), dose 3 was 702,508 people (29.4%), dose 4 was 5,493 people (0.022) (Ministry of Health, 2022) with a total target of 2,388,312 people (Central Bureau of Statistics Karawang 2022). The Covid-19 vaccination rate at the Cilamaya Health Center at dose 1 amounted to 29,395 people (73.95%), dose 2 amounted to 22,352 people (56.23%), dose 3 amounted to 5,277 people (13.27%) and dose 4 amounted to 28 people (0.7%). While the vaccination rate for pregnant women at the Cilamaya Health Center at dose 1 amounted to 54 people (41.17%), dose 2 amounted to 30 people (22%), and dose 3 amounted to 20 people (14.7%) (Cilamaya Health Center, 2023). The maternal mortality rate in Karawang Regency had touched the highest data in West Java in 2021 as many as 117 cases, with 41% of cases of death caused by Covid-19. While data on the maternal mortality rate in 2022 in Karawang district, there are 29 cases (data for January - August) (Barat, DPJ., 2018). Pregnant women are a vulnerable population with a higher risk of serious illness, morbidity, and mortality than the general population.

There are immunological and physiological changes during pregnancy that increase the risk of more severe respiratory diseases than respiratory diseases. Therefore, pregnant women are a vulnerable population to being infected with COVID-19 (Oktaviani, Kundaryanti & Novelia, 2022). Pregnant women who are susceptible to being infected with COVID-19 are 13.7% higher than those who are not pregnant. It is feared that this will impact the condition of the mother and baby, such as the occurrence of preterm birth, preeclampsia, birth by cesarean section, to perinatal death (Ministry of Health, 2022). This study aims to determine the relationship between knowledge and the participation of pregnant women in the co-19 vaccination program, the relationship between family support and the participation of pregnant women in the covid-19 program, and the relationship between anxiety and the participation of pregnant women in the covid-19 program at the Cilamaya Health Center.

METHOD

The research design used analytic observational with a cross-sectional approach. The sampling technique in this study was total sampling, and data collection was carried out by interviewing using a questionnaire and the HARS scale. The population and sample in this study were pregnant women with a gestational age of 13-33 weeks; the total population was 117. The sample was recruited purposively. Data analysis was carried out using the Chi-Square test to test the relationship between two nominal variables and measure the strength of the relationship between one variable and another (Arikunto, 2019).

RESULT

Table 1. An Overview of Respondents (n=117)

Variables	Frequency	Percentage
Covid-19 Vaccination Participation		
Yes	70	59.8
No	47	40.2
Knowledge Level regarding Covid-19 Vaccination		
High	69	59.0
Low	48	41.0
Family Support		
Good	44	37.6
Less	73	62.4
Anxiety Level		
No anxiety	102	87.2
Mild	15	12.8
Moderate	0	0
Severe	0	0
Panic	0	0

Based on Table 1, out of 117 respondents, most respondents had not done the vaccine, which is 70 respondents (59.8%). most respondents, 69 respondents (59%), had good knowledge about Covid-19. most respondents, 73 respondents (62.4%), had less family support regarding Covid-19. Most respondents, 102 (87.2%), did not experience anxiety about Covid-19.

Table 2. Relationship Between Knowledge Level regarding Covid-19 Vaccination, Family Support, Anxiety Level, and Covid-19 Vaccination Participation (n=117)

Variable	Covid-19 Vaccination Participation				Total		p-value
	Yes		No		n	%	
	n	%	n	%			
Knowledge Level regarding Covid-19 Vaccination							
High	36	52.2	33	47.8	69	100	0.003
Low	11	22.9	37	77.1	48	100	
Total	47	40.2	70	59.8	117	100	
Family Support							
Good	27	61.4	17	38.6	44	100	0.001
Less	20	27.4	53	72.6	73	100	
Total	47	40.2	70	59.8	117	100	
Anxiety Level							
No anxiety	39	38.2	63	61.8	102	100	0.406
Mild	8	53.3	7	46.7	15	100	
Total	47	40.2	70	59.8	117	100	

Based on Table 2, out of 69 respondents who had good knowledge, most respondents, 36 respondents (52.2%) had taken the Covid-19 vaccine. Of the 48 respondents with less knowledge, most respondents, namely 37 respondents (77.1%), had not taken the Covid-19 vaccine. The analysis using the chi-square test obtained a p-value of 0.003 ($p < 0.05$), meaning that H_0 was rejected. This shows that there is a relationship between knowledge and participation in the Covid-19 vaccine in pregnant women in the working area of the UPTD Cilamaya Health Center, Karawang Regency.

Out of 73 respondents with less family support, most respondents, 53 respondents (72.6%) had not taken the Covid-19 vaccine. Of the 44 respondents with good knowledge, 27 (61.4%) had taken the Covid-19 vaccine. The analysis using the chi-square test obtained a p-value of 0.001 ($p < 0.05$), meaning that H_0 was rejected. This shows a relationship between family support and the behavior of the Covid-19 vaccine in pregnant women at the Cilamaya Public Health Center, Karawang Regency.

Out of 102 respondents who had no anxiety, most respondents, 63 respondents (61.8%) had not had the Covid-19 vaccine. out of the 15 respondents with mild anxiety, 8 respondents (53.3%) had not received the Covid-19 vaccine. The analysis using the chi-square test obtained a p-value of 0.406 ($p > 0.05$), meaning that H_0 is accepted. This shows that there is no relationship between anxiety and the participation of the Covid-19 vaccine in pregnant women in the working area of the UPTD Cilamaya Health Center, Karawang Regency.

DISCUSSION

The Relationship between Knowledge and Participation in Covid-19 Vaccination

Based on the study's results, it can be concluded that out of 117 responses, 69 respondents (59%) had good knowledge, and 36 respondents (52.2%) had already received the Covid-19 vaccine. Out of the 48 respondents with less knowledge, most respondents, 37 respondents (77.1%) had not taken the Covid-19 vaccine. The analysis using the chi-square test obtained a p-value of 0.003 ($p < 0.05$), meaning that H_0 was rejected. This shows that there is a relationship between knowledge and participation in the Covid-19 vaccine in pregnant women in the working area of the UPTD Cilamaya Health Center, Karawang Regency.

Knowledge results from knowledge that occurs after someone has sensed a particular object. Knowledge is a facilitating factor (predisposing factor) for implementing the Covid-19 vaccine. This factor becomes a trigger for behavior that forms the basis or motivation for action due to tradition or habits, beliefs, educational level, and socioeconomic level. Increased knowledge will provide significant results to improve behavior. Knowledge/cognition is a very important domain for forming behavior, and behavior based on knowledge will last longer than behavior not based on knowledge (Notoatmodjo, 2015).

Research that has been conducted by Mutia (2021) with the title factors related to people's interest in taking part in the covid-19 vaccination program, the better the knowledge of the respondents, the higher the possibility of respondents' interest in taking part in the covid-19 vaccination, and vice versa the less knowledge, the more likely it is the lower the interest in participating in the covid-19 vaccination. Research that has been conducted by Solihatin (2021) on the factors that influence the coronavac controversy in the Jaddih Village community, from these results it can be concluded that there is an influence between knowledge and behavior of the Covid-19 vaccine (Mutia, 2021).

According to the assumptions of researchers by looking at the results of research on the knowledge of pregnant women about Covid-19 conducted at the Cilamaya Health Center, Karawang Regency, there is an influence between knowledge and participation in the Covid-19 vaccine, the less knowledge of pregnant women has about Covid-19, the lower the participation of pregnant women in Covid-19 vaccine. Future research can focus on the factors that affect the level of knowledge of pregnant women about Covid-19 by participating in the Covid-19 vaccination. This research can be used as an initial reference by adding variable sources of information that pregnant women often receive. By analyzing how information about Covid-19 is conveyed and how pregnant women receive this information.

The Relationship between Family Support and Participation in Covid-19 Vaccination

Based on the study results, it can be concluded that out of 117 respondents, out of 73 respondents with less family support, most respondents, 53 respondents (72.6%), had not done the Covid-19 vaccine. Out of the 44 respondents who had good family support, most respondents, 27 respondents (61.4%) had taken the Covid-19 vaccine. The analysis using the chi-square test obtained a p-value of 0.001 ($p < 0.05$), meaning that H_0 was rejected. This shows a relationship between family support and the behavior of the Covid-19 vaccine in pregnant women at the Cilamaya Public Health Center, Karawang Regency.

Family support is each family member's attitude, actions, and acceptance. Family members perceive supportive people as always ready to provide help and advice. Research conducted (Tri, 2022) on the relationship between family support and Participation in the co-19 vaccine in this study can be concluded that there is a relationship between family support and co-19 vaccine participation. According to the researchers' assumptions, there is an influence between family support and the participation of the covid-19 vaccine in pregnant women because family support is one of the components that shape behavioral tendencies; family support makes it easier to change the behavior of the covid-19 vaccine in pregnant women. The research results in the field show that poor family support has caused many pregnant women not to have had the Covid-19 vaccination.

Future research can educate families to understand the importance of the Covid-19 vaccination for pregnant women because the family plays an important role in shaping views and perceptions because pregnant women who receive family support will consider the benefits of the Covid-19 vaccine for themselves and their fetuses. Adding variables that can influence a pregnant woman's decision to vaccinate covid-19.

The Relationship Between Anxiety and Participation in Covid-19 Vaccination

Based on the study's results, it can be concluded that out of 117 respondents, 102 respondents had no anxiety, and most respondents, 63 respondents (61.8%), had not had the Covid-19 vaccine. Of the 15 respondents with mild anxiety, 8 (53.3%) had not received the Covid-19 vaccine. The analysis using the chi-square test obtained a p-value of 0.406 ($p > 0.05$), meaning that H_0 is accepted. This shows that there is no relationship between anxiety and the participation of the Covid-19 vaccine in pregnant women in the working area of the UPTD Cilamaya Health Center, Karawang Regency.

Anxiety is a psychological disorder with characteristics such as worry or fear that can cause loss of concentration and even loss of interest in daily activities. Anxiety in pregnant women is related to a worry that is unclear about a condition with a non-specific object (Ani, 2022). The results of this study are different when compared to the previous ones. Research that has been conducted by Vani (2021) with the title the influence of the Covid-19 Pandemic on the Level of community anxiety in the Bantaian Hilir Village, Rokan Hilir Regency, the research results have a significant effect on the level of community anxiety, in research that has been conducted by Kirana (2021) with the title anxiety the public will be vaccinated against Covid-19 with the results of the study showing that there is a relationship between willingness to vaccinate and anxiety and in research that has been conducted by Anisa (2022) with the title factors related to the participation of Covid-19 vaccination in pregnant women at PMB Midwife Christina City Depok 2021 that the research results show that there is a relationship between the anxiety of pregnant women and participation in the Covid-19 vaccination.

According to the researchers' assumptions, based on the score results using the HARS scale, it is known that there is no anxiety for pregnant women due to adaptation and differences in the stages or phases of the pandemic. Different stages or phases of the Covid-19 pandemic can cause a decrease in anxiety levels due to psychological adaptation. In the early stages of the Covid-19 pandemic, pregnant women experienced considerable pressure due to limited space for movement. Future research can focus on the factors that affect anxiety in pregnant women who take the covid-19 vaccination. And conduct studies comparing the participation rates of co-19 vaccinations in cities and rural areas.

CONCLUSION

Most pregnant women in the work area of the Cilamaya Health Center, Karawang Regency have a good level of knowledge and lack family support. Almost all of them did not experience anxiety (87.2%). There is a relationship between knowledge of pregnant women and vaccination participation at the Cilamaya Health Center, Karawang district, there is a relationship between family support for pregnant women and vaccination participation at the Cilamaya Health Center, Karawang district, and there is no relationship between the anxiety of pregnant women and vaccination participation at the Cilamaya Health Center, Karawang district. Participation in covid-19 vaccination is very crucial to ensure Covid-19 diseases would not infect pregnant women.

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CONFLICT OF INTEREST

There is no conflict of interest in conducting this study.

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