

PREGNANT WOMEN'S READINESS DURING THE COVID-19 PANDEMIC

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ABSTRACT

A category of people who are susceptible to COVID-19 infection is pregnant women. The safety of the mother and fetus can be determined in large part by how prepared pregnant women are to give birth. Pregnant women who are mentally and physically prepared for childbirth can have a healthy delivery that includes the removal of the baby, placenta, and membranes. The purpose of this study is to investigate how prepared expectant mothers felt for childbirth during the COVID-19 epidemic. This study employs a qualitative methodology and phenomenology. In this study, 11 informants participated. Face-to-face interviews and semi-structured video were employed in the data collection process. According to the study's findings, there were five key elements in pregnant women's preparedness for childbirth during the COVID-19 pandemic: 1) worry about COVID-19 exposure, 2) keeping healthy throughout the COVID-19 pandemic, 3) adhering to our ancestors' culture, 4) preparing for a safe and comfortable delivery, and 5) receiving the best medical facility services. Pregnant women must maintain their health and carefully arrange their deliveries. Health facilities are crucial in assisting expectant mothers with labor preparation, particularly during the pandemic. During the COVID-19 pandemic, telehealth may be employed as a substitute method of reaching pregnant women.

Keywords: Childbirth Preparedness, COVID-19, Pregnant women

ABSTRAK

Ibu hamil merupakan kelompok yang berisiko terinfeksi COVID-19. Kesiapan ibu hamil untuk melahirkan merupakan indikator penting keselamatan ibu dan janin. Kesiapan persalinan adalah ketika ibu hamil mempersiapkan diri baik fisik maupun mental agar proses persalinan yaitu pengeluaran bayi, plasenta, dan selaput ketuban dapat berjalan dengan lancar. Penelitian ini bertujuan untuk menggali pengalaman kesiapan ibu hamil menghadapi persalinan di masa pandemi COVID-19. Penelitian ini menggunakan metode kualitatif dengan pendekatan fenomenologis. Informan dalam penelitian ini berjumlah 11 orang. Metode pengumpulan data menggunakan video semi terstruktur dan wawancara tatap muka. Temuan penelitian mengungkapkan ada lima tema utama kesiapan ibu hamil menghadapi persalinan di masa pandemi COVID-19: 1) kecemasan terpapar COVID-19, 2) menjaga kesehatannya selama pandemi COVID-19, 3) mengikuti budaya nenek moyang, 4) mempersiapkan persalinan yang aman dan nyaman, dan 5) pelayanan fasilitas kesehatan yang optimal. Ibu hamil perlu menjaga kesehatan dan harus merencanakan persalinan dengan cermat. Fasilitas kesehatan berperan penting dalam membantu ibu hamil mempersiapkan persalinan, terutama di masa pandemi. Telehealth bisa menjadi pilihan alternatif yang bisa digunakan untuk menjangkau ibu hamil di masa pandemi COVID-19.

Kata kunci: COVID-19, Ibu Hamil, Persiapan Persalinan

INTRODUCTION

Pregnant women are one of the groups who are at risk or vulnerable to exposure to COVID-19. During pregnancy, there are a number of physiological changes, disruptions of bodily systems, and modifications to immune activities (Dashraath et al., 2020). Pregnant women are more vulnerable to infection as a result of these changes in the immune system, which result in decreased lymphocytes and a rise in several pro-inflammatory cytokines (Phoswa and Khaliq, 2020)..

Pregnancy during the COVID-19 pandemic appears to feel very different from pregnancies under regular circumstances. During the pandemic, pregnant women tend to feel afraid of the unknown, experience disruptions in routine and social life, worry about the possibility of being exposed to COVID-19 infection and the health of their children and husbands, lack of support from health workers, and lack of visits by pregnant women for ANC because fear of exposure to infection (Karavadra et al., 2020; Mizrak Sahin and Kabakci, 2020; Moyer et al., 2020a; Goyal et al., 2021a).

Compared to non-pregnant women, pregnant women are more likely to have a more severe COVID-19 infection. According to a study, pregnant women are three times more likely than non-

pregnant women to experience major COVID-19 illness complications (Oakes et al., 2021). Research demonstrates this claim, showing that 1 in 4 women hospitalized for COVID-19 are pregnant women (Delahoy, 2020).

The health of COVID-19-infected pregnant women is negatively impacted. Pregnant women most frequently experience mental health issues, mothers who are at risk of giving birth via Caesarean section, an increase in the typical number of pregnant women receiving care in the intensive care unit (ICU), mothers who are at high risk of giving birth to preeclampsia, and miscarriage (Parazzini et al., 2020; Chi, Gong, and Gao, 2021; Papapanou et al., 2021). Premature membrane rupture, low birth weight, and risk of infection spreading to the fetus are all present in newborns and fetuses, respectively (Galang et al., 2020; Smith et al., 2020). According to the World Health Organization (2020), 1 in 4 newborns born to pregnant women with COVID-19 are preterm. Additionally, a research found that all infants born to moms who had COVID-19 received NICU care (Akhtar et al., 2020).

By lowering mortality and morbidity in pregnant women and newborns, childbirth preparation is one of the strategies used to promote maternal and child health (Soubeiga et al., 2014; Thomson, Owen, and Magowan, 2014). Maternal preparedness is used to assist expectant women in taking into account all healthcare options available throughout their pregnancy as well as any potential difficulties (Azeze, Mokonnou, and Kercho, 2019). According to research, preparing for childbirth has many advantages for expectant mothers and their families, including a sense of control, therapeutic benefits, the ability to remember important details, effective communication, a sense of being more prepared, and the ability to handle a variety of unforeseen events (Cortezzo, Bowers, and Cameron Meyer, 2019).

Preparing pregnant women for delivery is still not a common practice. Lack of ANC visits, husband knowledge, area of residence, media exposure, receiving home visits from health workers, mother's occupation, history of stillbirth, age, history of giving birth in health facilities, family type, number of children, maternal knowledge, and cultural beliefs are some of the factors that contribute to the low practice (Berhe et al., 2018; Gesese & Tirfe, 2020; Gudeta & Regassa, 2019; Limenih et al., 2019; Moinuddin et al., 2017; Silwal et al., 2020; Teekhasaenee & Kaewkiattikun, 2020).

Since the COVID-19 pandemic, the majority of conversations and even maternal research has concentrated on pregnancy difficulties in affected women and the potential for mother-to-child transmission. The experiences of pregnant women during the COVID-19 pandemic have so far been the subject of various studies (Mizrak Sahin & Kabakci, 2020; Mortazavi & Ghardashi, 2021). There hasn't been any research done yet on pregnant women's preparation for childbirth during the COVID-19 pandemic. Therefore, the purpose of this study was to comprehend pregnant women's experiences as they prepared for pregnancy during the COVID-19 pandemic.

METHOD

Design

To investigate the experiences of pregnant women in preparing for childbirth during the COVID-19 pandemic, this study used a qualitative phenomenological approach. Consolidated Criteria for Reporting Qualitative Research (COREQ) was used in this study's reporting (Tong, Sainsbury, and Craig, 2007). This research was done at the North Minahasa Regional Community.

Setting and sample

This study was conducted At the North Minahasa Regional Community and was carried out between November 2021 and January 2022. For the purpose of choosing the informants, a purposive sample strategy was used. This study involved a total of 11 pregnant women, with the inclusion criteria being informants from the original North Minahasa and informants who adhered to the Minahasa culture. The pregnant women had varying gestational ages from trimesters I, II, and III, high and low educational backgrounds, and different religious affiliations. While informants with any illnesses were excluded from the study.

Table 1.

Participant's characteristic

Participant	Age	Education	Gestational Age	Religion	Occupation
I1	26	Bachelor	24	Non-Muslim	Housewife
I2	25	Bachelor	13	Muslim	Housewife
I3	26	Bachelor	16	Non-Muslim	Employee
I4	21	High School	26	Non-Muslim	Housewife
I5	33	High School	24	Non-Muslim	Housewife
I6	32	Bachelor	16	Non-Muslim	Teacher
I7	27	Bachelor	19	Non-Muslim	Housewife
I8	30	Bachelor	29	Non-Muslim	Teacher
I9	27	High School	3	Non-Muslim	Housewife
I10	27	High School	24	Non-Muslim	Housewife
I11	25	High School	12	Non-Muslim	Housewife

Data collection

This study has received approval from the Health Research Ethics Committee of Aisyiyah University, Yogyakarta with ethical exemption No.1362/KEP-UNISA/I/2021. The researcher had communicated with the informants in advance to inform the informed consent, objectives, and research procedures directly. Semi-structured interviews were utilized in this study. The interview criteria have been approved by doctors, nurses, and midwives who are specialists in maternity care. Face-to-face and video interviews are conducted, and the time and location are determined by the informant's scheduled appointment. In order to gather information about pregnant women who were willing to take part in this study, the researchers worked with nurses or midwives at the health facility in the North Minahasa district. The researcher promptly scheduled an interview with the informant after receiving their contact information. Nursing students who have received interviewing training and knowledge of informant culture helped the researcher. All interviews conducted over video calls were captured in both audio and video, however all in-person interviews were only captured in audio. Field observations about the environmental circumstances are directly documented in field notes by observing the informants' actions and facial expressions.

Data analysis

Validity and reliability are used in qualitative research to demonstrate the degree to which informant-collected data has been interpreted in accordance with researchers' descriptions of an event, where the dependability of the data is typically multiple, constantly shifting, and inconsistent. By verifying information and ensuring the validity of the data in qualitative research, researchers have tested the validity and reliability. These methods include 1) credibility (fostering relationships with informants, member checking, and discussing with experts), 2) transferability (researchers make clear, detailed reports and decompose systematically and can be trusted so that readers can understand so that the results of the research can be applied to other places), and 3) dependability (the researchers' research procedures were reviewed by the team and put to the test by examiners to

guarantee the veracity of the information gathered). The tracks are recorded using NVIVO. 4) Confirmability (re-examination of the data collected through the application of various procedures, such as boosting persistence, triangulation, peer discussion, and the use of reference materials).

RESULTS AND DISCUSSION

Five themes emerged from the data analysis as explanations for pregnant women's preparation for childbirth during the COVID-19 pandemic. Table 2 summarizes the major themes that were identified as being stress about COVID-19 exposure, maintaining health during pregnancy during the COVID pandemic, planning safe and secure deliveries, adhering to ancestral culture as a form of maternal and fetal protection, and best and high-quality health services.

Themes 1: Worry about COVID-19 exposure

Pregnant women who are getting ready to give birth during the epidemic sometimes worry about coming into contact with COVID-19. This topic is composed of five sub-themes: fear of social contact, fear of contracting an illness from others, fear of the tools used for the examination, fear of taking public transportation, and fear for the fetus's health.

“Because pregnant women are more vulnerable to infection at this time, I'm concerned that we can't leave the house without restriction. (Participant 3)”

“I heard there were already infected yesterday in this part of the area, which is why I was so eager to go for a pregnancy checkup at the community health center”. (Participant 9)

Themes 2: Keeping healthy throughout the COVID-19 pandemic

Pregnant women's personal health as well as the health of the fetus must be maintained during the epidemic. This subject is made up of five sub-themes, including reducing covid exposure and strengthening one's mind and body.

“Well, that's simply eating regularly and choosing good foods because I don't want to compromise the fetus's ability to develop. Every day, eat wholesome meals and drink milk. Yes, even if you occasionally feel sick to your stomach after eating, try to keep the fetus healthy by drinking pregnant milk, eating fruit, occasionally engaging in pregnancy-safe exercise like watching gymnastics videos on YouTube, going for a morning stroll, and taking vitamins”. (Participant 4)

Themes 3: Adhering to our ancestors' culture

Cultural or ancestral influences frequently have an impact on how prepared expectant mothers are for childbirth. Two taboos (helpful and harmful to expectant mothers) and religious rites make up the theme of adolescent culture.

“There are still deft beings here who do that, but for some reason, pregnant women are more concerned with taking care of themselves than that. If there has been prayer water for more than three months, it can come from individuals who are accustomed to drinking water from someone who looks like ustad.” (Participant 2)

Themes 4: Preparing for a safe and comfortable delivery

The health of the mother and fetus later on is highly impacted by pregnant women who prepare for childbirth safely and comfortably. There are six subtitles under this theme, including financial

planning, delivery venue, delivery method, birth attendants, infant gear, and donors.

“My family and I intend to give birth using health insurance, such as doing so in a clinic or hospital that accepts it. Set aside money for other needs. For religious ceremonies like aqiqah, we also prepare goats “.(Participant 2).

“I'm worried that I already experience pain when I try to give birth naturally but ultimately I need surgery.” (Participant 7)

Themes 5: Receiving the best medical facility services

Pregnant women's health is significantly impacted by healthcare facilities. The availability of medical facilities and staff to provide prenatal care is a subtheme of the larger theme of optimal health facility services.

“Everyone wears masks, the seats are far apart, the beds are made of plastic, midwives are there, and all the equipment, including the blood pressure monitors, is cleaned every time someone changes. There is even equipment for weighing newborns, although it is only used sometimes. When I visit the hospital, I'm hoping that pregnant women will have a separate entrance so they don't mix with other patients.” (Participant 3)

Table 2.

Theme Category

No	Theme	Subtheme
1	Worry about COVID-19 exposure	Anxiety about activities outside the home, anxiety about being infected by other people, anxiety about the examination equipment used, anxiety about using public transportation, and anxiety about the health of the fetus.
2	Keeping healthy throughout the COVID-19 pandemic	Strengthen physical, strengthen mental, ANC Examination, apply health protocols, and increase knowledge
3	Adhering to our ancestors' culture	Taboo and religious ritual
4	Preparing for a safe and comfortable delivery	Financial preparation, place of delivery, kind of delivery, birth attendant, baby equipment, and blood donors
5	Receiving the best medical facility services	Readiness of health facilities and health workers in providing health services to pregnant women

Global worry has been raised by the COVID-19 pandemic epidemic. A lot of people are terrified of coming into contact with the coronavirus, especially pregnant women who are one of the virus's most susceptible populations. The findings of this study suggest that some expectant mothers occasionally experience anxiety over being exposed to COVID-19 as they are ready to give birth. Other studies that show that pregnant women's anxiety levels are higher during the pandemic than they were before the COVID-19 pandemic confirm this findings (Moyer et al., 2020b; Pascarella et al., 2020).

Untreated pregnancy-related anxiety can be harmful to the mother, the fetus, and the developing child. Increased cortisol levels, pro-inflammatory cytokines, obstetric issues, and cesarean sections

are just a few of the effects of anxiety on pregnant women (Field, 2017). Premature births, low birth weights, low APGAR scores, recurrent respiratory infections, and developmental difficulties such as cognitive, behavioral, self-regulating, and emotional issues later in life are some of the effects on the fetus or newborn (Mongan et al., 2019; Graham et al., 2021).

The immune system of pregnant women continues to stabilize hormonal balance from the first stages of pregnancy through the third trimester, making them one of the populations most susceptible to COVID-19 infection and suffering severity (Hasnain et al., 2020; Vouga et al., 2021). The body naturally activates a developed immune system that contains a variety of specialized cell types, chemicals, and functional responses to protect the body from harmful organisms (Medina, 2016; Calder, 2020). Macronutrients (carbohydrate, milk, and protein) and micronutrients (Vitamin A, B complex, C, D, E, and minerals such as iron, selenium, and zinc) are important for boosting immunity and play an important role in preventing COVID (Cancelo Hidalgo, 2019; Mousa, Naqash and Lim, 2019; Nawsherwan et al., 2020; Akhtar et al., 2021; Shakoor et al., 2021). Also, exercise is a modulator to improve the immune system that can prevent the transmission of COVID-19 (da Silveira et al., 2021; Vancini et al., 2021).

This study discovered that a spiritual support network can enhance a pregnant woman's mental health. In particular during a pandemic, social support helps keep pregnant women's mental health in check (Khoury et al., 2021). According to research (Cheng et al., 2016), unsupportive husbands may make pregnant women more anxious and depressed. According to Demir and Yldrm (2019), religious convictions influence pregnant women's perceptions toward fetal health. According to Matthews et al. (2017), one of the alternative therapies that is frequently used to alleviate depression in pregnant women is prayer.

The findings of this study suggest that performing regular ANC checks is one of the crucial things to keep pregnant women's health. According to studies (Dongarwar et al., 2021) ANC offers pregnant women some degree of health protection throughout the pandemic. According to several informants, the pandemic caused a decrease in ANC visits. A study that demonstrated that ANC visits during the pandemic were decreased because of lockdown and pregnant women were worried to contract the infection supports the findings of this study (Goyal et al., 2021b). Due to its ease and cost-effectiveness, online ANC can assist deliver reasonably priced medical services, alleviate health care inequities, and minimize COVID-19 infection transmission (Chu et al., 2020; Lotfi, Hamblin, and Rezaei, 2020).

Pregnant women's behavior is frequently influenced by their degree of education. According to research, pregnant women who lack awareness do not avoid behaviors such as passive smoking, alcohol use, and obesity that are very likely to result in pregnancy-related health issues (Esposito et al., 2015). Pregnant women may easily find health information on the internet and social media thanks to technological advancements. Digital maternal health education is a great way for pregnant women to learn more and change their behavior (Calvert et al., 2021). Applications and the internet can help pregnant women take better care of themselves, which lowers expenditures and lessens the number of times they need to visit the hospital (Kaaya, Ko, and Luhanga, 2021).

Pregnant women's behavior is highly influenced by cultural ideas. The findings of this study are further reinforced by family remarks that claim pregnant women are offered counsel or prohibitions based on ancient cultural practices for the welfare of the mother and fetus. Hereditary ideas about food, including the kinds of foods, eating patterns, eating habits, and taboo behaviors that can or cannot be engaged in, are frequently used (Withers et al., 2018; de Diego-Cordero et al., 2021). According to Chakona and Shackleton (2017) and Ulloa Sabogal and Muoz de Rodriguez (2019), cultural heritage takes the shape of ideas, values, myths, and rituals that work to ensure the protection of the mother and the fetus by, for example, preventing impairment.

Undoubtedly, expecting mothers and their families hope for a safe and comfortable delivery. The findings indicated that preparations needed to be made about finances, delivery location, delivery style, birth attendant, infant gear, and donors. The goal of birth planning is to encourage the timely use of skilled mother and newborn health care (Debelie et al., 2021). Another study revealed that there are several ways to prepare for labor, including becoming aware of the danger signs of pregnancy, using government-provided transportation services, receiving financial aid through a government program, finding skilled birth attendants, choosing transportation options, choosing delivery locations, and making arrangements for emergency blood donations (Hailu et al., 2011; Akshaya and Shivalli, 2017; Shukla et al., 2019).

During this pandemic, health facilities' preparedness to offer prenatal care is unquestionably different. Pregnant women and healthcare workers are protected from infection by health services, especially during a pandemic, according to research (Baena-Antequera et al., 2020). Obviously, implementing health protocols is one way to combat COVID-19 during the epidemic. According to the study's findings, pregnant women remark that although health facilities have adopted health protocols, husbands or family are unable to attend them during the examination because of the social distance created by the setting. According to research, having a small amount of space can make it difficult for healthcare providers to provide their services (Houghton et al., 2020).

LIMITATION OF THE STUDY

The study had some limitation, including the fact that several interviews were performed by video chat during data collection, making it difficult for researchers to monitor informants properly.

CONCLUSIONS AND SUGGESTIONS

This study clarified how prepared expectant mothers were to give birth during the COVID-19 pandemic. Pregnant women who are a group at risk of contracting COVID-19 during the pandemic must take additional care of their health and must carefully arrange delivery. Pregnant women worry about contracting the coronavirus, also known as COVID-19, during labor because it can affect both the mother's and the fetus's health. Health facilities are crucial in assisting pregnant women with labor preparation, particularly during the pandemic. Health facilities must also make sure that pregnant patients receive care in accordance with pandemic-related health service standards. Pregnant women's preparation is still frequently influenced by taboo cultural elements that may have an effect on how they behave. In order to minimize the spread of COVID-19 by limiting physical mobility, health facilities can make the most of the telehealth program to monitor the health of pregnant women. By doing so, the frequency of visits to health facilities will be reduced.

Acknowledgment

The researcher thanks Dr. Paul Michael Chietra, M. Biomed, SpOG, Diyah Tri Kusuma Dewi, S. ST., M. Keb, Ns. Lea Andy Shintya, S.Kep., MSN, Ns. Zikri Alhalawi, S.Kep., Tessa Mamahit has assisted in validating the interview guide, assisting the process of data collection and data analysis.

ETHICAL CONSIDERATIONS

This study has received approval from the Health Research Ethics Committee of Aisyiyah University, Yogyakarta with ethical exemption No.1362/KEP-UNISA/I/2021.

Funding Statement.

The authors did not receive support from any organization for the submitted work.

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