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Research Article

# The Relationship between the Implementation of Pregnant Women's Classes and Childbirth Anxiety

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Abstract: Anxiety before childbirth is a common psychological condition experienced by pregnant women, particularly those who are primigravida. Such anxiety can be influenced by various factors, including lack of knowledge, fear of pain, and uncertainty about the childbirth process. Prenatal classes are educational programs designed to improve pregnant women's understanding, confidence, and readiness in facing labor. These classes typically provide information about pregnancy, childbirth, postpartum care, and newborn care. However, the extent to which prenatal classes effectively reduce anxiety before childbirth requires further investigation. This study aimed to determine the relationship between the implementation of prenatal classes and labor anxiety levels among pregnant women. A quantitative research design with a cross-sectional approach was used. The sample consisted of 30 pregnant women selected through purposive sampling. Data were collected using standardized anxiety questionnaires administered before and after participants attended prenatal classes. The data were analyzed using the Chi-Square statistical test with a significance level set at p < 0.05. The findings revealed a significant relationship between participation in prenatal classes and a reduction in labor anxiety, with a p-value = 0.000 (p < 0.05). These results indicate that prenatal classes can play an important role in preparing pregnant women mentally and emotionally for the childbirth process. The interactive education and supportive environment provided during these sessions help participants gain confidence and reduce fear. It is recommended that healthcare providers in health facilities continue to optimize the delivery of prenatal classes by incorporating more interactive methods and involving family members. Family support, in combination with structured prenatal education, can further enhance the effectiveness of these programs in reducing childbirth-related anxiety.

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Keywords: Anxiety; Childbirth; Education; Pregnancy; Women.

## 1. Introduction

Childbirth is a physiological process experienced by every pregnant woman as the final stage of pregnancy. However, for most mothers, especially primigravidas, childbirth is often a source of significant anxiety (Rohmah et al., 2022). Labor anxiety can have a negative impact on the mother's physical and psychological condition and has the potential to affect the course of the labor process, such as increasing the risk of prolonged labor or medical procedures such as cesarean section (Sari & Putri, 2021). Therefore, effective efforts are needed to reduce the anxiety of pregnant women approaching childbirth.

One of the programs designed to improve maternal readiness in facing childbirth is the pregnancy class. The pregnancy class is an educational program that aims to provide information about pregnancy, childbirth, postpartum, and newborn care (Ministry of Health of the Republic of Indonesia, 2020). Through this class, pregnant women can gain sufficient knowledge about the labor process, so that they can reduce anxiety due to ignorance or misinformation (Handayani et al., 2023).

Several studies have shown that pregnancy classes have an important role in improving mental readiness and reducing labor anxiety. A study by Utami et al. (2021) revealed that mothers who actively attend prenatal classes tend to have lower levels of anxiety compared to mothers who do not attend these classes. This is because prenatal classes not only provide

medical information, but also emotional and social support from health workers and fellow participants.

However, the implementation of prenatal classes in various regions still faces challenges, such as lack of participation of pregnant women, limited health workers, and access constraints for mothers who live in remote areas (Pratiwi et al., 2022). In addition, some pregnant women still feel less confident in facing childbirth even though they have attended prenatal classes, which shows that the effectiveness of this program still needs to be improved (Fitriani & Lestari, 2023).

Labor anxiety that is not managed properly can have an impact on increasing levels of stress hormones, such as cortisol and adrenaline, which can inhibit the labor process (Yuliani et al., 2021). Therefore, appropriate interventions, such as prenatal classes, need to be evaluated for their effectiveness in reducing anxiety in pregnant women approaching childbirth.

This study aims to determine the relationship between the implementation of prenatal classes and labor anxiety. By knowing this relationship, it is expected that health workers can improve educational strategies in prenatal classes to maximize their benefits for pregnant women.

The results of this study are expected to be a reference for health workers in optimizing prenatal classes as an effort to reduce labor anxiety. In addition, this study can also provide insight for pregnant women and families regarding the importance of attending prenatal classes as a form of preparation for childbirth.

#### 2. Research Methods

This study used a quantitative design with a cross-sectional approach. The number of respondents was 30 pregnant women who were selected by purposive sampling. Data were collected through anxiety questionnaires before and after attending prenatal classes. Data analysis used the Chi-Square statistical test with a significance level of p < 0.05.

# 3. Results and Discussion

**Table 1.** Respondent Characteristics

Information Faccusings Dougont					
Information	Frequency	Percent			
Mother's Age					
<20 year	2	6.2			
20-35 year	25	75.0			
>35 year	3	18.8			
Total	30	100.0			
Mother's Education					
Elementary school	8	26.2			
Junior high school	8	26.2			
High school	7	18.4			
Bachelor's degree	7	18.4			
Total	30	100.0			
Mother's Job					
Private Entrepreneur	1	4.2			
Honorary	2	6.2			
Civil servant	3	18.8			
Housewife	25	70.8			
Total	30	100.0			

According to table 1. most of the mothers' ages are 20-35 years (75%). Mother's education 8 respondents graduated from elementary school (26.2%), 8 respondents graduated from junior high school (26.2%), 7 respondents graduated from high school (18.4%) and 7 relspondelnts graduateld from collegel (18.4%). Most of thel 25 (70.8%) relspondelnts welrel houselwivels.

		Labor Anxiety		
Information				
		Light	Medium	Total
Class	Aktiv	25	0	25
	Non Aktiv	0	5	5
Total		25	0	30
Uji Chi square				0.000

Table 2. Class of Prelgnant Womeln \* Labor Anxielty Crosstabulation

According to table 2. it was found that 25 prelgnant womeln welrel activel in thel prelgnancy class activitiels, so that anxielty was mild. 5 prelgnant womeln welrel not activel in thel prelgnancy class so that thely fellt modelratel anxielty. Thel chi squarel telst was obtaineld, namelly 0.000 <0.05, which melans that h0 is reljelcteld, h1 is accelpteld, thelrel is a Rellationship beltweleln thel Implementation of Prelgnancy Classels and Labor Anxielty

From this study, Anxielty belfored childbirth is a common phelnomelnon in prelgnant womeln, elspelcially for thosel who lack elducation relgarding thel childbirth procelss (Rohmah elt al., 2022). Prelnatal classels are one of the elducational melthods designed to improved their eladinelss of prelgnant womeln in facing childbirth, both physically and psychologically. Baseld on the data obtained from this study, it was found that out of 30 relspondelnts, 25 prelgnant womeln who actively atteinded prelnatal classels elxpelrielnced mild anxielty, while 5 prelgnant womeln who did not actively atteind classels elxpelrielnced modelratel anxielty.

Thel relsults of thel chi-squarel telst showeld a p-valuel = 0.000, which melans it is smallelr than thel significancel lelvell of 0.05. This shows that thelrel is a significant rellationship beltweleln thel implementation of prelnatal classels and thel lelvell of anxielty belforel childbirth. In other words, prelgnant women who actively attend prelnatal classels havel lower lelvells of anxielty compared to thosel who are not active (Utami et al., 2021).

Thelsel relsults arel in linel with prelvious studiels which statel that prelnatal classels can improvel mothelrs' understanding of thel prelgnancy and childbirth procelss, thelrelby relducing anxielty duel to ignorancel or misinformation (Handayani elt al., 2023). Prelgnant womeln who havel a belttelr understanding of thel childbirth procelss telnd to bel morel melntally and elmotionally prelpareld to facel childbirth (Fitriani & Lelstari, 2023).

In addition, in prelnatal classels, participants not only gelt information from helalth workelrs but also gelt social support from fellow prelgnant womeln. This social support plays an important rolel in relducing anxielty, belcausel mothelrs felell thely are not alone in facing

childbirth (Pratiwi elt al., 2022). Othelr studiels also show that support from thel surrounding elnvironmelnt, including partnelrs and family, can streingtheln thel positivel elffelcts of prelnatal classels in relducing anxielty (Sari & Putri, 2021).

High anxielty in prelgnant womeln can triggelr an increlasel in strelss hormonels such as cortisol and adrelnalinel, which can nelgativelly impact thel labor procelss. This increlasel in hormonels can causel musclel telnsion, increlaseld blood prelssurel, and disruption of utelrinel contractions, which can prolong thel labor procelss (Yuliani elt al., 2021). Thelrelforel, stratelgiels to relducel anxielty in prelgnant womeln arel velry important in supporting smooth labor.

In this study, mothelrs who welrel not activel in prelgnancy classels telndeld to elxpelrielncel modelratel anxielty. This shows that lack of elducation and support in delaling with childbirth can increlasel felar and uncelrtainty (Ministry of Helalth of thel Relpublic of Indonelsia, 2020). Mothelrs who do not havel accelss to accurate information are morel suscelptible to myths or misinformation that can increlasel thelir anxielty (Rohmah elt al., 2022).

The implementation of elffelctive prelgnancy classels can provide broader behnelfits in elfforts to relduce the incidence of problematic labor due to elxcelssive anxiety. Studies show that mothers who attend prelgnancy classels have a higher level of courage in facing childbirth and are more likely to choose normal dellivery compared to mothers who do not attend classels (Utami elt al., 2021).

Howelvelr, thel elffelctivelnelss of prelgnancy classels still delpelnds on various factors, such as thel melthod of dellivelring thel matelrial, thel involvelmelnt of helalth workelrs, and thel availability of adelquatel facilitiels. Selvelral studiels havel shown that prelnatal classels that implelment an interactivel and elxpelrielncel-baseld approach havel a morel significant impact on relducing anxielty (Handayani elt al., 2023).

Limiteld accelss and low participation of prelgnant womeln in prelnatal classels arel still challelngels in selvelral arelas. Factors such as distancel, timel, and busy mothelrs arel ofteln obstaclels to thelir participation in prelnatal classels (Fitriani & Lelstari, 2023). Thelrelforel, innovation is nelelded in thel implementation of prelnatal classels, for elxamplel by using onlinel melthods or a combination of facel-to-facel and virtual meleltings to relach morel prelgnant womeln.

On thel othelr hand, motivation from helalth workelrs also plays a rolel in increlasing thel elffelctivelnelss of prelnatal classels. Relselarch shows that helalth workelrs who are activel and communicativel in dellivelring material can improve prelgnant womeln's understanding and increlasel thelir intelrelst in atteinding classels relgularly (Pratiwi elt al., 2022).

In addition, thel rolel of thel family, elspelcially thel husband, is also velry important in supporting prelignant womeln in facing childbirth. Selvelral studiels havel shown that husband involvelment in prelnatal classels can increlasel matelrnal confidence in facing childbirth and significantly relduced anxiety (Sari & Putri, 2021).

With a significant rellationship beltweleln prelnatal classels and anxielty lelvells, helalth workelrs in elxpelcteld to increlasel the elffelctivelnelss of this program. Onel way that can bel donel is to adjust the material for the prelnatal class to the neleds of the participants, so that mothers felell more prelpared to facel childbirth (Handayani elt al., 2023).

In addition, thelrel nelelds to bel collaboration beltweleln helalth workelrs and local govelrnments in improving accelss and thel quality of prelnatal classels, elspelcially in arelas with limited helalth facilitiels (Ministry of Helalth of thel Relpublic of Indonelsia, 2020).

Ovelrall, thel relsults of this study support thel importancel of prelnatal classels in relducing labor anxielty. With a belttelr understanding of thel labor procelss, prelgnant womeln can facel childbirth morel calmly and confidently, which can ultimatelly improvel thel safelty of mothers and babiels (Yuliani elt al., 2021).

# 4. Conclusions

Based on the results of this study, it was found that there was a significant relationship between the implementation of prenatal classes and the level of anxiety before childbirth. Of the 30 respondents, 25 pregnant women who actively attended prenatal classes experienced mild anxiety, while 5 pregnant women who were not active experienced moderate anxiety. The results of the chi-square test showed a p-value = 0.000, which means it is smaller than the significance level of 0.05, so H<sub>0</sub> is rejected and H<sub>1</sub> is accepted.

Prenatal classes have been proven effective in reducing maternal anxiety before childbirth because they provide education that increases understanding of the childbirth process, as well as social support that can help reduce fear and worry. Mothers who actively attend this class are more mentally and emotionally prepared compared to mothers who are not active.

Therefore, optimizing the implementation of prenatal classes is very important to increase the readiness of pregnant women to face childbirth. Efforts are needed from health workers and related parties to increase maternal participation in prenatal classes with more interactive education methods and involving the role of the family, especially the husband, to support the physical and mental readiness of pregnant women.

The results of this study are expected to be a basis for health workers in improving the quality of maternity class services, so that they can help reduce labor anxiety and improve the welfare of mothers and babies.

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