

The Assessment of Perceptions and Feelings of Women Related to Labor Pain

Kadınların Doğum Ağrısına Yönelik Algı ve Duygularının Değerlendirilmesi

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Abstract

Objective	Labor pain is a subjective experience that is affected not only by physiological factors but also by psychosocial, cultural and environmental factors. The aim of this study is to assess and determine the perceptions and feelings of women towards labor pain. (<i>Sakarya Med J</i> 2019, 9(2):302-309)
Materials and Methods	This study was designed cross-sectional. The population consisted of 300 women who came to Women Labor and Child Hospital for labor and had vaginal delivery. Only women who had normal labor were included. "Survey form" and Visual Analog Scale were used to collect the data. It was used the descriptive statistics, independent samples t-test and ANOVA in the evaluation of data.
Results	It was determined that 37.3% of women found to be difficult and terrifying in this study. 72.6% of the women stated that they received support during childbirth and they received this support mostly from midwives. Primiparas women had significantly higher fear ($p<0.001$), panic ($p<0.001$), anxiety ($p<0.001$), need for support and fear of losing infant ($p<0.05$) than multiparas
Conclusion	Women perceive intolerable labor pain, use different methods to cope and are more likely to receive support require the development of initiatives directed at them
Keywords	Woman; labor pain; perception; feeling

Öz

Amaç	Doğum ağrısı fizyolojik, psikolojik ve çevresel faktörlerin etkileşimini içeren subjektif bir deneyimdir. Bu çalışmanın amacı doğum yapan kadınların doğum ağrısına yönelik algı ve duygularını değerlendirmek, etkileyen faktörleri belirlemektir. (<i>Sakarya Tıp Dergisi</i> 2019, 9(2):302-309).
Gereç ve Yöntemler	Bu araştırma kesitsel olarak tasarlanmıştır. Araştırma kapsamına Kadın Doğum ve Çocuk Hastanesine başvuran ve vajinal doğum yapan 300 kadın alınmıştır. Verilerin toplanmasında "Anket formu" ve Visual Analog Skala kullanıldı. Verilerin analizinde tanımlayıcı istatistikler, ANOVA, bağımsız gruplarda t testi kullanılmıştır.
Bulgular	Bu çalışmada kadınların %37.3'ü doğum ağrısını zor ve korkutucu olduğunu belirtmiştir. Kadınların % 72,6'sı doğum sırasında destek aldığını ve bu desteği çoğunlukla ebelerden aldığını belirtmiştir. Primipar ve multipar kadınlar arasında korku ($p<0.001$), panik($p<0.001$), aksiyte ($p<0.001$), destek gereksinimi ($p<0.001$) ve bebeğini kaybetme korkusu ($p<0.05$) istatistiksel olarak anlamlı bulunmuştur
Sonuç	Kadınların doğum ağrısını dayanılmaz algılamaları ve baş etmek için farklı yöntemler kullanmaları, daha çok ebelerden destek almaları buna yönelik girişimlerin geliştirilmesine işaret etmektedir.
Anahtar Kelimeler	kadın; doğum ağrısı; algı; duygu

INTRODUCTION

Labor pain has been reported as severe pain and can be considered a model of acute visceral pain.¹⁻³ Labor pain is a subjective experience that is affected not only by physiological factors but also by psychosocial, cultural, and environmental factors.⁴⁻⁷ Also affect it along with on the tissues of the birth canal and stretching of the tissues, the fear, anxiety and ability to cope at labor effect the severity and perception of women's labor pain. Women's past pain experiences, loneliness, ignorance, cultural values and learned behaviors also affect pain perception.⁸⁻¹⁰

Labor is not completely within women's control due to barriers such as failure to cope with fear and pain¹¹⁻¹³. Women need to receive support and feel important in order to cope with labor and experience a healthy labor.¹⁴ Professional support provided throughout labor might develop women's sense of control and ability to cope with labor pain, which may prevent negative labor experiences.^{14,15} Some studies indicate that fear of labor, having had a troubled labor before, and clinical or obstetric complications affect the process of deciding on labor method.^{16,17} For example, Fisher et al.,¹⁸ report that women who have had a negative experience during vaginal delivery will develop a fear of vaginal delivery in future pregnancies. In their study, Kasai et al.,¹⁹ indicate that fear of labor increases the rate of elective cesarean sections. According to recent studies, neither labor pain nor analgesia greatly affects mothers' satisfaction with labor. Mothers' satisfaction is closely associated with receiving support during labor, approach of the person who provides support, past experiences, mothers' attitude, and implementation of these decisions.^{1,4,20} Non-pharmacological methods support these factors and increase mothers' satisfaction with labor.^{1,20}

Studies on labor pain mainly concentrate on removing labor pain, increasing satisfaction with labor and evaluating efficiency of training.¹⁴⁻¹⁶ It may not be possible to relieve labor pain and increase satisfaction without knowing the feelings women experience at labor. There are no studies

aiming to determine the feelings of women during labor. Therefore, this study was carried out in order to evaluate the perception and emotions of women with birth pain and to determine the factors affecting them.

MATERIAL and METHOD

Study design and sampling

This study was designed cross-sectional. The population consisted of 300 women who came to Women Labor and Child Hospital for labor and had vaginal delivery between March 2016 and October 2016. Data were obtained by researchers via face-to-face interview in a postpartum clinic within the first hour postpartum.

Data collection and measures

Data were collected using an original questionnaire prepared using previous literature^{5,15,17} and the Visual Analog Scale (VAS). The questionnaire included twenty-seven questions in total. Questions were on socio-demographic characteristics (age, educational background, working condition, gravida) and women's opinions about sleep problem due to fear of labor, labor and labor pain. Women's pain and feelings related to labor (fear, panic, anxiety, self-confidence, fear of losing their infant, fear of dying, severity of labor pain and weakness) were measured using the VAS. VAS was used separately to assess each feeling. Women themselves determined the level of their feelings on VAS. The VAS is used to measure subjective experiences.²¹⁻²³ The primary characteristic of the VAS is that it is an easily comprehensible and simple scale, which can be applied to any group. This valid and reliable scale contains a horizontal line 10 cm in length. Women were asked to mark a point on the line that corresponded to her pain and feelings on a scale from 0 to 10, which was labelled on the axes of the VAS.

Data analysis

The data analyses were performed using SPSS version 20.0. (IBM SPSS Ataturk University, Erzurum, Turkey) descriptive statistics. Women's labor pain perceptions, cultural

attitudes, and ways of coping with pain were evaluated in percentage. It were used the independent samples t-test was used to compare women's feelings during labor and sleep disturbance during pregnancy, independent samples t-test was used to compare primiparas and multiparas women's feelings during labor, ANOVA was used to determine the relationship between women's pain and emotions during labor and their educational level and age, and descriptive statistics in the evaluation of data.

Ethical approval

Units and institutions where the study was conducted were informed about the study objective and consent and written permission were obtained from the ethics committee of Atatürk University Faculty of Health Sciences (2016.01.09). The informed consent of the pregnant women who agreed to participate in the study was verbally and written received. It was stated to pregnant women who accepted to participate in the study that the decision about participating in the study was completely their own, that no name would be written in the questionnaire form, and that the data obtained from the study would be used within the scope of the research. It was stated that the collected information would be confidential, the identity information was not requested from them and volunteering was taken as basis. The study was conducted in accordance with the Declaration of Helsinki.

RESULTS

Women had an age average of 27.10 ± 5.68 years. Of the total sample, 36.7% were younger than 25 years old, 54.3% were aged between 25 and 35 years old, and 9.0% of women were 35 years old or older. Elementary school was the highest level of education for 63.7% of the women, 24.3% finished secondary school, and 12% were university graduates. Unemployed women made up 87.5% of the population and 66.7% were multiparous.

It was determined that 17.7% of women found to be pleasing labor pain, 37.3% of women found to be difficult and

terrifying in this study. The majority of women did not feel shame. Of the total sample, 93.3% did not consider screaming to be shameful, and 51.3% of women yelling during labor. Almost all women stated that labor pain could not be removed (Table 1).

Feelings and Opinions	n	%
Pain perception		
Mild	9	3.0
Disturbing	51	17.0
Terrifying	58	19.3
Unbearable	182	60.7
Relief of pain		
Yes	21	6.7
No	279	93.3
Meaning of pain		
Insignificant	89	29.7
Pleasing	53	17.7
Difficult and terrifying	112	37.3
Complicated feelings	46	15.3
Value of pain		
Available	143	47.7
N/A	157	52.3
Sentimental value of pain		
Being a mother	132	92.3
Redeeming	11	7.7
Reaction to pain		
Yelling	154	51.3
Screaming	52	17.3
Keeping silent	37	12.3
Crying	23	7.7
Making a grimace	34	11.3
Value of yelling during labor		
Shameful	15	4.7
Not shameful	285	93.3
Sense of shame during labor		
Yes	99	33.0
No	201	67.0

Women reported a variety of different coping methods, with 45.7% of women reporting that they used different

methods to cope with labor pain. These methods were exercise, relaxation, breathing exercises, yoga, listening to music, prayer, and taking analgesia. The majority of women, 72.6%, received support during labor mainly from midwives (Table 2).

Methods	n	%
Yes	137	45.7
No	163	54.3
Practices		
Prayer	13	9.5
Exercise	61	44.5
Relaxation methods	51	37.3
Using analgesia	12	8.7
Receiving support		
Yes	216	72.6
No	82	27.5
Received support from		
Mother	16	7.4
Husband	14	6.5
Midwife	186	86.1
Receiving training before Labor		
Yes	40	13.3
No	260	86.7

Women who experienced sleep problems during pregnancy had higher rates of fear, panic, and anxiety during labor, needed more support, had more fear of losing their infant, and experienced more weakness than those who did not have sleep problems (Table 3).

Also the rate of sleep problems during pregnancy due to fear of labor was significantly higher in primiparas (49%) than it was in multiparas (34.2%). Primiparas women had significantly higher fear ($p<0.001$), panic ($p<0.001$), anxiety ($p<0.001$), need for support and fear of losing infant ($p<0.05$) than multiparas. (Table 4)

Women's self-confidence during labor showed a moderate negative correlation with fear, panic, anxiety, need for sup-

port, fear of losing infant, fear of dying, severity of labor pain and weakness. All perceptions and feelings, except for self-confidence, showed a positive moderate correlation with each other (Table 5).

Feelings	Primiparas	Multiparas	Test and p
	X±SD	X±SD	
Fear	7.59±2.16	6.27±2.72	t=4.275, p=0.000
Panic	6.43±2.68	4.79±3.15	t=4.511, p=0.000
Anxiety	6.36±2.79	5.01±3.07	t=3.730, p=0.000
Self-confidence	5.85 ±2.63	7.03±2.38	t=3.918, p=0.000
Need for support	6.71±2.91	5.38±2.77	t=3.866, p=0.000
Fear of losing infant	5.07±3.02	4.34±2.97	t=2.026, p=0.044
Fear of dying	3.25±2.64	2.91±2.62	t=1.044, p=0.299
Severity of labor pain	9.10±2.07	8.80±2.23	t=1.139, p=.255
Weakness	6.55±2.61	5.96±2.42	t=1.96, p=0.050

* 49% of primiparas women and 34.2% of multiparas women had sleep problems during pregnancy. women
 ** The rate of sleep problems during pregnancy due to fear of labor was significantly higher in primiparas than it was in multiparas

Table 4. Relationship between feelings during labor and sleep disturbance during pregnancy

Feelings	Experiencing sleep problems	Not experiencing sleep problems	Test and p
	X±SD	X±SD	
Fear	7.29±2.96	6.36±2.57	t=3.041, p=0.003
Panic	6.29±3.06	4.75±2.97	t=4.344, p=0.000
Anxiety	6.27±3.09	4.97±2.91	t=3.680, p=0.000
Self-confidence	6.59 ±2.72	6.64±2.40	t=3.918, p=0.869
Need for support	6.44±3.04	5.46±2.72	t=2.905, p=0.004
Fear of losing infant	5.05±3.27	4.32±2.97	t=1.987, p=0.048
Fear of dying	3.31±2.61	2.85±2.63	t=1.044, p=0.135
Severity of labor pain	8.88±2.13	8.80±2.23	t=1.139, p=0.896
Weakness	6.67±2.55	5.84±2.42	t=2.865, p=0.005

DISCUSSION

There are many factors that affect an individual's perception of pain. Perception of pain is associated not only with women's self-perception, but also prenatal training and cultural expectations. 8-10 In this study, most women reported labor pain to be difficult and terrifying. This finding is the answer to the research problem. Women were least likely to report labor pain as pleasing. This is in line with previous literature²⁴. Characterizing labor as pleasing is considered an efficient method for learning the meaning of pain during labor and allowing women to cope with the process. Thus, even a highly painful labor might be perceived as positive according to women's sense of satisfaction.^{25,26} Pregnant women who attended prenatal training and preparation classes and received labor support stated that they had a better adaptation to labor and a more positive perception of labor.^{13,27} This supports the findings of this study. In this study, the rate of women who received prenatal training was very low and women mainly defined labor pain as difficult and terrifying, which may be show

Table 5. Correlations between feelings during labor

		Fear	Panic	Anxiety	Self-Confidence	Need for Support	Fear of Losing Infant	Fear of Dying	Severity of Labor Pain	Weakness
Fear	r		.672**	.588**	-.217**	.301**	.288**	.316**	.188**	.249**
	p		.000	.000	.000	.000	.000	.000	.001	.000
Panic	r	.672**		.733**	-.277**	.322**	.327**	.374**	.067	.315**
	p	.000		.000	.000	.000	.000	.000	.249	.000
Anxiety	r	.588**	.733**		-.230**	.319**	.377**	.389**	.078	.279**
	p	.000	.000		.000	.000	.000	.000	.177	.000
Self-confidence	r	-.217**	.277**	-.230**		-.255**	-.048	-.011	-.008	-.217**
	p	.000	.000	.000		.000	.406	.848	.892	.000
Need for support	r	.301**	.322**	.319**	-.255**		.336**	.182**	.245**	.249**
	p	.000	.000	.000	.000		.000	.002	.000	.000
Fear of losing Fear	r	.288**	.327**	.377**	-.048	.336**		.424**	.041	.085
	p	.000	.000	.000	.406	.000		.000	.482	.145
Fear of dying	r	.316**	.374**	.389**	-.011	.182**	.424**		.021	.032
	p	.000	.000	.000	.848	.002	.000		.722	.581
Severity of labor Pain	r	.188**	.067	.078	-.008	.245**	.041	.021		.312**
	p	.001	.249	.177	.892	.000	.482	.722		.000
Weakness	r	.249**	.315**	.279**	-.217**	.249**	.085	.032	.312**	
	p	.000	.000	.000	.000	.000	.145	.581	.000	

*low level correlation **middle-order correlation

that they were not ready for labor and still had anxiety and fear related to labor.

The majority of women in the study believed that labor pain would not disappear. This is in line with previous findings. For example, in a study by Ibach et al., a woman stated that pain was a normal part of labor and there was no method of removing that pain.²⁸ Meaning given to pain differs according to different individuals and cultures²⁴. However, women universally identify labor pain with motherhood. In the study, mothers felt that motherhood was of important.

Women hope to cope with labor pain 11-13 and to have relief from labor pain.⁵ In this study, almost half of the women used different methods to cope with labor pain and to gain relief. These methods were exercise, relaxation, breathing exercises, listening to music, prayer, and taking analgesia. In pain management; acupuncture, relaxation, massage, water therapy, local anesthetics or non-opioid medicine were considered in the category of “possibly effective” applications.^{6,20} These interventions decreased pain and increased women’s satisfaction with labor compared to standard care or placebo.^{1,6} In this study, women used these interventions to cope, which is compatible with literature. In this study, the majority of women stated that they received support during labor mainly from midwives (Table 2). Previous findings support these results.^{29,30}

The rate of sleep disturbance during pregnancy due to fear of labor was higher in primiparas women than in multiparas women. Women who experienced sleep problems during pregnancy due to fear of labor had significantly higher rates of fear, panic, anxiety, need for support, fear of losing infant, and weakness during labor. This shows that negative feelings experienced during labor may begin during pregnancy and continue in labor. If women are able to cope with these feelings and to get rid of their fears during pregnancy, then they may have a more comfortable process of labor and experience less pain. In this study, the

majority of women did not attend prenatal training and professional support for labor during pregnancy, which likely increased their anxiety about labor and process of labor brought these anxieties to the birth.

Labor is an important emotional incident and a normal psychosocial process in the life of women.¹ In this study, the mean score for fear, panic, anxiety, need for support and fear of losing infant was significantly higher for primiparas women than for multiparas women. This result supports the study hypothesis “Primiparas live more intense feelings than multiparas at labor.” This suggests that negative affect during labor is associated with lack of experience. That multiparas women scored higher in self-confidence than primiparas women supports this. There are many factors that affect the perception of labor pain, for example prenatal training, culture, weakness and sleep problems may all affect the meaning of pain for individuals.⁵⁻⁷ Labor pain is exacerbated by ignorance, fear, anxiety and lack of support.^{4,6,7,9} If women in labor do not know and understand what they are going through, then they are likely to experience fear and anxiety.^{6,7,15,31} Women need to receive support in order to cope with labor and experience a healthy process.^{14,31} Professional support provided throughout labor may develop women’s sense of control, allowing them to cope and preventing them from having negative experiences.^{1,14,15,3}

Feelings experienced by women during labor were related to each other. Negative feelings experienced during labor decrease women’s self-confidence and increase their need for support.^{9,10} Women’s loss of self-confidence during labor complicates labor, increases the rate of intervened labor, and even leads to cesarean section.³² This is why it is important to help women deal with negative feelings before and during labor. Women’s self-confidence and abilities either increase or decrease depending on the support of caregivers and their level of being informed about labor and the place where they will give birth.^{17,32} This emphasizes the importance for midwives to prepare women before

labor.

CONCLUSION

The majority of women perceived labor pain as negative and did not think it would disappear. The fact that women perceive labor pain is unbearable and used different coping methods points out their need to receive support from midwives and developing interventions aimed at this. In addition, half of the women studied here had sleep problems due to fear of labor, and this was more common in primiparas. Women who experienced sleep problems due to fear of labor experienced significantly more fear, panic, anxiety, fatigue, fear of loss of infant and need for support during labor. Primiparas had significantly higher fear, panic, anxiety, need for support, fear of loss of infant and less self-confidence at labor than multiparas. A negative correlation between women's self-confidence during labor and fear, panic, anxiety, need for support and weakness signifies that all negative perceptions and feelings would not be experienced as long as their self-confidence is provided. These results suggest that it is beneficial to prepare women for labor during pregnancy. Sensitivity of midwives and nurses towards factors influencing pain, women's varying experiences of labor pain perception and. Evaluation of women's feelings about labor, especially fear, may be important in planning and implementing non-pharmacological interventions that are effective in reducing pain. Also, randomized controlled studies with midwifery / nursing interventions developing self-confidence look important to investigate the effects of fear, panic, anxiety, need for support, and weakness in women at labor.

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