

The Relationship Between Depression and Breastfeeding Self-Efficacy of Breastfeeding Women: The Case of Türkiye

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Cite this article as: Yakıt Ak E, Şen MA, Tandoğan Ö. The relationship between depression and breastfeeding self-efficacy of breastfeeding women: The case of Türkiye. *Arch Health Sci Res.* 2025;12, 0009, doi: 10.5152/ArcHealthSciRes.2025.25009.

1

What is already known on this topic?

- *The postpartum period for women is a time that includes the risk of depression and has negative effects on breastfeeding.*

What this study adds on this topic?

- *This study aimed to determine the relationship between depression and breastfeeding self-efficacy in women with infants aged 0-12 months in Türkiye. As a result, it was determined that women frequently experienced postpartum depression, and this condition affected breastfeeding.*

ABSTRACT

Objective: The aim of this study was to determine the relationship between depression and breastfeeding self-efficacy in women with infants aged 0-12 months living in Türkiye.

Methods: This descriptive and cross-sectional study was conducted between April 24 and May 10, 2022. The study sample consisted of 410 women with infants aged 0-12 months living in Türkiye. The data were collected using descriptive information forms, such as the Beck Depression Inventory (BDI) and Breastfeeding Self-Efficacy Scale (BSES).

Results: The mean age of the participants was 30.24 ± 5.89 years, with 46% of them having completed primary school or below. The mean BDI score of the female participants was low (13.14 ± 10.44), while the mean BSES total score was high (52.31 ± 11.20). A significant negative correlation was identified between the mean BDI and BSES total scores of the participants ($r = -0.228, P < .001$). The BDI and BSES scores of women were found to differ statistically according to their age, educational status, employment status, breastfeeding experience, and number of births ($P < .05$). A weak positive correlation was identified between the number of births and both the BDI ($r = 0.24$) and the BSES ($r = 0.13$) ($P < .01$).

Conclusion: The findings of this study indicate that the difficulties and depression experienced by mothers during the breastfeeding process can have a negative impact on their desire to breastfeed and the success of this endeavor. The findings of this study offer insights into the intricate relationship between breastfeeding and depression, as well as recommendations for supporting mothers.

Keywords: Breastfeeding, depression, self-efficacy, women

Introduction

The postpartum period represents a significant and complex process in a woman's life. The morphological and functional changes that occur during this period are reflected in the psychological field of the woman. Postpartum depression (PPD) is one of the most prevalent psychological disorders during this period.¹ Postpartum depression is characterized by a constellation of symptoms, including anxiety; panic attacks; fatigue; crying spells; a depressed mood; and changes in energy, sleep, and appetite. A number of factors have been identified as potential predictors of postpartum depression in women, including difficulties with the partner, pregnancy-related complications, traumatic childbirth experiences, and an increased sense of responsibility for the infant following delivery.^{2,3} A meta-analysis indicates that postpartum depression affects approximately 17.22% of mothers worldwide.⁴ A meta-analysis conducted in Türkiye revealed a prevalence of PPD of 23.8%.⁵ The high prevalence of postpartum depression makes it

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Received: January 22, 2025
Revision Requested: March 3, 2025
Last Revision Received: March 24, 2025
Accepted: March 27, 2025
Publication Date: October 6, 2025

challenging for mothers to provide optimal care for their infants and to breastfeed for extended periods. It has been demonstrated that mothers experiencing postpartum depression encounter greater challenges with regard to breastfeeding.^{6,7} Additionally, research indicates that breastfeeding can mitigate the risk of developing postpartum depression by approximately 14%.⁸

Breast milk is an excellent and unique food for babies. The content of breast milk is produced according to the needs of each baby.⁹ Effective breastfeeding can prevent the death of 6 million babies under 1 year of age every year. However, breastfeeding rates are not sufficient in Türkiye and around the world. In 2013-2018, according to the Global Breastfeeding Collective, 48% of infants were breastfed after birth, and 44% of children were breastfed until the age of 2 years.¹⁰ According to the Türkiye Demographic and Health Survey 2018 report, although 98% of total children are breastfed at any time, the rate of breastfeeding until the age of 2 is 34%.¹¹

The literature has examined the effects of mothers' socio-demographic characteristics, physical and mental fitness, social support, and self-efficacy on breastfeeding cessation.^{12,13} Among these variables, maternal breastfeeding self-efficacy is of particular significance.¹⁴ The term "breastfeeding self-efficacy" is defined as a mother's perceived ability to breastfeed. Breastfeeding self-efficacy encompasses the mother's decision to breastfeed, her level of effort, and her responses to the challenges she may encounter during the breastfeeding process.¹⁵ It is of great importance to identify the factors that affect breastfeeding self-efficacy. A review of the literature reveals that several factors, including breastfeeding experience, knowledge, attitudes, the presence of social support, and postpartum depression, are associated with breastfeeding self-efficacy.¹⁵⁻¹⁷ In particular, emotional arousal has been demonstrated to impact the breastfeeding process. In this context, providing mothers with the necessary support and information regarding breastfeeding will be an important step to increase breastfeeding self-efficacy. It would be a significant step forward in increasing breastfeeding self-efficacy and enabling mothers to be more successful in the breastfeeding process to consider these factors. Further research is required on this topic, and health professionals should provide support to mothers by taking these factors into account.

A number of factors have been identified as contributing to the observed decline in the duration of breastfeeding among mothers in Türkiye. Among these factors, stress is known to play an important role.¹⁸ Although the relationship between depression and breastfeeding is complex, it is important to identify other factors affecting breastfeeding. Moreover, additional factors influencing breastfeeding behaviors among mothers in Türkiye encompass social support, inadequate information, and psychological states.¹⁹ The adequacy of breastfeeding is a critical factor in the process of maintaining breastfeeding. Additionally, women's breastfeeding knowledge and experience also affect the duration of breastfeeding. This study addresses the factors affecting breastfeeding by examining the relationship between breastfeeding adequacy and depression with demographic data affecting the daily lives of breastfeeding women. It is crucial to comprehend this matter in order to grasp the impact of stressors encountered by women. Furthermore, identifying the reasons affecting breastfeeding in Türkiye will also be instructive in determining why women discontinue breastfeeding. In light of the preceding considerations, the present study was designed to ascertain the correlation between maternal depression and breastfeeding self-efficacy among mothers with infants aged 0-12 months living in Türkiye. It is anticipated that this study will make a significant contribution to the development of strategies designed to enhance the breastfeeding process.

For this purpose, answers were sought to the following questions:

- Is there a relationship between women's breastfeeding self-efficacy and depression?
- Is there a relationship between women's demographic characteristics and breastfeeding self-efficacy and depression?

Methods

The population of this descriptive and cross-sectional study consisted of women with infants aged 0-12 months living in Türkiye. The study was conducted between April 24 and May 10, 2022, with a face-to-face questionnaire collection method. To determine the sample size, the total number of births in 2020 (1 112 859) was obtained from the Turkish Statistical Institute.²⁰ The formula $(n = N \cdot t^2 \cdot p \cdot q / d^2 \cdot (n-1) + t^2 \cdot p \cdot q)$ was utilized, and the sample number and sample size were found to be 215 with a 95% confidence interval and a sensitivity of 0.03. In order to increase the power of the study, it was completed with 410 breastfeeding women. The study was conducted at an obstetrics and gynecology hospital in a large province of Türkiye. The women who participated in the study were required to have a child between the ages of 0 and 12 months, be literate, and currently breastfeeding. During the data collection process, the identity information of the participants was not collected, and the average time required to complete the questionnaires was between 5 and 10 minutes. In addition to the collection of demographic data, the Beck Depression Inventory and the Breastfeeding Self-Efficacy Scale were employed as instruments for the gathering of data.

Data were collected by the face-to-face interview method. Women who met the inclusion criteria and who volunteered to participate in the study were included by explaining the purpose of the study and introducing the questionnaire forms. Women who did not participate in the study, were not breastfeeding, had a baby older than 12 months, reported a psychiatric illness, or were pregnant were excluded from the study. Data collection forms were distributed to the mothers by the researcher in the pediatric outpatient clinic. The questionnaires filled in by the mothers themselves were checked by a researcher. The researcher who carried out the data collection process immediately checked whether the questionnaires were filled in correctly. Incomplete questionnaires and incomplete answers were emphasized by the participants on the spot and asked to be corrected. It took approximately ten minutes for the mothers to answer the questionnaire.

Data Collection Tools

Introductory Information Form, Beck Depression Inventory, and Breastfeeding Self-Efficacy Scale were used as data collection tools.

Introductory Information Form

The form includes a total of 13 questions developed by the researchers in line with the literature to determine the sociodemographic status of women.²¹

Beck Depression Inventory

This was a self-report inventory made up of 21 items and developed by Beck et al²² to determine the depression levels of individuals. The Turkish validity and reliability studies of the inventory were conducted by Hisli.²³ The purpose of the inventory was not to diagnose individuals with depression but to determine the degree of depression symptoms numerically. Higher scores received from the inventory indicated an increase in depression symptoms. Each item received a score between 0 and 3, and the scores obtained from the inventory ranged between 0 and 63. A score between 0 and 9 obtained by an individual from the inventory indicated normal depression symptoms; a score between 10

and 18 indicated mild depression symptoms; a score between 19 and 29 indicated moderate depression symptoms; and a score between 30 and 63 indicated severe depression symptoms (Hisli, 1989). In this study, the Cronbach Alpha value of the Beck Depression Inventory was found to be 0.92.

Breastfeeding Self-Efficacy Scale (Short Version)

The scale was developed by Dennis in 2003,²⁴ and it consisted of 14 items to determine breastfeeding self-efficacy. The scale was a 5-point Likert type, and the scale items were rated as 1 = “not sure at all” to 5 = “sure all the time.” The lowest score to be obtained from the scale was 14, and the highest score was 70. Higher scores meant higher breastfeeding self-efficacy. Alus Tokat et al²⁵ conducted the Turkish reliability and validity study of the short form of the Breastfeeding Self-Efficacy Scale and calculated the Cronbach’s alpha value as 0.86.²⁵ As a result, the researchers considered the scale to be suitable for Turkish culture. It took 5-7 minutes on average to fill in the scale. In this study, the Cronbach Alpha value of the Breastfeeding Self-Efficacy Scale was found to be 0.92.

Data Analysis

The data were analyzed using the SPSS 21.0 package program (IBM SPSS Corp.; Armonk, NY, USA). The data collected in the study were analyzed using numbers, percentages, mean, SD, Chi-square, Pearson correlation coefficient, and Mann-Whitney and Kruskal–Wallis tests. Additionally, the Chi-square test, Pearson correlation coefficient, and Mann-Whitney U-test were employed to assess the relationships between variables. In this study, the normality of the distribution of the variables with the Kolmogorov–Smirnov test was examined, and the homogeneity of the variances with the Levene test was evaluated. A Dunnett’s T3 test was employed in the post-hoc analysis to determine the difference between the groups.

Ethical Aspect of the Study

Ethical committee approval was received from the Ethics Committee of Dicle University (Approval no: E-14679147-663.05-266758, Date: April 11, 2022). The participants were provided with the necessary explanations via the online questionnaire, and they were asked for their written consent.

Results

The mean age of the women participating in the study was revealed to be 30.24 ± 5.89 . Additionally, the study found that 34.1% of the participants were between the ages of 18-27, and that 56% had graduated from high school or above. Among all participants, 64.4% reported a moderate income level, while 62.4% indicated that they were not employed. The socio-demographic and obstetric characteristics of the women are presented in Table 1.

Table 2 illustrates the distribution of participants with respect to their breastfeeding characteristics.

Table 3 presents a comparison of the women’s scores on the Beck Depression Inventory and Breastfeeding Self-Efficacy Scale with respect to specific variables. The results indicate that there are statistically significant differences in the scores of the women on the Beck Depression Inventory based on their age, educational background, employment status, planned pregnancy, breastfeeding experience, receipt of prenatal breastfeeding education, and the number of deliveries ($P < .05$). Furthermore, the results of the Breastfeeding Self-Efficacy Scale indicate statistically significant differences with regard to the participants’ age, educational background,

Table 1. Socio-Demographic and Obstetric Characteristics of the Women

Variables (n:410)	Number	%
Age		
18-27 years old	140	34.1
28-34 years old	137	33.4
≥35 years old	133	32.4
Education Level		
Elementary School	90	22.0
Secondary School	90	22.0
High School	98	23.8
University and higher	132	32.2
Family Income		
Good	85	20.7
Average	264	64.4
Poor	61	14.9
Employment		
Employed	154	37.6
Unemployed	256	62.4
Planned Pregnancy		
Yes	272	66.3
No	138	33.7
Number of Delivery		
1	152	37.1
2	119	29.0
≥3	139	33.9
Type of Delivery		
Normal	225	54.9
Cesarean	185	45.1
Week of Delivery		
≤36th week	135	32.9
37-38th week	145	35.4
≥39th week	130	31.7
Gender of Infant		
Female	210	51.2
Male	200	48.8

employment status, breastfeeding experience, and number of deliveries ($P < .05$).

There was no statistically significant relationship between the Beck Depression Inventory and the Breastfeeding Self-Efficacy Scale ($P > .05$) in relation to the ages of the participants. Regarding the number of deliveries, a weakly positive and significant relationship was found

Table 2. Breastfeeding Characteristics of the Women

Variables (n:410)	Number	%
Breastfeeding experience		
Yes	255	62.2
No	155	37.8
Receiving prenatal breastfeeding training		
Yes	82	20.0
No	328	80.0
Time of first breastfeeding		
Immediately after delivery	174	42.4
In the first 60 minutes	151	36.9
≥61 minute	43	10.5
After the first 24 hours	42	10.2
Duration of feeding the baby only with breast milk		
First 6 months	272	66.3
Now known	138	33.7

Table 3. Distribution of Women's Depression and Breastfeeding Self-Efficacy in Terms of Certain Variables

Variables		n	%	BDI		Statistics	BSES		Statistics
				$\bar{X} \pm SS$	Median		$\bar{X} \pm SS$	Median	
Age	18-27 years old	140	34.1	11.30 $\pm$ 9.19 ^a	9.00	KW = 8.482 P= .014	52.40 $\pm$ 10.41	53.50	KW = 8.74 P= .15
	28-34 years old	137	33.4	14.97 $\pm$ 11.61 ^a	13.00		50.61 $\pm$ 11.31 ^a	52.00	
	$\geq$ 35 years old	133	32.4	13.19 $\pm$ 10.15	11.00		53.94 $\pm$ 11.71 ^a	57.00	
Educational Level	$\leq$ Elementary School	90	22.0	15.82 $\pm$ 11.17 ^a	13.00	KW = 10.119 P= .018	53.00 $\pm$ 12.41	55.00	KW = 11.894 P= .008
	Secondary School	90	22.0	13.91 $\pm$ 11.22	11.00		54.62 $\pm$ 10.28 ^a	56.00	
	High School	98	23.9	11.14 $\pm$ 8.05 ^a	10.00		52.67 $\pm$ 11.17	53.50	
	$\geq$ University	132	32.2	12.28 $\pm$ 10.63	10.50		49.98 $\pm$ 10.66 ^a	52.00	
Family Income	Good	85	20.7	12.26 $\pm$ 10.47	11.00	KW = 2.450 P= .294	53.61 $\pm$ 11.99	56.00	KW = 2.425 P= .297
	Average	264	64.4	12.99 $\pm$ 10.27	10.50		52.00 $\pm$ 10.79	53.00	
	Poor	61	14.9	15.03 $\pm$ 11.05	15.00		51.82 $\pm$ 11.88	55.00	
Employment Status	Yes	154	37.6	11.91 $\pm$ 10.83	10.00	MU = 16 675.00 P= .009	49.73 $\pm$ 11.48	51.50	MU = 15512.50 P= .000
	No	256	62.4	13.89 $\pm$ 10.15	11.50		53.86 $\pm$ 10.76	55.00	
Planned Pregnancy	Yes	272	66.3	12.02 $\pm$ 9.93	10.00	MU = 15 195.00 P= .002	53.38 $\pm$ 10.91	53.00	MU= 18 661.00 P= .925
	No	138	33.7	15.36 $\pm$ 11.09	13.00		52.15 $\pm$ 11.81	55.00	
Type of Delivery	Normal	225	5.9	12.95 $\pm$ 10.60	11.00	MU = 20 155.00 P= .582	52.08 $\pm$ 11.52	53.00	MU = 20 423.00 P < .744
	Cesarean	185	45.1	13.38 $\pm$ 10.27	11.00		52.57 $\pm$ 10.83	55.00	
Breastfeeding Experience	Yes	255	62.2	13.97 $\pm$ 10.73	11.00	MU = 17 276.50 P= .032	54.43 $\pm$ 10.84	56.00	MU = 13 919.00 P= .000
	No	155	37.8	11.78 $\pm$ 9.83	9.00		48.81 $\pm$ 10.94	51.00	
Receiving Prenatal Breastfeeding Training	Yes	82	20.0	10.65 $\pm$ 11.15	6.50	MU = 10 207.00 P < .001	52.76 $\pm$ 12.03	55.50	MU = 12 808.00 P= .505
	No	328	80.0	13.77 $\pm$ 10.18	11.00		52.19 $\pm$ 11.00	54.00	
Number of Deliveries	1st Delivery	152	37.1	11.53 $\pm$ 9.57 ^a	9.00	KW = 22.363 P= .000	49.55 $\pm$ 11.01 ^{a,b}	52.00	KW = 16.240 P= .000
	2nd Delivery	119	29.0	10.72 $\pm$ 7.61 ^b	10.00		54.50 $\pm$ 10.82 ^a	56.00	
	$\geq$ 3 Delivery	139	33.9	16.99 $\pm$ 12.27 ^{a,b}	14.00		53.44 $\pm$ 11.19 ^b	55.00	
Time of first breastfeeding	Immediately after delivery	174	42.4	12.71 $\pm$ 10.73	11.00	KW = 1.969 P= .579	52.96 $\pm$ 11.49	55.00	KW = 4.119 P= .249
	In the first 60 minutes	151	36.9	12.51 $\pm$ 8.92	11.00		52.75 $\pm$ 10.73	54.00	
	$\geq$ 61 minute	43	10.5	15.16 $\pm$ 12.62	11.00		50.79 $\pm$ 11.49	52.00	
	After the first 24 hours	42	10.2	15.15 $\pm$ 11.69	11.00		49.55 $\pm$ 11.21	52.50	
		$\bar{X} \pm SS$							
Age		30.24 $\pm$ 5.89				r: .058 P: .238	r: -.021 P: .675		
Number of Deliveries		2.23 $\pm$ 1.33				r: .244** P: .000	r: .134** P: .006		

BDI, Beck Depression Inventory; BSES, Breastfeeding Self-Efficacy Scale; KW, Kruskal–Wallis *H* Test; MU, Mann–Whitney *U* Test; r, correlation; X, Mean.

^{a,b}The Groups with the same letter are the groups with differences.

**P* < .05.

***P* < .01.

between the Beck Depression Inventory (*r* = .24) and the Breastfeeding Self-Efficacy Scale (*r* = .13) (*P* < .01) (Table 3).

Among the participants, those with low educational status were found to be at a significantly higher risk of depression requiring treatment than those with high educational status; those with poor income status than those with good income; those who were unemployed than those who were employed; those who did not have planned pregnancies than those who had planned pregnancies; and those who had given birth to 3 children or more than those who had given 1 or 2 births (*P* < .05).

It was seen that the mean Beck Depression Inventory score of the women was low (13.14 $\pm$ 10.44) and that their total Breastfeeding Self-Efficacy Scale mean score was high (52.31 $\pm$ 11.20). A significant negative significant relationship was found between the participants' total scores on the Beck Depression Inventory and Breastfeeding Self-Efficacy Scale (*r* = -.228, *P* < .001, Table 4).

Discussion

The study examined the relationship between depression and breastfeeding self-efficacy in women with infants aged 0-12 months living in Türkiye. When the mean age and educational level of the women

were taken into account, it was found that women with a lower educational level were at a higher risk of developing depression. The study revealed that women with breastfeeding experience exhibited higher scores in breastfeeding self-efficacy. Conversely, an increase in the number of births was found to correlate with a higher incidence of depression. Furthermore, the research revealed that women's employment status and income levels also have an impact on depression. In conclusion, the data indicate a negative correlation between depression and breastfeeding self-efficacy. This suggests that maternal mental health may influence a woman's desire and ability to breastfeed.

Table 4. The Relationship Between the Participants' Total Scores in Beck Depression Inventory and Breastfeeding Self-Efficacy Scale (n:410)

Scales	Min-Max	$\bar{X} \pm SS$	Score Range	<i>r</i>	<i>P</i>
BDI	0-63	13.14 $\pm$ 10.44	0-63	-.228**	.000
BSES	14-70	52.31 $\pm$ 11.20	15-70		

BDI, Beck Depression Inventory; BSES, Breastfeeding Self-Efficacy Scale; r, correlation; X, Mean.

**P* < .05.

***P* < .01.

These findings underscore the necessity of providing comprehensive support and information to women.

The study revealed a correlation between depression and several factors, including low education level, poor economic status, unplanned pregnancies, and giving birth to 3 or more babies. The meta-analysis conducted by Karaçam et al²⁶ (2018) indicates that postpartum depression rates are influenced by factors such as unplanned pregnancies, low socio-economic status, and being a housewife. These findings align with those of international literature. For example, Zell and Stockus found a strong relationship between postnatal depression and low socioeconomic status and education level.²⁷ Furthermore, poverty and a lack of social support have a detrimental impact on maternal mental health, which in turn affects breastfeeding behavior.²⁸ The stress experienced by low-income women can have a detrimental impact on their mental health and breastfeeding self-efficacy.²⁹ In this study, it is seen that the majority of women have a medium level of income. This situation may also cause stress while meeting the needs of the baby and the household. In this context, it is essential to implement strategies that enhance social support structures, expand educational opportunities, and provide economic assistance to improve the health of both mothers and children.

It is well-documented that breastfeeding self-efficacy has a positive effect on breastfeeding behaviors. The systematic review study by Lau et al³⁰ identified breastfeeding self-efficacy as one of the most important modifiable factors affecting the breastfeeding behavior of postpartum women.³⁰ Maternal emotional issues, such as depression and stress, can impact the mother's overall self-efficacy, including her ability to breastfeed. This is supported by research findings.^{16,17} The participants in this study demonstrated low levels of depression and high levels of breastfeeding self-efficacy. In other words, the study revealed a significant negative correlation between depression and breastfeeding self-efficacy. A study conducted in Türkiye revealed an inverse relationship between depression and breastfeeding, which aligns with the findings of this study.³¹ A study conducted in rural China found that emotional reactions such as stress, anxiety, and depression were not determinants of breastfeeding self-efficacy.³² A study conducted in Vietnam yielded similar results, indicating an inverse relationship between breastfeeding self-efficacy and depression.¹⁶ While the results of the study vary, it is clear that situations that increase maternal anxiety have a negative impact on breastfeeding in Türkiye. Factors affecting breastfeeding include inadequate spousal support, housework, financial concerns, distance from work, differences in educational level, and inadequate breastfeeding counseling.^{33,34} The traditional view of women in Türkiye often places a significant burden of family responsibilities on mothers, which has resulted in a lack of support for women in childcare.³⁵ In a study conducted in Iran, it was reported that cultural roles of women and family support affected breastfeeding success.³⁶ It is common for families and society to overlook the challenges faced by mothers in the postpartum period. This can hinder their ability to prioritize their own needs and those of their babies. The limited role of women in society, which often confines them to domestic responsibilities, has a detrimental impact on their mental health and the efficacy of their breastfeeding processes. In this context, cultural norms and societal expectations exert additional pressure on mothers, which has a significant impact on both maternal and infant health. It is crucial to empower and support women in order to improve both individual and public health outcomes.

The results of this study indicate that women with lower educational levels exhibited significantly higher scores on the Beck Depression Inventory, while those with university degrees or higher qualifications demonstrated significantly lower scores on the Breastfeeding Self-Efficacy Scale. A study by Özkan et al³³ revealed that mothers with

primary education had a statistically higher success rate in breastfeeding than those with a university education. The same study concluded that there was no association between educational status and depression.³³ The contradictory findings suggest that a high educational level, when combined with factors such as mothers' work responsibilities and socio-cultural factors, may have a negative impact on breastfeeding behaviors. In this context, while there is a relationship between mental health problems and breastfeeding self-efficacy among women with low education levels, the fact that women with high education levels experience more difficulties in breastfeeding suggests that education and support systems should be re-evaluated.

Notably, the highest birth rate in Türkiye is among those with no more than a primary school education.^{11,20} Women with lower levels of education tend to have higher rates of childbirth and are less engaged in the workforce. It can be reasonably assumed that these circumstances contribute to an increased prevalence of depression, while positive birth experiences have been linked to enhanced breastfeeding self-efficacy. Investing in the education of girls and ensuring they complete their studies without interruption has a positive impact on the health of future generations.

The results of the Beck Depression Inventory indicate that individuals requiring treatment for depression are more likely to have a lower income, be housewives, experience an unplanned pregnancy, and have given birth to 3 or more children. This study revealed a correlation between an increase in the number of births and breastfeeding experiences among women and a corresponding rise in depression levels and breastfeeding self-efficacy. Similarly, Ergezen et al²¹ (2021) reported that an increase in the number of births and breastfeeding experiences was associated with an improvement in breastfeeding success. A separate study conducted in Türkiye revealed that women with 3 or more pregnancies demonstrated enhanced breastfeeding success but exhibited elevated levels of depression.³³

The results indicate that an increase in the number of children to be cared for at home may have a negative impact on the emotional state of the mother, potentially leading to an increase in the perceived burden of tasks at home. Conversely, an increase in the number of births has been shown to have a positive impact on the breastfeeding experience. As evidenced in the literature, women with prior breastfeeding experience are more likely to breastfeed subsequent children successfully.^{33,34}

Limitations and Strengths

It should be noted that the study was conducted in a single hospital, which limits access to different socioeconomic and cultural groups. As a result, the findings may not be fully representative of the wider population. Furthermore, the cross-sectional design does not allow for a comprehensive examination of cause-and-effect relationships. Additionally, the use of a face-to-face survey method may result in a social desirability bias, whereby respondents may be inclined to provide answers that align with social expectations. Additionally, the demographic diversity of the participants was limited, which prevented the inclusion of individuals from a broader range of age groups, educational backgrounds, and socioeconomic statuses. Moreover, the Beck Depression Inventory only assesses depressive symptoms without considering other mental health concerns such as anxiety and stress. This limits the ability to evaluate the individual's overall mental well-being comprehensively. It should be noted that the study was conducted over a specific period, which may not fully account for the potential impact of evolving social and economic conditions. Therefore, it is essential to exercise caution when interpreting the findings.

On the other hand, the limited number of studies in the literature on this subject, reaching the number of samples representing the universe, and carrying out the study face-to-face and ensuring that the questionnaires can be checked immediately are the strengths of the study.

Conclusion

A relationship was found between women's depression status and their level of confidence in their ability to breastfeed. The number of births, planned pregnancy, education, and employment status were identified as key factors influencing breastfeeding self-efficacy. The primary factors associated with depression were identified as low education and income levels, unemployment, unintended pregnancy, and having 3 or more children.

In light of these findings, it is recommended that interventions be developed with the objective of reducing depression and increasing breastfeeding self-efficacy in women. Affordable measures such as increased participation of girls in education, increased employment of women, and the involvement of spouses and close family members in supporting the mother with household and child care can contribute to this goal. Additionally, the active provision of family planning services to prevent unwanted pregnancies can increase breastfeeding success. The successful initiation and termination of breastfeeding will safeguard the physical and mental health of both mother and child. Consequently, the risk of inadequate breast milk intake in future generations will be mitigated.

It is crucial to implement political and social initiatives that will provide enhanced support for women in Türkiye with regard to breastfeeding. It is essential to extend the paid leave period for working women after childbirth, to provide caregiver or nursery support, and to prevent situations such as dismissal or forced resignation due to pregnancy, which may result in women being unable to continue in their professional roles. At the same time, studies should be planned to ensure that women do not carry out infant and child care alone, which is seen as one of the social and cultural roles of women, and to provide support from their husbands and other family relatives. Another strategy for increasing the time women spend breastfeeding is to encourage husbands to take on a more active role in housework and childcare.

Data Availability Statement: The data that support the findings of this study are available upon request from the corresponding author.

Ethics Committee Approval: Ethics committee approval was received for this study from Ethics Committee of Dicle University (Date: 11.04.2022; No: E-14679147-663.05-266758).

Informed Consent: Written consent was obtained from the participants who agreed to take part in the study.

Peer-review: Externally peer-reviewed.

Author Contributions : Concept – E.Y.A., M.A.Ş.; Design – E.Y.A., M.A.Ş.; Supervision – E.Y.A.; Resources – E.Y.A.; Data Collection and/or Processing – E.Y.A., M.A.Ş.; Analysis and/or Interpretation – M.A.Ş.; Literature Search – E.Y.A., Ö.T.; Writing Manuscript – E.Y.A., Ö.T.; Critical Review – E.Y.A., Ö.T., M.A.Ş.

Declaration of Interests: The authors declare that they have no competing interests.

Funding: The authors declared that this study has received no financial support.

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