

THE EFFECT OF OXYTOCIN MASSAGE ON ANXIETY CHANGES IN BREASTFEEDING MOTHER

Kunawati Tungga Dewi

Correspondence: kunawatitunggade@gmail.com

Midwifery Master's Degree Program, Medical Faculty, Universitas Brawijaya, Malang, Indonesia

CASE REPORT

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ABSTRACT

Background: Anxiety that occurs in breastfeeding mothers is caused by various factors. Anxiety can reduce the hormone prolactin and oxytocin secretion so that breast milk production will be reduced. Oxytocin massage is a non-pharmacological therapy that is often performed to reduce anxiety and increase milk production. Oxytocin massage is a massage along the spine to the fifth-sixth rib to facilitate milk production.

Objective: This study aims to determine the effect of oxytocin massage on the anxiety changes of a breastfeeding mother.

Methods: This research was qualitative (case report) conducted on a 21 years old breastfeeding mother with a psychological problem in the form of anxiety. The subject complained of anxiety because breastmilk production is a little. She said it is her first baby and currently lives with her husband and mother-in-law. The subject wants to give exclusive breastfeeding to her baby. However, when the baby is fussy, the mother-in-law always suggests giving formula milk. Subjects had a history of caesarian section delivery and post-hospitalization due to wound infection. The assessment was carried out in the form of anamnesis and examination using HARS.

Results: The results of the HARS showed that the mother was in the mild anxiety category. The intervention given in this case is oxytocin massage therapy was carried out for 7 days. Then in the evaluation, the mother showed a decrease in anxiety after the oxytocin massage therapy.

Conclusion: Oxytocin massage can help mothers relax, reduce stress and increase milk production.

Keywords: anxiety oxytocin massage, mother breastfeeding.

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INTRODUCTION

Anxiety is an unexplained fear accompanied by feelings of uncertainty, helplessness, isolation, and insecurity. Anxiety is an emotional state without a specific object. This emotion has no specific object.¹ Anxiety is characterized by diffuse fear, unpleasantness, and vagueness. Often accompanied by autonomic symptoms, such as headache, sweating, palpitations, chest stiffness, and mild stomach upset. Anxiety is often experienced by almost humans and even occurs in breastfeeding mothers. Anxiety in breastfeeding mothers is often neglected and not handled properly.²

In Indonesia, from 2012-2013 there were 28.7% of breastfeeding mothers experienced lactation disorders due to anxiety. Primiparous mothers who experienced severe anxiety reached 83.4% and moderate anxiety at 16.6%, while multiparous mothers had 7% severe anxiety, 71.5% moderate anxiety, and 21.5% mild anxiety.³ The causes of anxiety in breastfeeding mothers are influenced by various factors such

as knowledge, psychology, economy, experience, and family support. After giving birth, the mother will experience physiological, psychological, and social adaptations. However, not all mothers can pass the adaptation smoothly. Breastfeeding mothers may experience psychological problems, such as anxiety. If anxiety in breastfeeding mothers is not handled properly, it will increase the likelihood of postpartum depression.⁴

Anxiety can be reduced by complementary therapies to create an atmosphere of relaxation, one of which is oxytocin massage. Oxytocin massage is a massage along the spine to the fifth and sixth intercostal bones to stimulate the oxytocin hormone which plays a role in breast milk production.^{5,6} The massage or the stimulation involved in the vertebrae will cause neurotransmitters to stimulate the medulla oblongata and this medulla oblongata will directly send a message to the hypothalamus in the posterior pituitary gland that it should produce oxytocin. This massage will also relax the intensity and will eliminate stress.⁷ According to research by Morhenn

(2012), massage on oxytocin can reduce the stress marker of adrenocorticotropin hormone (ACTH). By acting on corticotropin-releasing factor (CRF), oxytocin inhibits ACTH release. The purpose of this study was to determine the effect of oxytocin massage on changes in anxiety in breastfeeding mothers.⁸

METHOD

The research design was descriptive with a case study method involving 1 respondent, a breastfeeding mother with psychological problems in the form of anxiety. The anxiety questionnaire sheet that is used is Hamilton Anxiety Rating Scale (HARS). Before giving the oxytocin massage, a pre-test will be carried out with a HARS sheet. Then the oxytocin massage was carried out once for 1 week with a duration of 15 minutes of massage per meeting. After the intervention was completed, a post-test was carried out with an anxiety questionnaire (HARS) to determine whether there was an effect on respondents' anxiety.

The subject is a 21-year-old mother. The subject lives with her husband and mother-in-law. Her husband is 27 years old and works as a construction worker. The subject had given birth to her first child 2 months ago by section cesarean with prolonged labor. A week after delivery, the subject had a wound infection and had to be hospitalized for 1 week. The subject said that she wanted to give exclusive breastfeeding to her baby so that during his stay in the hospital, she still pumped her breastmilk to be given to the baby. Recently, the subject felt stressed, had difficulty sleeping, and felt that her breastmilk had decreased. At home, if the baby cried a lot, the mother-in-law said it is because of not enough breastmilk. She advised giving formula milk for her baby. This makes the subject less confident about her breast milk. A pre-test will be carried out with a HARS sheet. Then the oxytocin massage was carried out once for 1 week with a duration of 15 minutes of massage per meeting by the researcher. The following is the oxytocin massage procedure:

- a. Make sure the room is closed so that the mother feels comfortable.
- b. Before starting the massage, the mother should take off her upper clothes and bra and prepare a cup that is placed in front of the breast to accommodate the breastmilk that may drip out during the massage.
- c. Positioning the mother to face down on a table or chair.
- d. Then look for the most prominent bone in the back of the neck (cervical vertebrae 7).
- e. From the point where the bone, protrudes downward approximately 2 cm and to the left approximately 2 cm, that's where the point of massage is.
- f. Massaging using the thumbs of the left and right hands.
- g. Starting the massage with a circular motion slowly straight down to the limit of the bra, but can also be continued to the waist.
- h. The massage is carried out for 15 minutes.

After the intervention was completed, a post-test was carried out with an anxiety questionnaire (HARS) to determine whether there was an effect on respondents' anxiety.

RESULT AND DISCUSS

Before massage was given, it showed the score of HARS is 8 (mild anxiety) and after the oxytocin massage, the score is decreased to 5 (no anxiety). The results of this study are in line with Suraidi's research (2018) which states that oxytocin massage will create a feeling of comfort and calm so that it can stimulate the oxytocin hormone which aims to reduce anxiety.⁹ The anxiety that occurs in the postpartum period is due to the transition process to becoming parents. There is a great adjustment between their relationships and other people. Postpartum mothers can experience fatigue, role changes, and mood changes, such as sadness and anxiety, because the postpartum period is known as a real change that requires adjustment and can affect both, physically and emotionally.¹⁰ Less successful psychological adaptations lead to anxiety or depression in postpartum mothers. This will have an impact on babies, especially related to bonding attachments so their children tend to experience adverse developments.

Research conducted by Shaw et al (2013) found that psychological disorders in postpartum mothers are related to bonding attachment to babies.¹¹ The continuing anxiety condition of a postpartum mother has a negative impact on further development, both for the mother herself and for the baby. Postpartum mothers with psychological disorders can adversely affect mental health development, impaired bonding and attachment, and lack of self-care for mothers and babies.¹² Therefore, postpartum mothers' anxiety must be overcome as early as possible. So that the condition of the mother and baby continues to grow and develop properly.

Oxytocin massage is one of the several methods that are very safe and has healing benefits for the body. According to Delima's research (2016), physiologically through oxytocin massage, neurotransmitters will stimulate the medulla oblongata by sending signals to the hypothalamus in the posterior pituitary. So it will stimulate the let-down reflex or oxytocin reflex to release the oxytocin hormone. The oxytocin hormone causes the muscle cells around the alveoli to contract so the breastmilk is pushed out through the lactiferous ducts and flows for the baby to suck. Oxytocin massage will increase breastmilk production, facilitate breastfeeding, and provide comfort and relaxation to the mother.¹³ Relaxation can suppress tension and anxiety which can lead to stimulation of the hypothalamus.¹⁴ Massage increases serotonin production which results in reduced cortisol hormone, and reduced depression and can lead to increased dopamine, reduced norepinephrine, and reduced anxiety. Massage can cause opioid secretion by stimulating parasympathetic nerve fibers so as to reduce pain, reduce levels of the hormone cortisol and catecholamines that play a role in stress, and increase levels of oxytocin and endorphins.¹⁵ Endorphins are natural painkillers that act as neurotransmitters in pain, including in the spinal cord, where endorphins block the synapses of fibers that carry pain. Endorphins can also relieve pain when they are released into the bloodstream as hormones by the adrenal and pituitary glands. The more endorphin receptors one has, the more pain tolerance a person has so it will make a person feel relaxed, happy, and calm.¹⁶ Although oxytocin massage is proven to be helpful in reducing the anxiety of breastfeeding mothers, it does not rule out that there are other factors that also contribute, because a person's mental condition can be influenced by various factors.

CONCLUSION

Based on the results of the research that has been done, it can be concluded that there is an effect of oxytocin massage on changes in anxiety in breastfeeding mothers. However, further studies need to be done regarding the effect of oxytocin massage on anxiety by looking at other factors that can affect it.

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