



Systematic Review

Strategy Intervention to Prevent and Reduce Postpartum Depression: A Systematic Review**M. Elyas Arif Budiman, Supiah Ningsih Juita Sari, Winda Kusumawardani and Dhona Sutopo**

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ABSTRACT

Background: Postpartum depression is a non-psychotic depressive disorder with the criteria for diagnosis being that it can start early at four weeks postpartum. This can occur in the first year postpartum. Postpartum depression can result in deep sorrow and even the risk of suicide.

Method: The sources of the articles used were from a search of the Scopus, PubMed and Proquest databases with the keywords "postpartum depression, nursing intervention, psychology and postpartum". The search was restricted articles ranging from 2014 until 2018. After the articles were obtained, then the articles were reviewed until the stage of making a systematic review.

Result: The systematic review resulted in 15 of 19 choices of interventions that can be used to prevent and reduce the symptoms of postpartum depression. The results found that an internet cognitive behavior therapy intervention is very significant in terms of preventing and reducing the symptoms of postpartum depression. Nursing interventions are packaged in a variety of programs proven to reduce the postpartum depression variables and actions needed to prevent and reduce the symptoms of postpartum depression significantly.

Conclusion: Based on the results of the analysis of the 15 journals from the results of the study, internet cognitive behavior therapy intervention is recommended to prevent and reduce postpartum depression. This intervention can be developed practically and easily.

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INTRODUCTION

Depression is a mental health disorder characterized by moods that are depressed or where they lose interest in their activities, causing a significant decrease in their quality of everyday life. Depression can start from mild or moderate and range up to severe depression with or without psychotic features. Depression conditions are very commonly found in primary care settings where the incidence of depression that is most commonly found is post-partum depression (W.Stuart, 2013). Post-partum depression is a non-psychotic depressive disorder with the criteria for diagnosis starting at four weeks post-partum. This can occur in the first year after giving birth (Martha Raile Alligood, 2014).

Post-partum mood disorders such as postpartum depression are estimated to affect 10-20% of women and it is a serious health problem for both the mothers and their children (Prevatt, Lowder, & Desmarais, 2018). An average of 50% of post-partum depression in women lasts for 6 months where the onset of the feeling of post-partum occurs in about 50% to 80% of women within 1 to 5 days after delivery. The onset of postpartum depression from 2 weeks up to 12 months after occurs around 10-15% in postpartum women (W.Stuart, 2013). The impact of post-partum depression can be severe, one of which is suicide, which is a major cause of maternal death in the first year after childbirth. It is an indication that post-partum depression can have a negative impact on children's cognitive, socio-emotional and behavioral development. In addition, postpartum

depression can continue to have an impact on how the mothers care for their children after the post-partum period (Perkins, Yorke, & Fancourt, 2018).

Depressive symptoms interfere with every aspect of a mother's functional and social interactions. Depressed mothers may have difficulties related to being sensitive to their baby's cues and needs, and they feel less satisfied with their care. The assessment of maternal postpartum mental status and maternal adaptation are a part of the standard clinical care. Post-partum depression screening tools, such as the Edinburgh Post-partum Depression Scale (EPDS), are now widely used in health clinics in many Western countries. The symptoms of postpartum depression usually occur from birth through to six weeks postnatal. Maternal age, the number of pregnancies, childbirth or the number of children born alive is not associated with the symptoms of postnatal depression. Mothers with depressive symptoms, however, are less satisfied with their family life and their dynamics when compared to mothers without depressive symptoms (Salonen, Pridham, Brown, & Kaunonen, 2014).

Mental health and emotional well-being are important for complete health. Soul welfare is very necessary to be maintained or improved, one of which is through the promotion and prevention of health. Mental health promotion, when it is intended to improve the positive mental health in the community, can also support the achievement of goals and reduce the incidence of mental disorders. The prevention and promotion strategies are the same activities and they gave different but complementary results (W.Stuart, 2013). There is strong research evidence that identifies depression (depression) as being overcome through several interventions. One of the results of the research is through the activities of peer groups, cognitive behavior therapy and social support. The purpose of this research was to find out preventive measures to overcome the problem of postpartum depression.

MATERIALS AND METHODS

Design

A literature search was used to identify studies published in the last 5 years, from 2014 to 2018, in peer-reviewed journals for actions to reduce the incidence of postpartum depression.

Article Selection Criteria

The inclusion criteria of the article were 1) all peer-reviewed articles related to the action of reducing postpartum depression with a quasi-experimental approach and where the sampling method carried out was done via randomized controlled trials, 2) populations in the peer-reviewed articles were all postpartum mothers who experienced postpartum depression based on the criteria from the examination, 3) the measures taken in peer-reviewed articles were all non-pharmacological interventions that can reduce postpartum depression and 4) if the results measured in the peer-reviewed article saw a

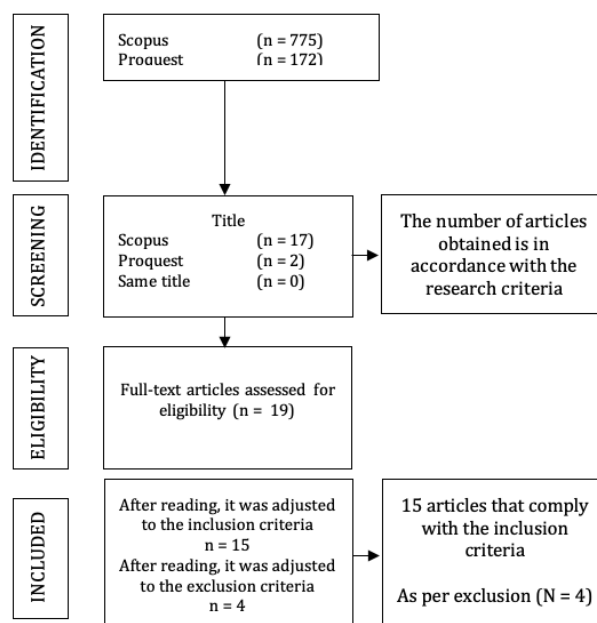


Table 1. Literature Search Summary

decrease in postpartum depression after the intervention was measured using a depressive instrument.

The exclusion criteria in this study were if the study did not report original data, if there were no non-pharmacological intervention measures, if there was no association with the handling of postpartum depression and if the journals were published before 2014.

Literature Search Strategy

The approach used was a systematic review that began with the selection of topics, and then the keywords were determined in order to search for journals (primary research) using English and Indonesian through several databases including Scopus, PubMed and Proquest. The search was limited to 2014 to 2018. The English keywords used were "Depression postpartum", Nursing, Psychology, Postpartum And "Intervention". The next step was to identify the title of each article that was considered close to the research desired. The title identification identified postpartum depression and postpartum intervention respectively.

There are 15 articles that are in accordance with the inclusion criteria. The articles that did not fit the inclusion criteria totaled 4 articles including 2 articles not in accordance with the type of study desired and 2 outcome articles are not as desired. Then the 19th article was screened again according to the exclusion criteria. After screening, the results of the articles were in accordance with the exclusion criteria.

Quality Study Analysis

Articles or journals that fit the criteria underwent critical appraisal analysis in accordance with the RCT research approach. The measuring instrument used was the critical appraisal skills program (CSAP). The data that was analyzed as then extracted and synthesized in accordance with the objectives.

RESULT

Characteristics

The results of the review of the research articles that met the inclusion criteria showed there to be 15 different types of intervention used to reduce or prevent the occurrence of postpartum peer support depression, an internet-based intervention, mindfulness-based cognitive therapy groups, sausage support, telephone-based cognitive behavior, psychotherapy centered on parenthood (PCP), adjuvant detached mindfulness and stress management, sexual counseling, internet cognitive behavior therapy, telephone-based peer support cognitive behavior intervention and focused counseling, lifestyle-based education, home visits, cognitive behavior and all of the above in combination with systemic family therapy and expressive writing. The interventions given in this study consisted of more than one intervention on average. The following are the results of the analysis of the existing journals in the review.

The settings from the 15 research articles were either in the community (n = 10) and in the hospital (n = 5). The number of samples varied from 30 respondents to a total of 760 respondents. The interventions given in this study ranged from internet-based media through to support, cognitive, counseling, stress management and mind management. Some in this study explained in detail the intervention procedures and how long the intervention was given for. The measuring instruments used in all of the articles consisted of the Edinburgh Postnatal Depression Scale, Generalized Anxiety Disorder-7 (GAD-7) questionnaire and the Depression Beck Depression Inventory. The parameters used were in accordance with the inclusion criteria to measure postpartum depression.

From the review of the 15 research articles selected, there were four research articles using a quasi-experiment, where the intervention was given in the form of peer support, psychotherapy centered on parenthood, internet-based intervention, telephone-based peer support intervention and mindfulness-based intervention therapy group. Ten studies used the RCT approach with the choice of interventions being expressive writing, sexual counseling, internet cognitive behavior therapy, adjuvant detached mindfulness and stress management training, telephone-based cognitive behavior, cognitive behavioral and AIDS-focused counseling, lifestyle based education, home visit, cognitive behavior and combination with systemic family therapy, and social support. If viewed in terms of the method selection, then in accordance with the level of evidence, the research that uses the RCT method approach can be more generalized than the research with the quasi-experimental design.

Effects of Intervention in Preventing and Reducing Postpartum Depression.

The prevention of mental disorders has the goal of reducing symptoms in people who have mental

disorders. This prevention uses health intervention strategies as a way to reduce the symptoms of mental disorders. In addition, the prevention of mental disorders has the goal of reducing the incidence, prevalence and recurrence levels. In this study, several interventions that have a positive effect when it comes reducing the depressive symptoms, especially in postpartum depression, will be described (Prevatt et al., 2018).

As a prevention strategy, the social support system means strengthening the social support aimed at increasing the protective factors and developmental methods used to protect or safeguard against the effects of potential stressful events. Social support can be used to design and implement actions in terms of primary prevention. One study explained that the social support felt by the mothers during pregnancy plays an important role as a protective factor against postpartum depression, both directly and indirectly, reducing the negative clinical aspects of birth experience (Tani, Castagna, Tani, & Castagna, 2016).

In addition, individuals and groups can develop, maintain, expand and use their social networks. Network therapy collects all important members of the family and it brings the networks of friendship together. The focus is then to strengthen the ties in the network and to break the dysfunctional features (W. Stuart, 2013). One network that can be applied to break the dysfunctional pattern in the form of postpartum depression based on the results of the study is the implementation of peer group interventions. The results of this study indicate that peer group programs are very effective at reducing postpartum depression (Prevatt et al., 2018). However, there are several telephone-based peer group developments that are considered to be more effective in the development of information and technology. One study showed that telephone-based peer support is effective against postpartum depression. Another study utilizing groups in the used intervention was a lifestyle education-based training study on prenatal and postnatal depression and paternal anxiety. The study showed significant results in decreasing postpartum depression (Mohammad, Charandabi, & Mirghafourvand, 2017).

Interventions by utilizing information and technology are very useful at reducing postpartum depletion. This is evidenced by a study that explains that Internet Cognitive Behavioral Therapy interventions can reduce postpartum depletion (Milgrom et al., 2016). Internet-based development CBT can also be applied through CBT that is phone-based which results in a reduction in depressive symptoms that is far greater than the standard care during the postpartum period. Both internet-based and telephone-based studies show that prevention strategies can be developed practically and that they can be easily made accessible to all groups (Ngai, Wong, Leung, & Chau, 2015).

The development of CBT is not only limited to the internet. The CBT program can also be applied with a combination of other interventions such as when the results of the research that show that the integration of counseling programs focused on cognitive-behavioral in prenatal care can be effective at improving the mental health of pregnant women (Ramezani, Khosravi, Motaghi, & Hamidzadeh, 2016). Another study applying CBT was focused on CBT combined with systemic family therapy. It improved depression and sleep quality in the patients with mild to moderate postpartum depression (Hou et al., 2014).

The development of interventions continues not only to develop CBT. One intervention that teaches clients to focus on their experiences also teaches them to be aware of the sensations, thoughts and feelings experienced that can also be developed into interesting interventions combined with others. One of the results of the research showed that both the Mindfulness-Based Cognitive Therapy Group Intervention and Adjunctive Treatment interventions had a clinically significant effect on the participants. In addition, the impact of the Mindfulness-Based Cognitive Therapy Group Intervention as well as the Adjunctive Treatment intervention is that it is beneficial in the acute phase and disease maintenance phase as evidenced by the symptom stability at three months, especially with depressive symptoms (Shulman et al., 2017). Other studies also explain that mindfulness can be combined with stress management training; this study shows that these results indicate that adjuvant detached mindfulness and stress management training are effective interventions to reduce postpartum depression (Ahmadpanah et al., 2017).

Mental health education can be done in any order. It can have a formal or informal structure and it can be addressed to individuals or groups. Health education can be done in various forms. An educational program is centered on the activities that can be done, one of which is counseling. Health education in the form of counseling is urgently needed for a woman who experiences postpartum depression where research shows that sexual counseling can help reduce stress, anxiety, and depression in women who suffer from sexual problems during the postpartum period (Zamani, Roudsari, & Moradi, 2017). This study explains that the counseling process has a positive impact on the decrease in depressions experienced by postpartum mothers. (Ahmadpanah et al., 2017)

In addition to several existing interventions, cooperation between the nurses and their families through home visits has also been shown to improve health, well-being and independence in the face of low income conditions. The first experience of becoming a parent, especially for a woman who has just given birth, is poignant (W. Stuart, 2013). The opinion of the stratum was also in accordance with the results of the study which explained that giving postpartum home visits can affect postpartum depression in a way that

is positive. This can improve maternal and infant health (Shamshiri et al., 2017). Although raising children is considered to be an important responsibility, relatively little attention is paid to believing that effective parenting is not a natural ability but that it needs to be studied. Parent-centered psychotherapy is a promising intervention used to treat perinatal depression and to help the mothers to get involved in parenting. Research clearly shows that involving new parents can increase the role of caregiving and it is also a process of preventing the occurrence of depression in postpartum mothers (Nanzer et al., 2012).

Using an intervention to reduce postpartum depression does not only involve feelings and cognition but it can also be a training process as a form of diversion to prevent depression, one of which is writing. Postpartum writing activities have also carried out research. This study shows that expressive writing can be an early universal intervention and its low cost is useful for preventing postpartum suffering in women (Carla, Caravita, Ionio, Milani, & Valtolina, 2015).

DISCUSSION

This systematic review provides evidence of the effectiveness of health interventions in relation to preventing and reducing postpartum depression. The review results explain that there are 15 out of 19 intervention options that can be used to prevent and reduce postpartum depression. The results of this review are certainly useful for nurses, both clinical nurses and community mental health nurses. The nurse can apply one of the health interventions as a form of prevention of the incidence of postpartum depression. Clinical nurses can conduct quality interventions and have the innovations tailored to the development of information and technology in an effort to prevent and reduce the symptoms of postpartum depression. The application of health interventions can prevent a better condition in the postpartum mothers who experience postpartum depression.

Mental health and emotional well-being are important for the health of postpartum mothers. Some studies have explained that the emotional health of the post-research mothers greatly influenced the development of the children, the health of the mother physically and psychologically and their contribution to their welfare. However, these studies cannot be generalized. Bias may occur. This can be caused by the non-homogeneous measurement parameters as well as the non-homogeneous research samples. Developmental research is better and an easy and flexible intervention is needed. In addition, extraction needs to be considered during the process of assessing the inclusion and exclusion criteria.

IMPLICATION IN NURSING PRACTICE

The results of the research reviewed critically in this systematic review indicate that there are viable

strategies to prevent and reduce the symptoms of postpartum depression in the prevention / control of the occurrence of postpartum depression. Although not all studies produce significant values in all of the measured parameters, this conclusion can be taken in the majority. Mental nurses can optimize the health intervention programs by modifying the method of giving the intervention, including the media used, as well as the other parties involved in the intervention process.

Based on the results of an analysis of 15 journals, the results of the research on internet-based interventions, telephone-based cognitive behavior, internet cognitive behavior therapy and telephone-based peer support intervention are recommended to be applied by mental nurses as interventions to prevent and reduce postpartum depression. These interventions have several advantages, including 1) the method of providing the intervention is relayed and involves both information and technology media, 2) it involves groups and behaviors in managing interventions, 3) the media used are very varied and informative which are easily accessible to the people affected by technological developments and 4) there is a flexible application in accordance with the postpartum needs.

CONCLUSION

The results of a systematic review of 15 research journals were related to the application of the latest nursing interventions to prevent and reduce the symptoms of postpartum depression. The implementation of nursing interventions should be facilitated by nurses who have a good understanding of the intervention and depression management. In preventing and reducing the symptoms of postpartum depression in the form of nursing interventions packaged into various programs, the interventions can be proven to significantly reduce the variables of postpartum depression. Internet cognitive behavior therapy and telephone-based peer support interventions are the methods recommended. It should also be considered whether the results of this research are flexible or not.

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