Postpartum depression describes a heterogeneous group of depressive symptoms and syndromes of women that occurs during the first year following childbirth (1,2). The American Psychiatric Association Diagnostic and Statistical Manual of Mental Health Disorders-IV (DSM-IV) uses the term “postpartum” more specifically to describe symptoms of major depressive disorder beginning within 4 weeks of delivery (1,3,4). The peak prevalence for postpartum depression is at 10 to 14 weeks after delivery, however, new-onset cases occur throughout the year (1,3). Postpartum depression affects 10 to 20% of new mothers each year, and this prevalence appears to be consistent across a variety of cultural and ethnic groups (3-5).

The consequences of postpartum depression have important implications for the health and care of both the mothers and their child. Thus, unrecognized and un-
treated postpartum depression may not only negatively affect the health of the mother, but also influence the health, care, and development of her children (2,5).

The impacts of postpartum depression on mother behaviors

Depressed mothers as a caregiver may be less sensitive, less confident, less affectionate and more neglectful toward their infants than non-depressed mothers (6,7). Consequently, these findings of depressive mothers may lead negative mother-infant interactions and a way for attributing negative characteristics to their babies and, these mothers may define more problems in relation to their infants (8,9). Depressed mothers may also demonstrate lower activity levels and decreased range of emotion and speak less and differently to their infants than non-depressed mothers (2,6). Furthermore, they may experience anxiety that is focused on the welfare of the child and concerns about their parenting ability. Depression does adversely affect a mother’s capacity to care well for her infant (7). Therefore, depressive mothers’ unfavorable parenting behaviors and attitudes regarding care-giving and health-related behaviors may lead the poor child outcomes including development, feeding, sleeping, temperament, behavior, and growth outcomes (2,3). However, as an important point, these negative behaviors or concerns did not occur in all mothers with postpartum depressive symptoms, and additionally, these difficulties did not occur in all children whose mothers had been postnatally depressed (1).

The impacts of postpartum depression on infants and children

Child development

There is a large and compelling body of evidence implicating postpartum depression with adverse child development outcomes. From these studies, it is found that developmental impacts of maternal depression are generally associated with the long-term maternal depression and infant difficulty, and are significant in the populations with poor social support, low parental education and low socioeconomic status (10-12). Generally, maternal depression may have negative impacts on the cognitive, social, linguistic and behavioral development of infants and toddlers that may have long-lasting results (6,12). For instance, Murray et al (13) show that depression in the early postpartum months and associated disturbances in the mother-infant relationship can pose a risk to the longer-term behavioral and social development of the child. Previous studies also show that infants of depressive mothers may be more likely to exhibit insecure attachment patterns (8,9). Older children and adolescents of depressed mothers may be more likely to experience depression, substance abuse, and conduct disorder during their adolescence (14,15).

Infant growth

Maternal depression was associated with infant growth impairment, and malnutrition in previous studies from low-income developing countries (16-18). For instance, Rahman et al show that (18) infants of depressed mothers have poorer growth compared with infants of psychologically well mothers. Similar findings were found in the previous studies conducted in developed countries. For example, O’Brien et al (19) showed that depression in mothers of children with faltering growth during the first 2 years of life is significantly greater than in mothers of children who are gaining weight appropriately.

Infant feeding

Mothers with postpartum depression may cease breastfeeding prematurely, and externalized more troubles and displeasures in relation to lactation (20-22). Previous studies indicate that postpartum depression may negatively affect the duration of breastfeeding (22,24). For example, Henderson et al (21) show that median duration of breastfeeding was 26 weeks for women with early-onset depression, 28 weeks for women with late-onset depression, and 39 weeks for women without depression.

Infant illness

Maternal depression may be associated with higher risk of infections and hospitalization in low-income countries. Rahman et al show that (18) infants of depressed mothers have an increased risk of diarrheal infection compared with infants of psychologically well mothers. Previous studies also indicate that children whose mothers reported depressive symptoms had increased use emergency department visits compared with those whose mothers did not have symptoms (25-27). It is suggested that it might be expected that in developing countries maternal depressive symptoms could influence maternal care behaviors, which, in turn, could increase the susceptibility to illness and non-organic failure to thrive (24).

Infant sleeping

Maternal depressive symptoms could contribute to child sleep disturbances, and the depressive mothers were more inclined to report sleep problems for their infants (28-30). For example; Dennis et al (28) show that mothers exhibiting depressive symptomatology
were significantly more likely to report that their baby cried often, behave less sleep time, indicate that their baby did not sleep well. Maternal report of infant sleep problems can be a result of the circumstance that the lower sleep times of mothers with or due to depression could recognize their infants’ night awakening more frequently, as compared to mothers without depression, so having longer nightly sleep periods (29).

Child temperament

Some depressed mothers may perceive more difficulties in their infants’ temperament (6,8). Previous studies show that maternal depression were related to fuss/difficult infant temperament such as colic symptoms and more parenting stress (31,32). Similarly, the infant colic or cry-fuss problems were found associated with postpartum depressive symptoms in other studies (33,34). Wake et al (35) showed that persistent cry-fuss problems were most strongly associated with maternal depression. With regard to older children, Civic and Holt (36) show that women with depressive symptoms were more likely to report that their children had to frequent temper tantrums or difficulty getting along with other children, and were difficult to manage, unhappy, or fearful.

Child abuse and neglect

Depressed mothers may demonstrate aggressive parenting behavior including inconsistent discipline and control, and abusing behavior toward their children (37, 38). Maternal depression may be directly associated with aggressive parenting behavior, corporal punishment and spanking (9,39,40). Hay et al (41) show that children of depressive mothers were at elevated risk for violence at age 11, especially if the mothers became depressed again.

Maternal depression has been shown to negatively affect receiving age-appropriate health-maintenance visits and up-to-date vaccinations in previous studies (29,35). Further, it is found that depressive mothers were less likely to apply preventative practices such as using a car seat, using electrical plug covers, using smoke alarm and administering vitamins (39,42,43).

Management of postpartum depression

Postpartum depression is a prevalent and treatable mental health problem. The recognition and treatment of postpartum psychiatric disorders is important in avoiding possible adverse outcomes with respect to both mother and infant (2). Screening of the mothers with an instrument may be appropriate way for diagnosis of postpartum depression in primary care clinics. Currently, three depression screening tools are designed and validated specifically to detect postpartum depression effectively: The Edinburgh Postnatal Depression Scale (EPDS), Postpartum Checklist and the Postpartum Depression Screening Scale (1).

Well-child follow-up visits during the first year of life may be an appropriate setting for early recognition and management of postpartum depression (2,44). Because pediatricians of a well-child clinic repeatedly encounter mothers during their postpartum year, it is important that they recognize postpartum depression using simple scales and appropriately advise and refer mothers for evaluation and treatment (2,44).

The treatment approaches of postpartum mood disorders do not differ from other mood disorders unrelated to childbearing (3,45). In this respect, pharmacologic or non-pharmacologic treatments may be used alone or in combination for the treatment of postpartum depression (5,46,47). Currently, psychotherapy remains the treatment of choice for mild-to-moderate postpartum depression (46,47). Some antidepressants such as paroxetine, sertaline, and nortriptiline were found to be efficacious and well tolerated antidepressants in lactating mothers, which do not cause any significant adverse effects on breastfeeding infants (3,47,48).

In summary, postpartum depression is a common problem and the consequences of postpartum depression have important implications for the health and care of both the mothers and their child. Unrecognized and untreated postpartum depression may not only negatively affect the health of the mother, but also influence the health, care, and development of her children. Depressive mothers’ unfavorable parenting behaviors and concerns regarding care-giving may lead the poor child outcomes including development, feeding, sleeping, temperament, behavior, and growth outcomes. Therefore, early management of maternal postpartum depression is crucial for preventing adverse effects on both mother and infant health and care. For this purpose, well-child visits during the first year of life may be an appropriate setting for maternal postpartum-depression evaluations, screening tests, early diagnosis and treatment.
REFERENCES


