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Pediatric Asthma with Bonding Therapy

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Research shows a strong correlation between disruptions in maternal-infant bonding and the subsequent development in childhood asthma. Delays in holding her baby, early childhood medical problems, and maternal traumas all increase the incidence of asthma. Recent studies point to Bonding Therapy as an intervention that can help or cure childhood asthma.

According to the World Health Organization's 2018 report, asthma is the most common chronic disease among children worldwide. In the U.S. there are 6.1 million children living with asthma which resulted in 3.5 million severe asthma attacks in 2016 alone [1]. It is the third-ranking cause of hospital admissions in children under 15 with over 14 million physician office appointments and 1.8 million emergency room visits. The American Lung Association in 2018 estimated the financial cost in America to be $56 billion in health costs, lost school/workdays, and early deaths. Asthma is responsible for 7 million missed school days annually, more than any other chronic illness.

Researchers have been identifying risk factors for the development of this disease. A significant focus of attention has revolved around the connection between maternal distress and the development of asthma in children. Mrazek at the National Jewish Center for Immunology and Respiratory Medicine in Denver found a link between early problems in parenting and the subsequent expression of asthma [2]. Klinnert noted that there was a link between maternal stress in caregiving and the subsequent development of asthma; and it could be identified before the child was three months old [3].

Maternal stress is known to be caused by many factors: Cesarean section deliveries, maternal health issues, psychological problems, and maternal despondency, to list a few. A Finnish study of 60,000 births found that mothers who delivered by Cesarean sections were 50% more likely to have a child who later developed asthma [4]. Emergency Cesarean section deliveries (assumed to be even more stressful) predictably raised the asthma rate up to 60%. This finding was replicated by Roduit et al. studying 2,917 children [5].

Annesi-Maesano and colleagues used a British cohort of 2583 mothers to investigate whether in utero and perinatal influences contributed to the development and severity of asthma in children [6]. Childhood asthma was more frequently reported by mothers when there had been health complications during pregnancy, labor, delivery, or when the child was ill during the first week of life. They concluded that there is evidence that in utero and perinatal factors may increase the risk of developing asthma.

Similarly, a Norwegian study of over 1.5 million mothers and 5,938 asthmatic children found that many types of pregnancy complications presented a risk factor for the development of asthma in the offspring [7].

Kozyrskyj studied healthcare records of 13,907 children and their mothers from Manitoba databases [8]. Prescription medication for depression or anxiety was used to identify maternal distress, and asthma status was determined from the children's asthma prescription records. They found that risk for childhood asthma was increased among children who were exposed to continued maternal distress from birth until age 7 years. Similarly, a Puerto Rican study concluded that maternal depressive symptoms were associated with an increased risk of asthma hospitalizations at age 1 year [3].

Mother-child interactions can predict the development of asthma in the child by school age. Mantymaa showed that maternal stress is associated with physical illnesses like asthma or infection [9]. As mentioned previously, Klinnert et al. investigated many factors associated with childhood asthma and found that parenting problems detected in infancy was a predictor of the development of asthma by age 3 [3].

In that same vein, Wright at Brigham and Women's Hospital at Harvard (2002) found that greater levels of caregiver-perceived stress at 2 to 3 months was associated with an increased risk of subsequent repeated wheeze among children during the first 14 months of life. Similarly, they found that prenatal stress was associated with altered innate and adaptive immune responses, concluding that stress-induced perinatal immunomodulation

may impact the expression of allergic disease in these children [10].

Cassibba found that children affected by asthmatic bronchitis were less securely attached than healthy comparisons [11]. These children showed less harmonious and comfort seeking behaviors than healthy children, indicating insecure attachment.

Bonding Disruptions and Asthma

In a review of the history of maternal issues connected to childhood asthma, Yatsenko found that many studies have shown conclusive correlation between poor maternal-infant bonding and the manifestation of respiratory disorders in children [12]. She points out that while it has not been demonstrated causally, it should be viewed as an important cofactor acting synergistically with other environmental and genetic factors to manifest asthma. It is also noted in this metareview that there seems to be help with the use of reparative techniques to heal the parent-child relational problems. She points to studies about Bonding Therapy by Madrid and associates as representing an inexpensive and effective way to reduce asthma attacks and respiratory distress.

Maternal-infant Bonding Disruptions and Childhood Asthma

Three studies by the Redwood Psychology Center investigated the relationship between pediatric asthma and the difficulties that a mother experiences in bonding with her baby. Using the "maternal-infant bonding" paradigm of Klaus and Kennell, these studies looked at the incidence of bonding disruptions within a pediatric asthma population as compared to well-baby group [13]. Klaus and Kennell postulated that a mother's bond with her infant can be disrupted if the mother and infant were separated at birth or if the mother was experiencing great stress or a trauma in her life during the perinatal period.

In the first of these studies Feinberg showed that bonding disruptions occurred three times more frequently in mothers of asthmatics than in mothers of well-babies (84% vs 24%) [14]. Schwartz found almost identical numbers: 86% vs 29% [15]. In a third study, Pennington found that four "Non-Bonding Events" were most predictive of the development of asthma: delay in holding the baby, family death in first year, emotional problems during pregnancy, and maternal emotional problems in the first year [16]. He concluded that bonding disruptions appear to be the mediating variable that links pediatric asthma with the various maternal factors and stressors that have been identified by numerous researchers.

Following this connection between asthma and disruptions in bonding, these researchers looked at what would happen if unbonded mothers were somehow bonded to their asthmatic children through a therapy that focused specifically on bonding. Bonding Therapy is a three-step procedure. (1) The non-bonding event (NBE) is discovered, such as separation at birth, death in the family, marital discord. (2) The NBE is metabolized, if necessary. (3) The mother imagines a new, desired birth. This three-step procedure seldom takes more than a few sessions.

Three studies (Madrid et al. 1994; 2000; 2005) used this Bonding Therapy with the mothers of 37 asthmatic children. Thirty-one of the children improved in the following measures: days housebound, interrupted sleep, wheezing with exercise, emergency doctor visits, use of rescue medications, overall use of medication, and the mothers' impression of over-all health. The age of the child was a significant factor in improvement: older children (>12 years old) did not improve, while younger children, even infants, improved the most.

Conclusion

The connection between childhood asthma and maternal stress is well-established. Maternal distress, C-section deliveries, physical illness, maternal grief, obstetrical complications, and separation at birth all fit into the paradigm of disruptions in maternal-infant bonding; and there is strong evidence that these bonding disruptions are linked to the development of childhood asthma. 80% of asthmatic children have birth histories of events that are compatible with bonding disruptions. Following this connection, Bonding Therapy shows initial evidence of improvement with childhood asthma symptoms. These Bonding Therapy studies shed light that something can be done about this childhood epidemic quickly and inexpensively [17-21].

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