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Complementary Health Approaches in The Newborn

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Abstract

World Health Organization (WHO) refers to Traditional and Complementary and Alternative Medicine and defines traditional medicine as: “The sum total of the knowledge, skills, and practices based on the theories, beliefs, and experiences indigenous to different cultures, whether explicable or not, used in the maintenance of health as well as in the prevention, diagnosis, improvement or treatment of physical and mental illness”. In the United States, the concept has recently been defined as complementary health approaches within the framework of holistic medicine, while in Turkey, similar to WHO, it is used as traditional and complementary medicine (GETAT). The use of holistic approaches to health has increased in the care centers both in the world and in Turkey. In particular, researchers have been investigating the potential benefits of integrative health care in a variety of situations, including pain management, symptom relief in cancer patients and survivors, and programs promoting healthy behavior. In nursing, the holistic care concept is considered to be within the scope of human mind-body-soul integrity. It is seen that holistic developmental care has been proposed in the newborn period in recent years and in this context, holistic care practices have been used to minimize the effect of environmental factors (light, sound, smell, touch etc.). Jean Watson, the theorist of the Human Care Theory, suggests using care-healing methods in nursing and recommends complementary therapies on the basis of these methods. In the literature, complementary health approaches such as massage, tactile/kinesthetic stimulation, therapeutic touch, reflexology, acupressure, acupuncture and music are listed to alleviate various diseases and symptoms in newborns. In 2014, a regulation on GETAT applications was issued in Turkey and 15 methods were included in this regulation. However, it is seen that the application of these methods is very limited in newborns. In this context, there is a need to discuss the complementary health approaches widely used in newborns in the world and the practices in Turkey. Such a discussion is thought to raise awareness of the health professionals working with newborns and to support the design of studies with high level of evidence, which may eventually be reflected in practice.

Keywords: Nurse, complementary health approaches, newborn, newborn care

Introduction

World Health Organization (WHO) refers to Traditional and Complementary and Alternative Medicine and defines traditional medicine as: “The sum total of the knowledge, skills, and practices based on the theories, beliefs, and experiences indigenous to different cultures, whether explicable or not, used in the maintenance of health as well as in the prevention, diagnosis, improvement or treatment of physical and mental illness” (1). The National Center for Complementary and Integrative Health (NCCIH) in the US uses the concepts of “Complementary and Integrative Health” and complementary health approaches (2). In Turkey, the Department of Traditional, Complementary and Alternative Medicine Practices was established in 2011 and based on the definition of the WHO, the concept of “Traditional and Complementary Medicine (GETAT)” is used. In our country, “The Regulation on Traditional, Complementary and Alternative Medicine Practices” was issued in 2014. This regulation

includes 15 methods, which are phytotherapy, larva application, mesotherapy, prolotherapy, music therapy, hypnosis, cup application, homeopathy, ozone application, leech therapy, osteopathy, acupuncture, reflexology, chiropractic, and apitherapy (3). NCCIH categorized complementary health approaches into two subgroups. The first subgroup is the natural products including herbal products, vitamins, minerals, probiotics and dietary products. The second subgroup is the mind and body practices which are yoga, meditation, massage, chiropractic, osteopathy, relaxation techniques, tai chi, gi gong, therapeutic touch, hypnosis, movement therapies, and acupuncture. Other complementary health approaches are traditional healers, ayurvedic medicine, traditional Chinese medicine, homeopathy, and naturopathy applications (2).

The American Academy of Pediatrics (AAP) stated that the use of complementary and integrative therapies for children has increased. The use of these therapies and preventive health approaches has increased especially in children with chronic diseases because of the desire to reduce the frequency and duration of prescribed drug use and because of the need for a more effective tool (4). It has been shown in various studies that the use of complementary health approaches in children varies between 11% and 81.5% in the world (5,6), while this rate varies between 44% and 87% in Turkey (7,8).

Although there is some scientific evidence regarding the effectiveness of many complementary therapies, there are still important questions that have not yet been addressed in well-designed scientific studies. These questions are whether such approaches/therapies are safe and whether they affect the care and treatment of healthy/sick individuals negatively when used.

The efficacy and safety of many complementary health products or approaches on children and infants have not been tested. The side effects of these methods on children emerge immediately and more often compared to adults, which needs particular attention. In addition, since all organs of children (especially liver and kidney) are more immature than those of adults, the side effects seen in children are more severe and threaten their health (2,9,10). In the AAP report, it is seen that there is information about the complementary approaches applied to children and adolescents, but the report does not include any information about the newborn period (11). The use of holistic approaches to health has increased in the care environments in the world and in Turkey. It has recently been reported that in the newborn period, holistic developmental care is recommended and, in this context, holistic care practices are used to minimize the effect of environmental factors (light, sound, smell, touch etc.). The use of neonatal integrative developmental care model in neonatal applications improves the health status of newborns (12,13). In the literature, mind and body practices commonly used to reduce various diseases and symptoms in newborns include massage, tactile/kinesthetic stimulation, therapeutic touch, reflexology, acupressure, acupuncture and music (2). Complementary health approaches in the newborn and providing nursing care to the mother and baby are very important to facilitate the adaptation of the newborn, to ensure mother-infant interaction, to reduce certain symptoms, to prevent complications, and to ensure postpartum comfort.

Massage:

Different findings have so far been revealed concerning the application of massage in newborns. A systematic review reported that for newborns requiring phototherapy (FT), on the third and fourth days of life, massage and phototherapy are more effective in reducing bilirubin compared to phototherapy only, and massage is an effective adjuvant in reducing FT time (14). As stated in the literature, massage has many benefits for the newborn and preterm infants. It supports weight gain, growth, and neurodevelopment, reduces application-related pain, reduces bilirubin levels, decreases hospital stay and infection formation, promotes immune response, improves gastric modality, enhances natural killer cell activity, reduces sleep problems, colic and crying, strengthens interaction/attachment, and reduces maternal stress and depression (15-17).

Tactile/kinesthetic stimulation: It has positive effects on anthropometric parameters, duration of discharge, immune system, bone development, stress reduction, and motor and neurological development in the newborn (18).

Therapeutic Touch in newborn preterm infants has been reported to maintain the stability of sleep and physiological functions (heart rate, respiration rate and oxygen saturation) (19)

Reflexology: It has been reported to reduce pain during the vaccination of the newborn and to positively affect heart rate, oxygen saturation, and crying time (20). In addition, it is effective in procedural pain and infantile colic (21).

Acupressure: It was found that during the newborn heel blood collection process, the duration of crying is shorter in the group treated with acupressure and thus it is recommended for pain and colic management (22-24).

Music therapy: It reduces application-related pain, stress hormone levels, and physiological parameters in premature babies. The developmental music therapy protocol supports the developmental skill acquisition of post-term infants at NICU (25,26). It also reduces breathing and heart rate, promotes sleep, nutrition and sucking, and reduces maternal anxiety. In cases where unpredictable noise adversely affects sleep and physiological stability, meaningful auditory stimulation, such as music, can contribute to the neurodevelopment of preterm infants (27,28).

Acupuncture:

It is a new and non-pharmacological option in the management of neonatal pain and it is promising in terms of relieving pain in newborns in minor painful interventions during routine medical care (29,30). It also appears to be safe and effective in reducing abstinence symptoms (Neonatal Abstinence Syndrome-NAS) in babies and is recommended as an additional non-pharmacological treatment option for NAS (31,32).

Conclusion

When considered as a whole, it can be said that these practices are complementary practices for the developmental and holistic care of the newborn. In professional nursing practice, the balance between scientific knowledge and decision-making is important. All the products and applications used in complementary health approaches affect neonatal health like medical drugs. Since the side effects of complementary health approaches may be higher in number and more dangerous in newborns than in adults, it is important that newborn nurses are aware of and responsible for all the practices that may affect infant health. Some of the complementary health approaches (music, massage, etc.) are among the independent functions of nurses. Nurses should improve their practices within the framework of holistic care. It is thought that complementary health approaches in the newborn may raise awareness of health professionals and support the design of research providing conclusive evidence, which may eventually be reflected in practice.

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