

The neonatal care from the perspective of continuous attention to woman and child's health

A SAÚDE NEONATAL NA PERSPECTIVA DE ATENÇÃO CONTÍNUA À SAÚDE DA MULHER E DA CRIANÇA

LA ATENCIÓN NEONATAL EN LA PERSPECTIVA DE LA ATENCIÓN CONTINUA A LA SALUD DE LAS MUJERES Y NIÑOS

Amélia Fumiko Kimura¹, Isilia Aparecida Silva², Maria Alice Tsunehiro³, Fernanda Paula Cerantola Siqueira⁴, Mariana Bueno⁵, Marlise de Oliveira Pimentel Lima⁶, Patrícia de Freitas⁷, Tereza Laís Menegucci Zutin⁸

ABSTRACT

The study is a literature review of theses and dissertations concluded from 2000 to 2009 developed by the Obstetric and Neonatal Nursing Research Group and Breast-feeding Center for Studies and Research of Nursing School, University of São Paulo, which focused on the maternal and perinatal impact on neonatal health. The scientific production shows agreement with the guidelines to promote neonatal and infant health established by national and international health agencies.

KEY WORDS

Infant, newborn.
Obstetrical nursing.
Neonatal nursing.
Breast Feeding.
Research.

RESUMO

O estudo é uma revisão narrativa de teses e dissertações concluídas no período de 2000 a 2009 produzidas pelo Grupo de Pesquisa Enfermagem Obstétrica e Neonatal e pelo Núcleo de Estudos e Pesquisa em Aleitamento Materno da Escola de Enfermagem da Universidade de São Paulo que focalizaram os fatores maternos e perinatais que repercutem na saúde neonatal. A produção científica evidencia alinhamento com as diretrizes estabelecidas pelos órgãos de saúde nacionais e internacionais para a promoção da saúde neonatal e infantil.

DESCRIPTORES

Recém-nascido.
Enfermagem obstétrica.
Enfermagem neonatal.
Aleitamento materno.
Pesquisa.

RESUMEN

El estudio es una revisión de la literatura de tesis y disertaciones producidas en el periodo de 2000 hasta 2009 por el Grupo de Investigación de Enfermería Obstétrica y Neonatal y por el Centro de Estudios e Investigación en Lactancia Materna de la Escuela de Enfermería de la Universidad de São Paulo, que se centró en las repercusiones maternas y perinatales en la salud del recién nacidos. La producción científica se muestra de acuerdo con las directrices para promover la salud neonatal y infantil establecidas por los organismos de salud nacionales e internacionales.

DESCRIPTORES

Recién nacido.
Enfermería obstétrica.
Enfermería neonatal.
Lactancia materna.
Investigación.

¹ Nurse. Professor at School of Nursing, University of São Paulo. Ph.D. in Nursing. Researcher with the Research Group on Obstetric and Neonatal Nursing (Grupo de Pesquisa Enfermagem Obstétrica e Neonatal, GPEON). São Paulo, SP, Brazil. fumiko@usp.br ² Nurse, Full Professor and Director of School of Nursing, University of São Paulo. Leader of the Center for Study and Research on Breastfeeding (Núcleo de Estudos e Pesquisas em Aleitamento Materno, NEPAL). São Paulo, SP, Brazil. isasilva@usp.br ³ Nurse. Ph.D. in Nursing. Professor at School of Nursing, University of São Paulo. Leader of GPEON. São Paulo, SP, Brazil. tamnami@usp.br ⁴ Nurse. Professor at Marília State University. Student of the Inter-units Nursing Doctorate Program at Ribeirão Preto School of Nursing, University of São Paulo. Member of NEPAL. Marília, SP, Brazil. fercerantola@usp.br ⁵ Nurse, PhD Candidate of the Nursing Graduate Program at School of Nursing at University of São Paulo. Member of GPEON; FAPESP Doctoral Fellowship. São Paulo, SP, Brazil. maribueno@hotmail.com ⁶ Nurse, Professor at Centro Universitário Adventista de Ensino. PhD Candidate of PPGE, School of Nursing at University of São Paulo. Member of GPEON. moplima@usp.br ⁷ Nurse. Master in Nursing. Nursing Laboratory Specialist at School of Nursing at University of São Paulo. Member of GPEON. patynurse@usp.br ⁸ Nurse, Professor at Faculdade de Medicina e Enfermagem de Marília. PhD Candidate of the Inter-units Nursing Doctorate Program at Ribeirão Preto School of Nursing, University of São Paulo. Member of NEPAL. Marília, SP, Brazil. terezaz@bol.com.br

INTRODUCTION

A guideline which orients the teaching and scientific production of the professors from the Department of Psychiatric and Maternal-Infant Nursing of the School of Nursing of the University of São Paulo (EEUSP) is the promotion of maternal and neonatal health as a continuing process of care, corroborating with the World Health Organization's directive and reaffirmed by the 47th Directing Board of the Pan-American Health Organization (PAHO), in 2006⁽¹⁾. The PAHO focus on continuing maternal, neonatal and infant health processes includes the baby's pre-conception, pregnancy, partum, post-partum and infancy periods. These organizational groups recommend that neonatal healthcare ought to be included in the health programs of Latin American and Caribbean countries, with emphasis in policies for health promotion and efficient scientifically-based programs for the care of the newborn and for the communities within the health system. The document still highlights that neonatal healthcare must be of high priority if the region intends to meet the Number 4 Developmental Goals of the Millennium established in 2000 and aimed at 2015 because *neonatal mortality must never again be left uncared for*.

As a constructing and instructing organization, the University has its share of responsibility in continuously capacitating professionals to attend to the healthcare demands of the population and in constantly reflecting about the impact of its contribution so to reduce the levels of morbidity and mortality within the population.

Among the factors which affect neonatal health one must highlight maternal conditions and provided healthcare to the newborn in the first week of life⁽¹⁾.

OBJECTIVE

The aim of this study was to review the scientific production of the Post-Graduation Programs of the School of Nursing, University of São Paulo, from the Obstetric and Neonatal Nursing Research Group (GPEON) and the Center for Study and Research on Breastfeeding (NEPAL), which analyze the maternal and perinatal factors that are reflected on to neonatal health.

METHOD

The current study is a narrative review of the theses and dissertations that were defended between 2000 to 2009 whose studies were linked to the projects developed by the research groups GPEON and NEPAL.

The access to the studies was led by the credentialed supervisors in each particular group and by the listing of

the theses and dissertations concluded in the evaluated period, indexed in the bibliographical database DEDALUS from the University of São Paulo (USP).

The GPEON was created in 1989, is thematically interested in proposing and analyzing models and strategies for nursing assistance to women and to the newborn. The NEPAL was created in 1994, is thematically interested in breastfeeding related to women's health. Both groups develop quantitative and qualitative research.

The content of the dissertations and theses concluded in the period was analyzed and those which involved the objects of interest of this study were selected and pooled together in two thematic groups: *Maternal factors which affect neonatal health* and *Practices for neonatal health*.

RESULTS

In the period from 2000 to 2009, 22 studies about neonatal health were concluded, among which, 9 were related to NEPAL and 13 to GPEON.

The main theme *Maternal factors which affect neonatal health* includes dissertations and theses about *Breastfeeding*, *Clinical maternal conditions* and *Parenting development*.

Among the studies about breastfeeding, one of them proposes a theoretical support related to the abilities of hearing, learning and developing trust to the professionals that work with breastfeeding counseling⁽²⁾. Another study analyzed nipple trauma and identified that the critical period for its occurrence is the first week postpartum⁽³⁾. The

state of anxiety of nursing mothers suffering from hypogalactia was evaluated in a dissertation which concluded that the most imposing factor is actually the breastfeeding technique⁽⁴⁾.

Other six studies about breastfeeding adopted the theoretical model of *Weighing up the risks and benefits*⁽⁵⁻⁶⁾. In this model, the nursing mother and the infant are interacting with each other and with the context in which they are inserted. The woman is the breastfeeding agent and her lactational characteristic and all subjective aspects are determining for the breastfeeding process⁽⁵⁻⁶⁾. Breastfeeding is seen by the woman as risk-taking for herself and for the child or as a form of granting benefits for her and for the child as well. This vision allows us to comprehend the diversity of manners in which women behave and act towards the breastfeeding experience, which is ultimately a dynamic act carried out in her everyday life, which encompasses all of her interactions and is not limited to the breastfeeding act as a bilateral interaction between mother-child. The concepts of the theoretical model of evaluation of risk and benefit assessment can be applied to women in different situations and the studies carried

Among the factors which affect neonatal health one must highlight maternal conditions and provided healthcare to the newborn in the first week of life.

out in groups have, until now, reaffirmed and expanded the comprehension of the model about the experiences of women who are breastfeeding.

Mothers of babies with lips and palate malformation attribute the same meaning to the breastfeeding experience and based upon them define their actions as mothers of children with normal suction capacity. They try to develop techniques and specific strategies to give better comfort and suction effectiveness to their children. The success of breastfeeding their children gives them a great sense of accomplishment. One of the elements which contribute to the meaning of breastfeeding is the constant evaluation of the maternal condition of maintaining lactation and the quality and quantity of milk⁽⁷⁾.

Maintenance of lactation is really evident and meaningful for mothers of premature and newborn children, critically and clinically compromised, because they spend limited time with their babies. However, mothers always expect to continue producing milk for future breastfeeding in order to contribute for the survival of their baby. In addition to this, women are socially demanded to fulfill this task⁽⁸⁾.

Thus, the woman goes through the process of conciliating her role as a mother and as a wife in her intimate-most relations, as to accomplish her protective and supportive roles for her baby and to keep active her marital condition and sexuality, without nullifying her feminine identity⁽⁹⁾. Either her sexuality might be hampered by the overshadowing of breastfeeding or breastfeeding might be put in jeopardy for the necessity of tending to her marital obligations.

When it comes to her sexuality, considering her bodily image, one of the relevant aspects has been the increase in the number of surgeries for breast reduction or augmentation. The level of anxiety generated by the preoccupation that this surgical procedure might interfere with the lactation process jeopardizes the maternal performance, even though no correlation between the fore-cited surgery and real damages to mammary glands has been shown, especially when it comes to modern surgical techniques. Frequently, her decision of submitting to the surgery was not made considering the breastfeeding process, but the consequences of a positive surgical result can easily supplant the possible negative effects and further benefit the woman in terms of breastfeeding⁽¹⁰⁾.

The model *Weighing up the risks and benefits* shows the complexity of breastfeeding and that the life quality under maternal conditions⁽¹¹⁾ and health necessities⁽¹²⁾ are affected by the breastfeeding process, particularly her health conditions, when it comes to the discomfort caused by mammary lesions, breast engorgement and lack of furniture adequacy for breastfeeding positions, lack of time for meals, sleep, rest and leisure. Studies have shown that women who exhibit lower scores for life quality were the ones with the lowest length of breastfeeding, especially when it came to exclusive breastfeeding⁽¹¹⁻¹²⁾.

Whatever the breastfeeding process is, a considerably important factor is the presence of the family and other relevant members who can support the woman from the beginning of the breastfeeding process to its end, when the family environment plays an important role in the selection and preparation of food⁽¹³⁾.

Support, in the perspective of nursing mothers, has three important characteristics: instrumental, which provides knowledge for the breastfeeding act and the other necessities of the child; structural, which encompasses all domiciliary help that may give her condition to effectively dedicate herself to breastfeeding, and affective, which stimulates and supports breastfeeding, a factor which relies in the husband as its main source of strength for the woman who is breastfeeding her babies⁽¹⁴⁾.

The studies related to *Clinical maternal conditions* showed the repercussion of maternal high blood pressure on clinical neonatal conditions and the prevalence of anemia in pregnant women before and after the addition of iron to wheat flour. The occurrence of high blood pressure during pregnancy showed a direct correlation with prematurity and low weight at birth⁽¹⁵⁾. The prevalence of anemia was lower in the fortified-flour group, but there was no statistically significant difference in maternal hemoglobin count before and after iron addition⁽¹⁶⁾.

Most studies which focused on *Parenting development* used qualitative research methods to identify the singularity of experiences between mothers and fathers. When analyzing the cited topic and considering young mothers and their experience with childcare to the newborn at home⁽¹⁷⁾, it was identified that being a young mother is basically to experience mistakes and glories with childcare facing fears and difficulties in the role of being a mother.

Parenting experiences with premature newborns was the object of study of a master's degree and doctorate researches. The results show that this is a condition of constant struggle and learning, riddled by ambivalent feelings of fear and hope⁽¹⁸⁾, however, for the mothers that experienced their premature child staying in a hospital which uses the Kangaroo Mother Care, the motherly experience post-hospital discharge shows the importance of this strategy in the development of the abilities and safety in childcare⁽¹⁹⁾.

The experience of mothers, whose children exhibited abdominal colic in an early stage was the object of study of a master's degree dissertation and the results showed that despite the preoccupation and suffering shared by the mothers, they learned to live with their children's colic, symptoms which tend to disappear with due time⁽²⁰⁾.

Another motherly experience came from the increase of cases of newborn admitted in the neonatal unit for treatment of congenital syphilis. The mothers were two-fold surprised for discovering that themselves and their children were both contaminated and blamed their relation-

ships as the source and expressed feelings of repulse towards the prenatal care they had received⁽²¹⁾.

Studies related to *Practices for neonatal health* focused on care and procedures aimed at the newborn provided by a family caretaker and health professionals employing, at most, quantitative research methods. Two studies had as their objective the use of the device called peripherally inserted central catheter (PICC)⁽²²⁻²³⁾, a procedure more and more commonly used in neonatal intensive care units as an crucial resource for the treatment and survival of critically ill infants. The best techniques for the installation, maintenance and removal of this apparatus were investigated, since the nursing professional plays an essential role in the prevention of possible clinical complications for the newborn.

Another evaluated aspect from two other studies was correlated to immediate caretaking of the newborn. The first tried to characterize the practices in the context of a normal birth center and the results made evident a high prevalence of breastfeeding and skin-to-skin contact and low necessity of interventions, such as upper airways aspiration⁽²⁴⁾. The second study analyzed the experience of nurses when it comes to caretaking of newborns with disfiguring malformations and it showed lack of preparation of the personnel to deal with this kind of situation⁽²⁵⁾.

Pain control in cardiac newborns during the post-operative period was the object of another study and the results made evident that neonatal post-operative analgesia is not effective, calling attention to the consequences for future child development in this groups of newborn, showing flaws in assistance and identifying gaps when it comes to knowledge related to neonatal pain control⁽²⁶⁾.

The repercussion of the implementation of this assistance model which tries to humanize healthcare and promote exclusive breastfeeding called *Baby-Friendly Hospital Initiative* (BFHI) was the object of evaluation of a

master's degree dissertation which tried to determine the prevalence of hypoglycemia in newborn hospitalized in an institution which used the fore-mentioned technique⁽²⁷⁾. The results showed smaller prevalence of hypoglycemia when compared to regular maternity hospitals. These findings also indicate the necessity of reevaluating the risk factors pointed by the current literature which do not apply to the population of healthy newborn admitted in hospitals which implement the steps defined by BFHI.

CONCLUSION

Among the strategies of the *National pact for the reduction of neonatal and maternal mortality* created in 2004 by the Brazilian Health Ministry, we must cite the medical care to the woman in postpartum period and to the newborn in the first week postpartum, maternal mental health evaluation, instruction and support to breastfeeding, vaccination and routine neonatal screening⁽²⁸⁾.

Our study corroborates with PAHO⁽¹⁾ and its ideals in the continuing process for maternal, neonatal and child health, and in this process it is crucial that health promotion is understood as an involving situation in which no parts can be cared for separately, but actually they must be regarded with their own necessities and with the bond that unite them.

Reviewing the studies from GPEON and NEPAL has allowed us to comprehend some of the factors that interfere with neonatal health and verify that these studies are aligned with the directives established by the national organizations and it has also shown that more studies of impact are needed for the reduction of neonatal morbidity and mortality, especially when related to the perinatal asphyxia, low weight and pre-term birth.

REFERENCES

1. Organização Pan-Americana de Saúde (OPAS). 47º Conselho Diretor da Organização Pan-Americana da Saúde. 58ª Sessão do Comitê Regional. Saúde Neonatal no Contexto da Saúde Materna, Neonatal e da Criança para o Cumprimento das Metas de Desenvolvimento do Milênio da Declaração do Milênio das Nações Unidas. Washington; 2006 set. 25-29.
2. Leite AM. Aconselhamento em amamentação na perspectiva da comunicação humana. [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2000.
3. Shimoda TG. Lesão da papila mamária: característica, frequência e fatores presentes na ocorrência desta intercorrência em um grupo de nutrizes internadas em sistema de alojamento conjunto [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2001.
4. Aragaki IMM. Estudo sobre o traço e estado de ansiedade das nutrizes que apresentaram indicadores de hipogalactia e nutrizes com galactia normal [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2002.
5. Silva IA. Pesando riscos e benefícios. São Paulo: Robe; 1997.
6. Silva IA. Construindo perspectivas para a assistência em amamentação: um processo interacional [tese livre-docência]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 1999.
7. Thomé S. O processo de amamentar para mães de crianças portadoras de malformação congênita de lábio e/ou palato segundo a perspectiva do interacionismo simbólico [tese]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2003.

8. Venâncio RS.. A vivência das mães de recém nascidos prematuros no processo de manutenção da lactação e amamentação durante o período de internação de seus filhos. [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2008.
9. Abuchain ESV. Vivenciando a amamentação e a sexualidade: dividindo-se entre ser mãe e mulher [tese]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2005.
10. Dornaus MFPS. Performance de lactação em amamentação em mulheres com prótese mamária [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2005.
11. Aragaki IMM. Avaliação e percepção de nutrizes acerca de sua qualidade de vida [tese]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2008.
12. Shimoda TG. Necessidade de saúde de mulheres em processo de amamentação [tese]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2009.
13. Salve JM. Estudos das representações sociais de mães sobre a introdução e a escolha de alimentos complementares para lactentes [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2008.
14. Muller FS. Representações sociais de um grupo de nutrizes sobre o apoio no processo de amamentação [tese]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2008.
15. Chaim SRP. Hipertensão arterial materna e condições do recém-nascido [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2001.
16. Santos AU. Prevalência de anemia de gestantes atendidas em uma maternidade social: antes e após a fortificação das farinhas com ferro [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2009.
17. Bergamaschi SFF. A vivência da puérpera-adolescente com o recém-nascido, no domicílio. [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2007.
18. Tronchin DR. A experiência de tornarem-se pais de recém-nascido prematuro [tese]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2004.
19. Couto FF. Vivência materna no cuidado do recém-nascido prematuro, no domicílio [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2009.
20. Kosminsky FS. Aprendendo a lidar com a cólica do filho [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo 2005.
21. Brito APA. A experiência de ter um filho internado em unidade neonatal para tratamento de sífilis congênita [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2008.
22. Toma E. Avaliação do uso do PICC – cateter central de inserção periférica: em recém-nascidos [tese]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2004.
23. Camargo PP. Procedimento de inserção, manutenção e remoção do cateter central de inserção periférica em neonatos [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2007.
24. Fernandes K. Práticas assistenciais no atendimento neonatal imediato em Centro de Parto Normal [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2004.
25. Almeida MMG. Assistir o nascimento de recém-nascidos com malformação desfigurante. [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2005.
26. Bueno M. Dor e analgesia em recém-nascidos submetidos a cirurgias cardíacas [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2006.
27. Freitas P. Prevalência e fatores associados à hipoglicemia transitória em recém-nascidos internados em Hospital Amigo da Criança [dissertação]. São Paulo: Escola de Enfermagem, Universidade de São Paulo; 2007.
28. Brasil. Ministério da Saúde. Secretaria de Atenção à Saúde. Pacto Nacional pela Redução da Mortalidade Materna e Neonatal [texto na Internet]. Brasília; 2004. [citado 2009 nov. 3], Disponível em: http://dtr2002.saude.gov.br/proesf/Site/Arquivos_pdf_word/pdf/Pacto%20Aprovado%20na%20Tripartite.pdf