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▼ WIC-Specific Item

PREVENTION OF RICKETS AND VITAMIN D DEFICIENCY IN INFANTS FACT SHEET

The fact sheet, Prevention of Rickets and Vitamin D Deficiency in Infants, is part of the series of Nutrition Fact Sheets for health care professional developed by the Division of Public Health, Nutrition Section. This fact sheet may be copied and distributed to appropriate health care providers in your area. The fact sheet is not meant to be a client education handout. A copy of the fact sheet is included in the attachments and may also be found on WIC PRO, <http://dhfs.wisconsin.gov/WIC/index.htm>

WORLD BREASTFEEDING WEEK 2004

Information on the 2004 World Breastfeeding Week, *Exclusive Breastfeeding: Safe, Sound and Sustainable*, can be found on...

- ◆ The La Leche League website - 2004 logo and information is available. The website is <http://www.lalecheleague.org/newlinks.html>
- ◆ The World Alliance for Breastfeeding Action (WABA) has the 2004 information posted at <http://www.waba.org.my>
- ◆ The toolkit from the International Lactation Consultants Association (ILCA) should be available to order in April. For information go to: <http://www.ilca.org/news/wbw.php>

FOR YOUR INFORMATION...

This information is provided as information only and is not an endorsement of the program.

On February 20, 2004, Abbott Laboratories' Ross Products Division announced the launch of its free worksite support lactation program entitled "Business Backs Breastfeeding: A Flexible Workplace Program for Breastfeeding Mothers." Ross is partnering with Working Mother Magazine on the initiative that is supported by the Families and Work Institute. See <http://www.ross.com/> for the link to the announcement. The "Business Backs Breastfeeding" booklet can be viewed at the following link:

http://www.ross.com/images/library/business_backs_breastfeeding.pdf

ROSS BREASTFEEDING RESOLUTION

Ross has introduced a breastfeeding resolution to be included in the WIC re-authorization process. The National WIC Association has taken a position that the resolution is not in the best interest of the WIC Program to support a breastfeeding resolution from a formula company. They have suggested additional language to the resolution should it be included in the re-authorization bill. The draft resolution and NWA Talking Points paper are attached for your information. NWA is urging action on this resolution.

LOCAL BREASTFEEDING COALITIONS

Attached are the meeting minutes from the Milwaukee, Chippewa County and Sauk County breastfeeding coalitions.

RESOURCES

- ◆ The California Perinatal Quality Care Collaborative has posted its quality improvement toolkit, Nutrition Support of the Very Low Birth Weight Infant, on its website, <http://www.cpqcc.org/NutritionToolkit.html> . The toolkit is free to download.
- ◆ The San Diego Breastfeeding Coalition's March newsletter has a feature article on breastfeeding the near term infant. The newsletter can be viewed at <http://www.breastfeeding.org>

IN THE NEWS

◆ **Breastfeeding, Sleep Arousal and SIDS**

NEW YORK (Reuters Health) - Breast-fed infants between two and three months of age are more easily aroused from sleep than infants who are formula-fed, according to a new study. The findings could have implications for the prevention of sudden infant death syndrome (SIDS), say the authors. "Arousal from sleep is believed to be an important survival mechanism that may be impaired in victims of SIDS," Dr. R. S. C. Horne and colleagues from Monash University, Victoria, Australia, note. Previous studies have shown that arousability is impaired by the major risk factors for SIDS, such as sleeping face down and maternal smoking.

In a study published in the January 2004 issue of Archives of Diseases in Childhood, the researchers examined whether arousability was altered by the method of feeding, and whether infants who are breast-fed are more easily aroused. The team studied 43 healthy full-term infants at 2 to 4 weeks, 2 to 3 months, and 5 to 6 months of age. While infants slept on their backs, nasal air jet stimulation was applied to induce arousal during active sleep and quiet sleep. The team calculated multiple measurements of arousal threshold across each sleep state. They compared arousal thresholds and sleep period lengths between formula-fed and breast-fed infants at each age. No differences in arousal thresholds were observed between breast-fed and formula-fed infants in quiet sleep. However, breast-fed infants were significantly more arousable than formula-fed infants in active sleep at 2 to 3 months of age. The investigators found no significant differences in arousability between males and females in either sleep state at any age studied. When sleep period length was compared, there were no differences found between breast-fed and formula-fed infants.

"However, at 5 to 6 months of age, breast-fed infants had significantly longer sleep cycles," Horne and colleagues write. "This study supports breast feeding of infants during the critical risk period for SIDS (two to four months) as reduced arousal, particularly in active sleep, could impair the ability of an infant to respond appropriately to a life threatening situation," they conclude.

◆ **Chemical PBDE Showing Up in Breast Milk**

SEATTLE - High levels of flame retardant chemicals called PBDEs turned up in samples of breast milk from nine Puget Sound women who participated in a new study by the nonprofit Northwest Environment Watch. "This is a real health concern," said organization research director Clark Williams-Derry. "Studies on laboratory animals suggest that PBDEs" - polybrominated diphenyl ethers - "may impair memory, learning and have other harmful effects on development." A report on the study stressed that woman should continue breast-feeding despite these concerns, however, citing benefits such as reduced risk of illness for infants. A news release quoted Dr. MaryAnn O'Hara of Seattle, a breast-feeding expert, as urging "swift action to get PBDEs, mercury and other toxins out of the environment and out of our bodies."

The study report, press release, and related materials are available on the following website: <http://www.northwestwatch.org/pollution>.

The Breastfeeding Coalition of Washington's summer 2003 newsletter, Breastfeeding Matters, has an excellent overview of the PBDE issue available at: http://www.hmhbwa.org/pdfs/BCW_news1_summer2003.pdf

La Leche League has a statement, Breastfeeding Remains the Best Choice in a Polluted World that can be accessed at <http://www.lalecheleague.org/Release/contaminants.html>

ILCA has a position paper, Breastfeeding, Breastmilk and Environmental Contaminants, is available to download on their website, <http://www.ilca.org/pubs/index.php>

◆ **Neurodevelopment in Children Born Small for Gestational Age: A Randomized Trial of Nutrient-Enriched Versus Standard Formula and Comparison With a Reference Breastfed Group.** PEDIATRICS Vol. 113 No. 3 March 2004, pp. 515-521

Many studies have shown that children born small for gestational age (SGA) are at a neurodevelopmental disadvantage. The researchers have shown that nutrient enrichment of formula fed to term SGA infants improves their growth and hypothesized that it also would improve their neurodevelopmental outcome. This study was a randomized, controlled trial of infants fed standard term-infant ($n = 147$) formula or nutrient-enriched ($n = 152$) formula for the first 9 months. A reference group of 175 breastfed SGA infants was also recruited. Healthy, term infants with birth weight <10th percentile were recruited in 5 maternity hospitals in Cambridge, Nottingham, and Leicester, all in the United Kingdom. Breastfed infants had significantly higher MDI and PDI scores at 18 months than formula-fed infants. Confounding factors accounted for 34% of the observed association between breastfeeding and MDI score and none of the association between breastfeeding and PDI scores. The researchers concluded that the previously reported enhanced linear growth in SGA children fed enriched formula was not matched by a neurodevelopmental advantage. At 9 months, girls fed the enriched formula had a significant developmental disadvantage, although this was not seen at 18 months. Later follow-up will determine any long-term effects on health or development. Meanwhile, use of enriched formula for term SGA children should not be promoted.

It seems that breastfeeding may be especially beneficial for neurodevelopment in children born SGA.

◆ **Does Breast-Feeding in Infancy Lower Blood Pressure in Childhood?** *Circulation*. 2004; 109:1259-1266

Breast milk 'does cut heart risk'? There are undisputed benefits to breastfeeding. Breastfeeding does have a positive long-term effect on reducing blood pressure, research has suggested. The study, by Bristol University, suggests that breast-fed babies grow up to have lower blood pressure than their bottle-fed counterparts. If true, the finding, published in the journal, *Circulation*, could mean breast-fed babies are less likely to develop heart disease. The study focused on 4,763 children from birth to the age of seven. The researchers found that children who had been breast-fed had, on average, a systolic pressure reading 0.8 mm Hg lower than those who were bottle-fed. Diastolic pressure was also lower - on average by 0.6mm Hg - for breast-fed babies. The findings held even when other factors such as birth weight, and mother's socio-economic status were taken into consideration. The researchers found that the longer a baby was breast-fed, the larger the effect on systolic blood pressure appeared to be. However, no such effect appeared to apply to diastolic blood pressure. Although the difference between breast-fed and bottle-fed children were relatively small, it is possible they could still be significant. Lead researcher Dr. Richard Martin said a 1% reduction in systolic blood pressure across the population would prevent 2,000 premature deaths a year in the UK. He said: "Around 40% of all infants in the USA or UK are never breast-fed. "If breast-feeding rose from 60% to 90%, approximately 3,000 deaths a year may be prevented among 35 to 64-year-olds."

The Bristol team believes that the nutritional content of breast milk may be the key. Breast milk contains long-chain polyunsaturated fatty acids, compounds thought to affect the development of blood vessels. Infant formula supplemented with the same fatty acids has also been associated with lower blood pressure. In addition, breast-fed babies tend to consume less sodium, which is closely linked to blood pressure. Formula feeding can also cause babies to eat more than they need and can, in some babies, cause them to put on weight too rapidly. Excess weight is another risk factor for high blood pressure. Lower blood pressure is directly linked to lower risk of heart attack, stroke, kidney disease and other related illnesses.

EDUCATIONAL AND TRAINING OPPORTUNITIES

April 23, 2004	La Leche League 2004 Lactation Specialist Workshop Breastfeeding: Evidence-Based Success For information: www.lalecheleague.org	Minneapolis, MN (+ other locations)
April 29 - May 1, 2004	LLL The Hidden Feelings of New Motherhood: Helping Breastfeeding Mothers Cope with Depression, Trauma and Past Abuse Continuing Education Day is April 29, 2004 La Leche League Leader Enrichment Day is April 30, 2004 WI Area Parenting and Family Conference: Friday Evening April 30, 2004 through Saturday afternoon May 1, 2004 For information: Wendy Copeland, 262-896-7797 or WendyCopeland@juno.com or www.llofWI.org	Wisconsin Dells, WI

July 15-18, 2004	ILCA 2004 Conference and Annual Meeting Best Practices: Supporting Breastfeeding Worldwide For information: http://www.ilca.org/conference/index.php	Scottsdale, Arizona
October 22 and 23, 2004	Wisconsin La Leche League Professional Continuing Education day and Leader Enrichment Day	Wisconsin
November 15-19, 2004	Lactation Counselor Certificate Program (CLC) Center for Healthy Children For information: http://www.healthychildren.cc/CLC.htm	Madison, WI

Ongoing Educational Opportunities

- The Center for Breastfeeding offers the Lactation Counselor Certificate Training Program (CLC) several times a year at different sites around the country. For course information, locations and dates go to www.healthychildren.cc
- The Certified Breastfeeding Educator (CBE) program presented by Debi Bocar is available at different locations and dates each year. For course information, locations and dates go to <http://www.lactation-consultant-services.com/>
- Lactation Education Resources offers online continuing education modules and self-learning programs. For information go to www.LERon-line.com
- BreastEd Online Lactation Series is a series of 10 individual courses. For information go to www.health-e-learning.com
- Wichita State University has a distance course on human lactation. For information go to <http://getonline.wichita.edu>
- The University of Medicine and Dentistry of New Jersey has a web and CD interactive, comprehensive educational program for Breastfeeding Management. For information go to www.umdnj.edu/lactation
- Case Western Reserve University: Web based "Breastfeeding Basics" course at www.cwru.edu/med/breastfeeding, directed at health professionals.

If you have any questions or comments regarding this update please contact:

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