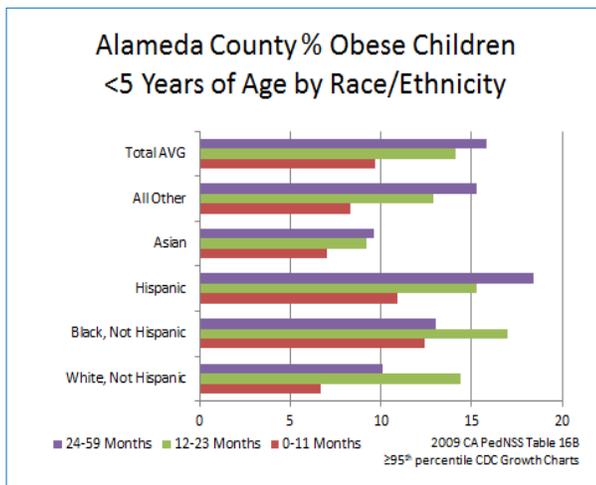


## CHDP Update

### Preventing Obesity Begins With Breastfeeding<sup>2</sup>

Alameda County infants and children are not immune to the growing national epidemic of childhood obesity. Approximately 9.7% of the 20,000 babies born in Alameda County each year will be identified as obese in their first year of life. Approaching the second year of life, that rate increases to 14.1% and by three to five years of age the rate rises still to 15.8%.<sup>1</sup> By middle school age, an average of 34% of Alameda County youth will be overweight or obese, with rates even higher (42%) in the cities of Oakland, Hayward and San Leandro.<sup>2</sup>

Social, physical and economic factors compound the quality and quantity of infant and child nutrition and a child's risk for overweight and obesity. Since obese children are at risk for becoming obese adults, cardiovascular disease, diabetes and other adult diseases related to obesity may well continue to persist from early nutritional health disparities.



**Healthy People 2020 objectives aim to reduce obesity in children 2-5 years of age by 10%.**

However, addressing the complexity of factors in early life course obesity may daunt even the most seasoned health professional.

What evidence based best practices and resources are available to assist families and health care providers with early life course obesity prevention in Alameda County?

The Centers for Disease Control and Prevention and the U.S. Surgeon General confirm: **Breastfeeding offers significant protection against childhood obesity, decreasing a baby's risk of becoming an overweight child with each month of breastfeeding.**

A CDC meta-analysis finds that breastmilk feeding can **reduce incidence of obesity by 32%**<sup>3</sup> when following AAP, AMA, AAFP, and ADA shared recommendations: *"exclusive breastmilk feeding without supplemental foods and liquids for about the first 6 months of life continuing with the addition of complementary foods from 6-12 months of age."*<sup>4</sup>

Human milk is nutritionally complete, providing all necessary nutrients in the first six months of infant life. Human milk contains a variety of proteins, enzymes, hormones and bioactive substances that optimize immune health, decrease infections, promote growth of optimal gut flora, and its composition changes over time to meet the specific biological needs of the human infant. Human milk also delivers fatty acids that benefit neurological and cognitive development, including a possible increase in intelligence quotient (IQ).<sup>5</sup>

The Department of Health and Human Services, Office of Women's Health, Blueprint for Action on Breastfeeding advocates: **exclusive breastmilk feeding during the first six months of life is the most important nutrition intervention a mother can do to improve the immediate and long-term health of her infant.**

***"Breastfeeding is a natural 'safety net' against the worst effects of poverty... It is almost as if breastfeeding takes the infant out of poverty for those first few months in order to give the child a fair start in life and compensate for the injustice of the world into which it was born."***  
-James P. Grant, Exec Director, UNICEF

### Increased health risks of formula:

- 257%** Hospitalization for lower respiratory infection, costing an average of \$4338
- 178%** Diarrhea and vomiting
- 100%** Acute ear infection
- 64%** Type II diabetes
- 56%** SIDS
- 32%** Childhood obesity
- 27%** Ovarian cancer in mother
- 4%** Breast cancer in mother

US Dept of Health and Human Services, The Surgeon General's Call to Action; 2011

In addition, breastfeeding mothers report lower stress levels and better moods,<sup>6</sup> potentially inherent to endocrine and autonomic mediation of lactation, promoting better maternal-infant harmony.

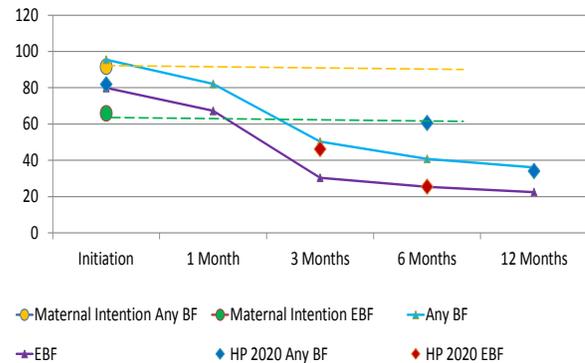
### Alameda County Breastfeeding Rates

In-hospital Newborn Screening Test 2010 data shows breastfeeding initiation rates for Alameda County in line with Healthy People 2020 objectives and slightly above Maternal Infant Health Assessment (MIHA) estimation of maternal intent before birth to breastfeed exclusively (EBF=65.9%) or any breastfeeding (Any BF=91.6%). Breastfeeding duration statistics from Alameda County Public Health Women Infants & Children (WIC) program allow us to track duration for most CHDP eligible mothers also on WIC.

In the period immediately following discharge, rates of both exclusive and any breastfeeding drop significantly. **Less than half of low income mothers in Alameda County initiating breastfeeding and attempting to follow AAP recommendations to breastfeed their babies are able to achieve their goals.**

**Early supplementation has a detrimental and often lasting effect on maternal milk supply.**

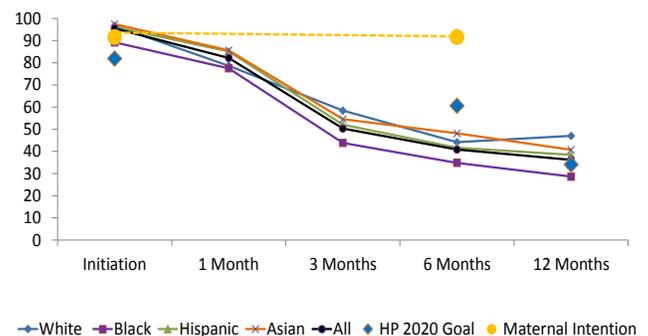
### Breastfeeding Rates Alameda County (Jan-June 2012)



Sources: Maternal Infant Health Assessment (MIHA) Survey, 2010; California Hospital Breastfeeding Report 2012 (<http://calwic.org/factsheets2012>); Alameda County Dept. of Public Health WIC Data July 2012

By six months for any breastfeeding, no group meets Healthy People 2020 goals (60.6%), and African American women fare the worst with only 34.8% breastfeeding at all by six months.

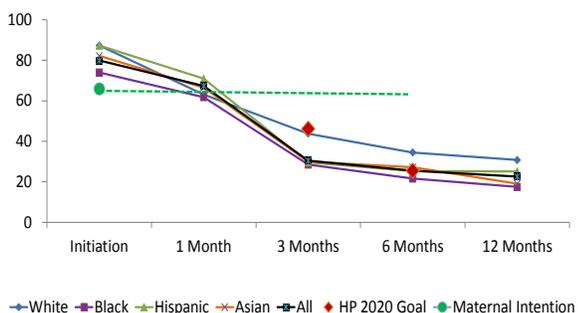
### Any Breastfeeding by Race/Ethnicity Alameda County Jan-June 2012



Sources: Maternal Infant Health Assessment (MIHA) Survey, 2010; California Hospital Breastfeeding Report 2012 (<http://calwic.org/factsheets2012>); Alameda County Dept. of Public Health WIC Data July 2012

Exclusive breastfeeding rates at three months also fall short of HP2020 objectives (46.2%), with White EBF rates (43.8%) within range of this goal, but with others further off (28-30%).

## Exclusive Breastfeeding by Race/Ethnicity Alameda County Jan-June 2012



Sources: Maternal Infant Health Assessment (MIHA) Survey, 2010;  
California Hospital Breastfeeding Report 2012 (<http://calwic.org/factsheets2012>);  
Alameda County Dept. of Public Health WIC Data July 2012

Maternity care and lactation research discredits theories of cultural preferences for or against breastfeeding: when policies and practices promote access to education and evidence-based care for all, disparities in breastfeeding close between cultural groups.<sup>7</sup> **Common practices are distinguished from cultural values.**

### Reasons Mothers Give Supplements Early<sup>8</sup>

- Hospital or care provider gave supplement (most do not give information on continued supplementation or health risks)
- Perceived insufficient milk
- Mother did not attend a prenatal class on breastfeeding

According to the most recent CDC Maternity Practices in Infant Nutrition and Care Survey (mPINC 2009), **less than 17% of perinatal hospitals in the East Bay provide appropriate discharge planning** (referrals and other multi-modal support) to support breastfeeding.

Every perinatal hospital in Alameda County and Contra Costa County currently participates in a *Regional Breastfeeding Quality Improvement Taskforce* together with WIC Regional Breastfeeding Liaisons and the Regional Perinatal Programs of

California (RPPC) leadership to improve policies and practices that support breastfeeding. The Joint Commission inclusion of Exclusive Breastfeeding in Perinatal Core Measure 5 and the passage into law of *The Hospital Infant Feeding Act 2011* which requires perinatal hospitals to enact California Model Hospital or Baby Friendly infant feeding policies, has amplified efforts to establish maternity practices supportive of breastfeeding, including staff training and structural and organizational aspects of care delivery to improve initiation of exclusive breastfeeding, and facility discharge planning to ensure support for successful duration.

**Access to lactation care and properly managed breastfeeding fosters maternal self-efficacy and allows for good hydration and nutrition, with minimal to no need for artificial formulas.**

A recent Cochrane Collaboration review and meta-analysis of breastfeeding support interventions at the highest tier of evidence found the following:

- Support interventions reduced the number of women who stopped breastfeeding before 6 months and reduced the number of women who were no longer breastfeeding exclusively at 4-6 weeks and at 6 months
- Face to face support was more effective than telephone support
- Support interventions were more effective in populations in which breastfeeding initiation was high
- Lay support was more or as effective as professional support in reducing breastfeeding cessation
- Interventions in which mothers had to ask for support, travel a distance to ask for support, and in which only one interaction was provided were NOT effective in increasing breastfeeding duration and exclusivity.

The review concludes:

**“Support that is only offered if women seek help is unlikely to be effective. This indicates that women should be offered predictable, scheduled, ongoing visits.”<sup>9</sup>**

## Breastfeeding Promotion in CHDP

Children’s Medical Services is currently developing a new Health Assessment Guideline for Breastfeeding to assist CHDP providers in establishing consistent best practices supportive of breastfeeding, to include:

- Infant feeding assessment and periodicity of follow up
- Effective counseling techniques and educational resources with key messages
- Creating a breastfeeding friendly health care environment
- Referrals and community resources

The 2012 WIC Breastfeeding Community Assessment conducted throughout Alameda County involved special inclusion of all CHDP providers serving WIC program eligible infants and children. Each year, approximately 4,000 infants (under age one) are enrolled in WIC and receive primary health care from 73 CHDP providers. Some notable findings:

- **Referrals for breastfeeding services are made by 54% of CHDP providers**, mostly through informational brochures given to patients with no two-way communication with referral on feeding plans or follow up.
- **Most of these refer to WIC for peer counseling and breastfeeding support with good results, but want better communication and greater availability of services for all WIC participants.**
- A third of CHDP providers requested increased access to breastfeeding services for mothers, better referral protocols for lactation services, and in-service education for staff
- No CHDP provider operates a breastfeeding warm line and only one offers counseling after hours.
- While **44% of providers note they offer breastfeeding counseling, 95% do not require any breastfeeding training of staff**; 86% have no

Certified Lactation Educators (CLE) on staff, 95% have no Board Certified Lactation Consultants (IBCLC) on staff, and only one office has a part time Breastfeeding Peer Counselor.

- Although 54% of providers state that they do not offer formula samples or coupons to pregnant or postpartum women, **45% provide postpartum women formula samples and coupons and 18% provide formula samples and coupons both prenatally as well as postpartum**

**Exposure to formula promotional materials significantly increases breastfeeding cessation in the first 2 weeks of life.<sup>10</sup>**

### Breastfeeding Friendly Office Environment

- Display posters that promote breastfeeding
- Avoid bottle feeding images – their intent is to advertise formula. Instead offer magazines and booklets that promote breastfeeding and that do not contain formula advertisements
- Provide educational materials that support exclusive breastfeeding as optimal nutrition
- Do not give gift packs containing formula samples or coupons to breastfeeding mothers

### Suggested Topics to Discuss

- Human milk is the best food you can give your baby in his or her first year of life
- Human milk helps to protect your baby from many illnesses
- Breastfeeding saves money because you do not have to buy formula
- Breastfeeding is easier than mixing formula and heating bottles
- Breastfeeding helps you bond with your baby. Holding your baby while nursing helps your baby feel loved and close to you
- Nursing uses extra calories and makes it easier for you to lose weight after your baby is born
- Breastfeeding lowers your risk of getting some kinds of cancer

**For information about clinical practice protocols visit the Academy of Breastfeeding Medicine:**

<http://www.bfmed.org/Resources/Protocols.aspx>

## CHDP & WIC: Partners in Breastfeeding Support and Obesity Prevention

WIC is a federally funded health and nutrition program for Women Infants and Children.

Participants must meet income guidelines and be pregnant, new mothers, infants, or children under five. Quality nutrition services are the centerpiece of WIC: nutrition education; breastfeeding promotion, education and support; nutritious foods; and improved health and dental care access for low- and moderate-income women with or at risk of developing nutrition-related health problems such as being overweight or obese, or having Type II Diabetes.<sup>11</sup>

In Alameda County, 7 WIC agencies provide services to over 41,300 women infants and children each year at over 16 sites throughout the county. Each year in Alameda County over 7,000 infants are born to moms who got WIC during pregnancy, and many more are eligible after birth. Over 4,000 of WIC infants also receive care with CHDP.

Local CHDP and WIC agencies work together to meet the needs of families through referral and collaboration in supporting health behavior changes. WIC refers children to CHDP for health assessments, and CHDP refers children up to 5 years of age for nutrition and breastfeeding education and support.

To build the collaboration necessary for seamless breastfeeding support in the communities where WIC participants live, WIC created the *Regional Breastfeeding Liaison* project. Regional Breastfeeding Liaisons (RBLs) are experts in breastfeeding and community collaboration building charged with narrowing the gaps identified in the local Breastfeeding Community Assessment. RBLs work with hospitals, prenatal care providers, pediatricians, breastfeeding coalitions, employers and other community stakeholders to improve breastfeeding quality care.

CHDP providers are encouraged to contact their local WIC site or contact your RBL (*below*) for free education materials, staff in-service support, and referral assistance with your local WIC agencies, and other community partners.

**Jeanne Kettles, MA, DEM, CLE**  
**WIC Regional Breastfeeding Liaison**  
**(510) 393-9632**  
[Jeanne.Kettles@acgov.org](mailto:Jeanne.Kettles@acgov.org)

### WIC Breastfeeding Services

***WIC does not routinely provide formula in the first 30 days to help mothers protect and establish their milk supply***

#### **Prenatal and Postpartum Education**

- Certified Lactation Educators (CLE)
- Breastfeeding Preparation
- Postpartum Management
- Understanding Baby Behaviors
- Family inclusion encouraged

#### **Extra Benefits for Breastfeeding Moms**

- Breastfeeding mothers eligible to participate in WIC benefits longer
- Mothers and infants who exclusively breastfeed receive enhanced food packages

#### **Breastfeeding Support**

- Breastfeeding Peer Counselors (BPC) for individual support prenatal thru six months postpartum (*Funding extent varies by site*)
- Board Certified Lactation Consultants (IBCLC) for complex BPC case management
- Mothers' support groups
- Breastfeeding Warm Line and phone support

#### **Breast Pumps and Lactation Supplies**

1. CA PedNSS Table 16B, 2009
2. UCLA Center for Health Policy Research [www.publichealthadvocacy.org](http://www.publichealthadvocacy.org)
3. Surgeon General's Call to Action to Support Breastfeeding 2011: Washington DC: US Dept. Health and Human Services
4. Breastfeeding and the Use of Human Milk, *Pediatrics* 2012, 129:3
5. California Food Guide: Normal Infant Feeding, 2006
6. Breastfeeding and Maternal Stress Response and Health, *Nutr.Rev.* 62(7)
7. *Maternity Care Matters: 2012 Hospital Breastfeeding Rates Report*; CWA
8. Carothers, *Helping Mother Return to Exclusive Breastfeeding*, 2011
9. Support for Healthy Breastfeeding Mothers and Health Term Babies, Cochrane Database of Systemic Reviews, 2012:5
10. Office Prenatal Formula Advertising and Effect on Breastfeeding Patterns, *Obstetrics&Gynecology*, 2000 95(2)
11. National WIC Association: National Breastfeeding Strategic Plan 2011