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## An Innovative Project Breaks Down Barriers to Oral Health Care for Vulnerable Young Children in Los Angeles County

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*“There are numerous and complex barriers to access to oral health care for young children.”*

**SUMMARY:** Despite the high rate of untreated tooth decay, many young children in California under six years of age have never been to a dentist. Numerous and complex barriers to access to oral health care for young children exist, and a multifaceted approach is required to improve receipt of preventive and treatment services that could improve the oral health of this population. This policy brief describes the UCLA-First 5 LA 21st Century Dental Homes Project, which was designed to improve oral health care for young children in 12 Federally Qualified Health Center (FQHC) clinic sites with co-located dental and primary care services and

its accessibility in their service areas throughout Los Angeles County. The project funded infrastructure and staffing, provided technical assistance to improve operations, trained clinical personnel to provide oral health care to young children, implemented a quality improvement learning collaborative, trained parents and child care providers in oral hygiene and healthy habits, and disseminated information to promote effective policies. Early data on the project indicated twofold increases in delivery of both diagnostics and treatment visits for young children, and a threefold increase in preventive services for young children during the program.

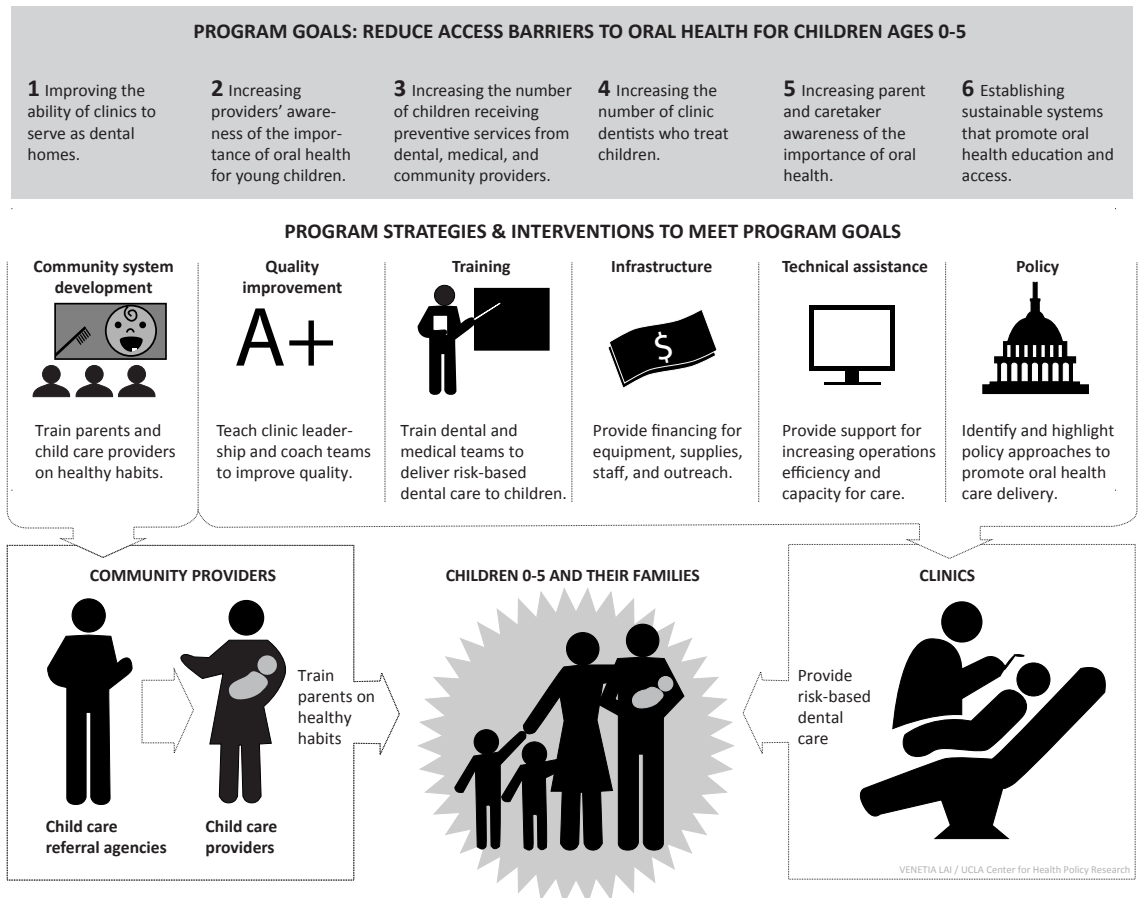
National data indicate that only half of children ages 2-17 had a dental visit in 2011.<sup>1</sup> Medicaid administrative data indicate that only 36 percent of children eligible for Early and Periodic Screening, Diagnostic, and Treatment received preventive care, and just 19 percent received treatment services in California in fiscal year 2015.<sup>2</sup> Current clinical guidelines recommend that children should receive their first examination “at the time of the eruption of the first tooth and no later than 12 months of age” so that clinicians can provide preventive care and oral health education as well as early detection and management of oral disease.<sup>3</sup> National data show that 23 percent of children ages 2-5 in 2011-2012 had dental caries in primary teeth, rising to 56 percent among those ages

6-8.<sup>4</sup> Existing evidence indicates multiple negative consequences of poor oral health, including worse overall health, lower educational attainment, and lower quality of life.<sup>5</sup>

Complex and numerous barriers limit the access of low-income children to needed oral health care. Barriers include inadequate parental and caregiver knowledge of the importance of oral health care and self-care skills for young children;<sup>6</sup> an insufficient number of providers participating in Denti-Cal (California’s Medicaid dental benefits);<sup>7</sup> and a lack of confidence and knowledge on the part of many dentists in providing care for young children.<sup>8</sup> Lack of integration of dental and primary care services also limits access to oral health care for young children.<sup>9</sup>

## Exhibit 1

## The UCLA-First 5 LA 21st Century Dental Homes Project Approach to Improving Oral Health of Young Children Ages 0-5



*“Only 33 percent of California community clinics have co-located dental and primary care.”*

Data show that only 33 percent of California community clinics have co-located dental and primary care capacity, and the degree of oral and primary care integration in these organizations is unknown.<sup>10</sup>

This policy brief describes the approach and early outcomes of an innovative and multipronged project designed to address the complex barriers in access to oral health care for children 0-5 that has been implemented in Los Angeles County, beginning in 2013. The UCLA-First 5 LA 21st Century Dental Homes Project (DHP) was funded by First 5 LA and implemented by UCLA in partnership with 12 Federally Qualified Health Centers (FQHCs) with dental care services co-located in the same site as primary care services.<sup>11</sup> FQHCs were selected for this

intervention because they are significant providers of care to low-income and uninsured populations, have a mandate to provide preventive oral health care, and have the capacity to integrate dental and medical primary health care.

### The 21st Century Dental Homes Project Approach to Improving the Oral Health of Young Children

The project addressed seven critical barriers to improving the oral health of children ages 0-5 in the safety net. These included: (1) limited access to affordable dental care; (2) inadequate infrastructure for care delivery; (3) limited knowledge, skills, and comfort in oral health care delivery for young children among dental and primary care medical providers; (4) inadequate financial incentives

to provide oral health care to young children; (5) limited or no integration of co-located dental and medical providers; (6) lack of leadership and champions to promote oral health care in the same organization; and (7) limited knowledge of oral care needs and self-care skills among parents and child care providers. These barriers were addressed through the following strategies, highlighted in Exhibit 1.

**Infrastructure:** The initial phase of the project involved infrastructure enhancements in 2013. FQHCs received infrastructure support in the form of funds to hire a dedicated Community Dental Home Coordinator (CDHC) and a part-time pediatric dentist, and to purchase dental supplies and equipment. The CDHCs facilitated service delivery to young children throughout the clinic, delivered oral health education (and fluoride varnish in some clinics, if they had the requisite clinical qualifications), assessed caries risk, facilitated and participated in quality improvement activities, and conducted outreach to child care providers and other community-based organizations. The pediatric dentists provided advanced treatment and also served as an internal resource for training and reinforcing the skills of dental and medical personnel in delivery of care to very young children.

**Practice Management Technical Assistance:** All FQHCs received technical assistance to improve clinic operations and financial performance, including an initial assessment that was used to develop an enhancement plan, ongoing assistance by expert advisors to address specific challenges, and semiannual performance reviews to assess progress.

**Provider Training:** FQHC medical and dental care providers were trained in techniques used to assess caries risk, deliver care to young children, and manage caries risk and dental disease. They received an extensive curriculum that included

online instruction, didactic and laboratory instruction, clinical demonstrations, and on-site training. Ongoing training also was supported by the part-time pediatric dentists employed by each clinic as part of the project.

**Quality Improvement Learning**

**Collaborative:** Six of the 12 FQHCs participated in an intensive Quality Improvement Learning Collaborative (QILC) designed to teach the basic principles and application of quality improvement techniques, coach provider teams in implementing quality improvement methods, and build support for quality improvement applied to oral health care among clinic leaders. The QILC focused on integrating risk-based oral health care across medical and dental services to improve access, quality, and efficiency of care delivery, risk reduction, and disease management.

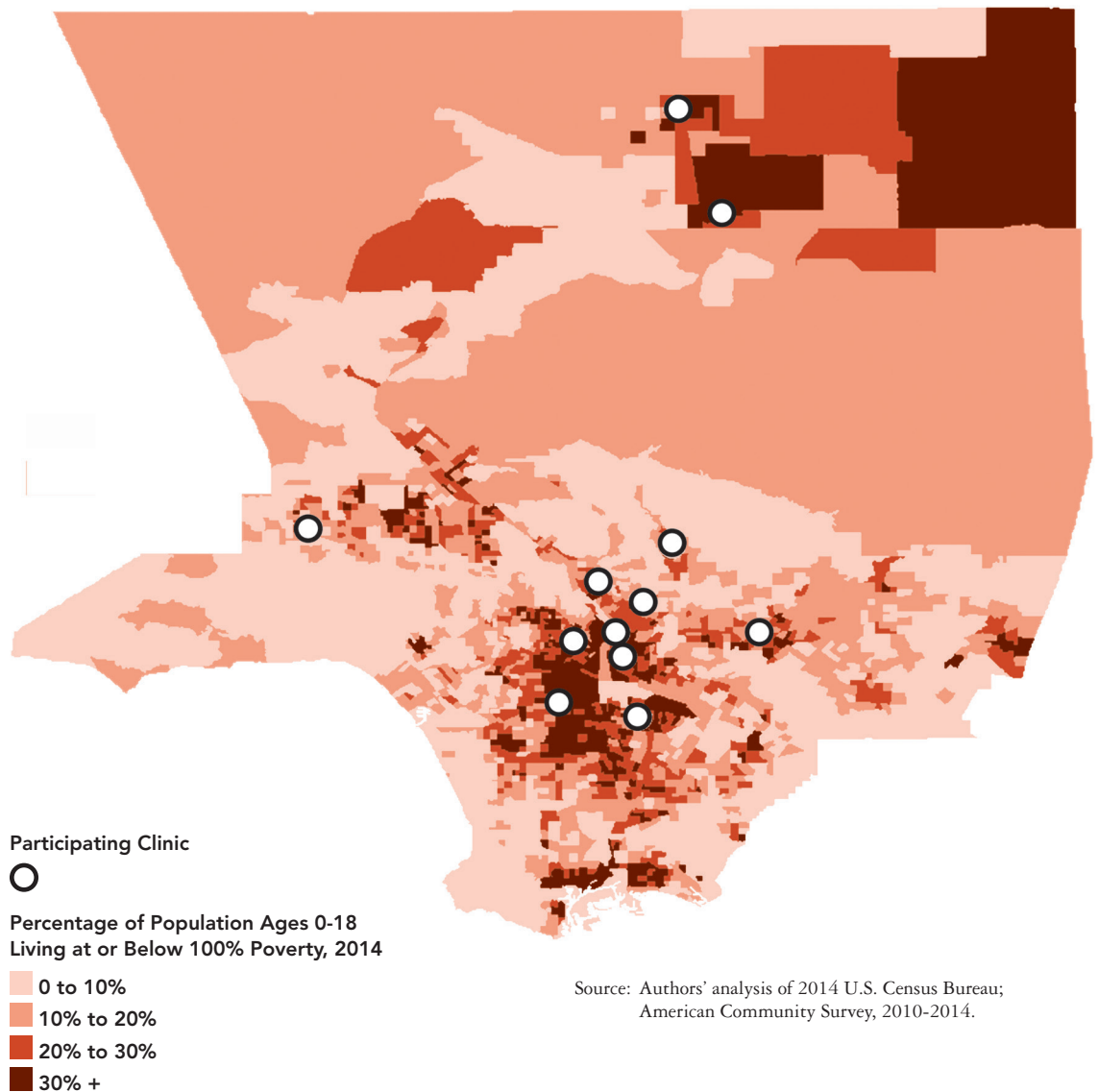
**Community Systems Development:** The DHP project also trained Child Care Resource and Referral Agencies in the surrounding communities of participating FQHCs, which in turn trained child care providers and educated parents on the importance of oral health and healthy habits. The DHP also developed and provided resource guides to CDHCs to support outreach to parents and child care providers.

**Policy Analysis:** The program identified organizational and policy challenges that are barriers to the delivery of oral health care to young children, along with solutions to help the clinics address these challenges (including providing oral health services within primary care settings and dealing with reimbursement and payment challenges). Collectively, the program sought to develop a sustainable model of improved capacity in oral health delivery for young children in Los Angeles County.

*“The program sought to develop a sustainable model of improved capacity in oral health delivery for young children in Los Angeles County.”*

## Exhibit 2

## Location of DHP Participating Federally Qualified Health Centers, Los Angeles County



Source: Authors' analysis of 2014 U.S. Census Bureau; American Community Survey, 2010-2014.

*“Participating clinics were operating in zip codes with high unmet need.”*

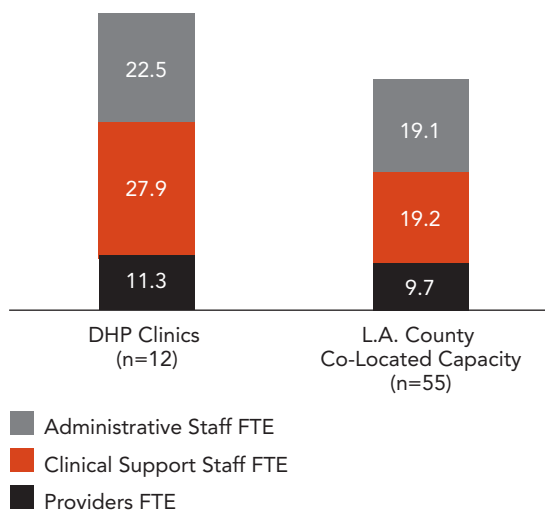
### Participating FQHCs Are Located in Areas with High Concentrations of High-Need, Low-Income Young Children

Participating FQHCs are located in areas of Los Angeles County where a high proportion of low-income children reside and where few young children covered by Medicaid received dental services (Exhibit 2). Most FQHCs are located in densely populated urban areas, such as Lincoln Heights, Bell, El Monte, and Highland Park, while others are located in more

rural areas further from the city center, such as the Antelope Valley. Participating clinics reported serving more than 25,000 children covered by Medicaid prior to implementation of the project in 2012. However, these clinics were operating in zip codes with high unmet need, where 72 percent to 85 percent of children covered by Medicaid did not have a visit to the dentist in 2012 (data not shown).

### Characteristics of Participating FQHCs and Other Los Angeles County Clinics with Co-Located Dental Capacity, 2013

Exhibit 3



	DHP Clinics	Co-Located Clinics in Los Angeles County
Mean Patients	10,853	8,424
Mean Encounters	38,731	29,802
Mean Revenues	\$6.5 million	\$5.5 million
Medi-Cal as Percentage of Total Encounters	52%	42%
Percent of Patients Ages 0-4	13%	11%

Source: UCLA Center for Health Policy Research analysis of 2013 OSHPD data.

Note: FTE is full-time equivalent employee. Other clinics include FQHCs, FQHC Look-Alikes, and community clinics.

#### Participating FQHCs Are Larger Organizations Serving Many Young Children

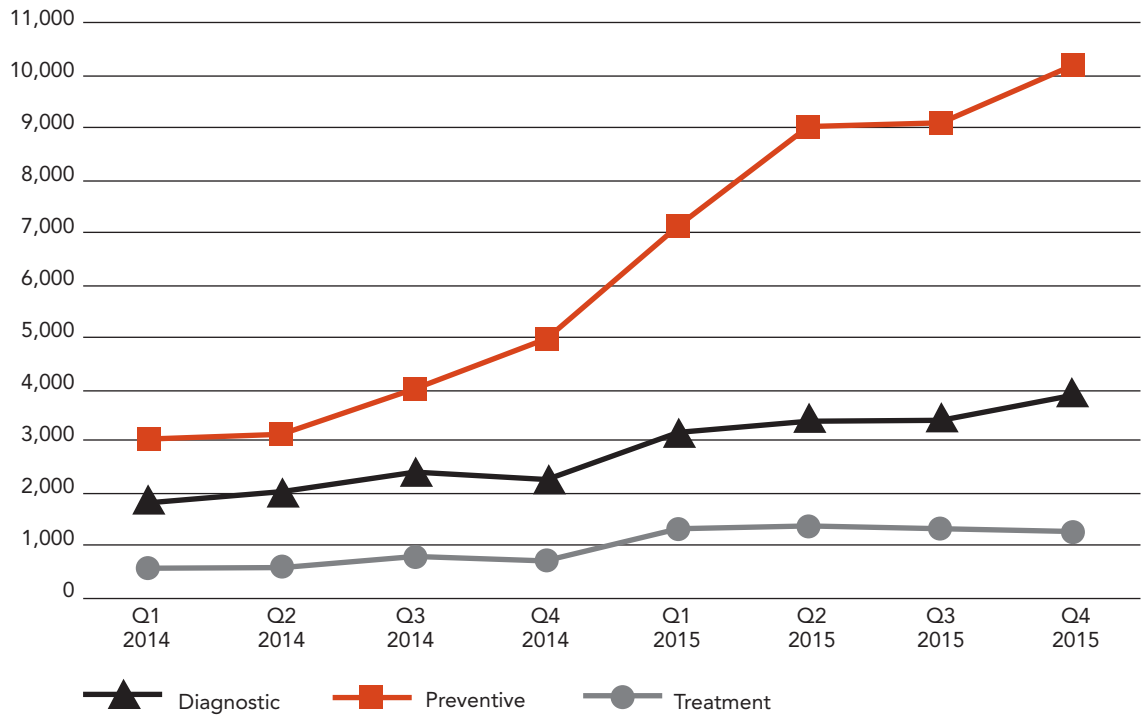
Based on our analyses of data from the 2013 California Office of Statewide Health Planning and Development, participating clinics had more providers, clinical support staff, and administrative staff than other community clinics (FQHCs, FQHC Look-Alikes, or community clinics) with co-located oral health care in Los Angeles County (Exhibit 3). Participating FQHCs had an average of 11.3 full-time equivalent providers, inclusive of physicians, dentists, and other clinical personnel, compared to 9.7 such personnel in other co-located clinics in the county. Proportionally, participating FQHCs had 1.2 times more providers, 1.5 times more clinical support staff, and 1.2 times more administrative staff.

Participating FQHCs saw 1.3 times more patients on average (10,853 vs. 8,424), had 1.3 times more patient visits, and generated 1.2 times more total revenue than other co-located clinics (\$6.5 million vs. \$5.5 million). A higher percentage of visits (52 percent) were provided to patients with Medicaid coverage by participating FQHCs than by other co-located clinics (42 percent). A higher proportion of patients in participating FQHCs were young children compared to other co-located clinics in Los Angeles County (13 percent vs. 11 percent).

*“Participating FQHCs reported a more than threefold increase in preventive visits.”*

Exhibit 4

### Total Number of Diagnostic, Preventive, and Treatment Visits for Children 0-5 by Project Year and Quarter



Source: UCLA Center for Health Policy Research analysis of participating FQHC reports.

*“These critical changes are unlikely to be initiated or sustained without the investment of resources to build and sustain capacity.”*

#### Participating FQHCs Provided Significantly More Preventive Care to Young Children

Participating FQHCs reported providing more than 7,000 more preventive visits—a 3.3-fold increase—for children ages 0-5 between January 2014 and December 2015 (Exhibit 4). These preventive visits included oral health education, fluoride varnish, and other preventive procedures. The number of visits for treatment (over 600 more) and diagnostic services (over 2,000 more) doubled in the same time period. In 2014 and 2015, a total of 777 and 727 child care providers, respectively, received training to raise awareness of oral health, provide oral health education, and encourage parents to obtain dental care for children.

#### Implications

The UCLA-First 5 LA 21st Century Dental Homes Project demonstrated that developing the capacity of dental and primary care medical personnel to provide oral health care services and integrate oral health services across dental and primary care services can improve access and promote quality of oral health care for low-income young children in critical safety net sites in Los Angeles County. The project components were aimed at addressing the significant barriers that limit the application of evidence-based oral health care practices for young children, regardless of whether care is provided in FQHCs or in broader community settings. These critical changes are unlikely to be initiated or sustained without the investment of resources to build capacity in the system and to ensure adequate financial incentives to sustain care delivery once capacity has been improved.

Multiple elements of this project can be replicated in other high-need areas of Los Angeles County, the state of California, or nationally. One-third of community health center sites in California have co-located primary and dental care services; another 29 percent of California community health center clinics are part of multisite organizations that provide dental services in at least one site within their organization. These are indicators of the existing potential to implement the DHP model more broadly to improve the oral health care service capacity of FQHCs.<sup>10, 12</sup>

FQHCs are required to provide primary health and oral health care to all patients, and the Health Services and Resources Administration has encouraged these organizations to provide oral health care on-site.<sup>13, 9</sup> Yet, these policies do not focus on improving access to oral health care for children ages 0-5, who are vulnerable to highly preventable dental disease. Policy initiatives focused on promoting highly effective low-cost services are needed to address the persistent barriers to reducing caries incidence and improving the oral health of very young children and other segments of the population at elevated risk for dental disease. Such services would include caries risk assessment, fluoride varnish applications, and culturally competent counseling delivered by trained dental and medical personnel, as well as oral health education delivered through community outreach projects.

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## Endnotes

- 1 Soni A. *Children's Dental Care: Advice and Visits, Ages 2-17, 2011*. 2014. Statistical Brief No. 432. Rockville, MD: Agency for Healthcare Research and Quality. [https://meps.abvq.gov/data\\_files/publications/st432/stat432.pdf](https://meps.abvq.gov/data_files/publications/st432/stat432.pdf)
- 2 <https://www.medicaid.gov/medicaid-chip-program-information/by-topics/benefits/downloads/secretarys-report-dental-excerpt.pdf>
- 3 [http://www.aapd.org/media/policies\\_guidelines/g\\_periodicity.pdf](http://www.aapd.org/media/policies_guidelines/g_periodicity.pdf)
- 4 Dye BA, Thornton-Evans G, Li X, Iafolla TJ. *Dental Caries and Sealant Prevalence in Children and Adolescents in the United States, 2011–2012*. NCHS Data Brief No. 191. Hyattsville, MD: National Center for Health Statistics. 2015 <http://www.cdc.gov/nchs/data/databriefs/db191.pdf>.
- 5 Kwan SY, Petersen PE, Pine CM, Borutta A. 2005. Health-Promoting Schools: An Opportunity for Oral Health Promotion. *Bulletin of the World Health Organization* 83(9):677-685. <http://www.who.int/bulletin/volumes/83/9/kwan0905abstract/en/index.html>
- 6 Miller E, Lee JY, DeWalt DA, Vann Jr. WF. 2010. Impact of Caregiver Literacy on Children's Oral Health Outcomes. *Pediatrics* 126(1): 107-114.
- 7 Pourat N, Roby D, Wyn R, Marcus M. 2007. Characteristics of Dentists Who Provide Dental Care to Publicly Insured Patients. *Journal of Public Health Dentistry* 67(4):208-16.
- 8 Douglass JM, Clark MB. 2015. Integrating Oral Health into Overall Health Care to Prevent Early Childhood Caries: Need, Evidence, and Solutions. *Pediatric Dentistry* 37(3):266-274.
- 9 Institute of Medicine. July 2011. *Improving Access to Oral Health Care for Vulnerable and Underserved Populations*. Accessed on 4/27/16 from <http://www.brsa.gov/publichealth/clinical/oralhealth/improvingaccess.pdf>.
- 10 Pourat N, Martinez AE, Crall JJ. 2015. *Better Together: Co-Location of Dental and Primary Care Provides Opportunities to Improve Oral Health*. Los Angeles, CA: UCLA Center for Health Policy Research.
- 11 The 12 FQHCs participating in the project are AltaMed Bell; AltaMed El Monte; AltaMed First Street; Antelope Valley Community Clinic, Lancaster; Antelope Valley Community Clinic, Palmdale; Arroyo Vista Highland Park; Arroyo Vista Lincoln Heights; Clinica Monseñor Oscar A. Romero; Community Health Alliance of Pasadena (ChapCare); Comprehensive Community Health Centers, Glendale; El Proyecto del Barrio; and St. John's Frayser.
- 12 National Network for Oral Health Access. 2012. *Oral Health and the Patient-Centered Health Home*. Accessed on 7/13/2015. <http://www.moba.org/moba-content/uploads/2013/09/PCHHActionGuide02.12final.pdf>
- 13 U.S. Department of Health and Human Services, Health Resources and Services Administration. *Integration of Oral Health and Primary Care Practice*. February 2014. Accessed on 4/18/2015 from <http://www.brsa.gov/publichealth/clinical/oralhealth/primarycare/integrationoforalhealth.pdf>.