

### **Technical Appendices**

# Access to the Health Care Safety Net in California

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### **Appendix A: Population Measures**

#### **Population Data**

We use the American Community Survey (ACS) 2006–2010, five-year data files to provide tract-level population counts for the low-income population (under 100% FPL and under 200% FPL) and the noncitizen population. The ACS 2006–2010 tract-level data are based on 2010 tract boundaries.

ZIP code level counts are not available in the ACS files. We aggregate tract-level counts to the ZIP code. Unfortunately, ZIP codes are not a standard geographic level for population data but rather are constructed and changed by the U.S. Postal Service to deliver mail. As such, census tracts and other census geographic levels, such as blocks or block groups, do not correspond neatly to ZIP codes. To aggregate tract counts to the ZIP code level, which we do in order to overlap with our unauthorized immigrant estimates, we matched 2010 Census blocks to 2009 ZIP codes spatially based on the centroid of the block—so that if the block centroid fell within the ZIP code boundary then that block was assigned to that ZIP code. We then aggregated the blocks and summed the total block population from the 2010 Census SF1 file (100% count) to the census tract. In this way, we were able to create a file that contained all tract–ZIP code combinations and could construct the percentage of the total tract population that was contained in a particular ZIP code. The percentage of the tract population that fell within a particular ZIP code was then used to weight the tract-level counts of the low-income and noncitizen population (and other demographic characteristics of interest) up to the ZIP code level.

Because there are margins of error, indicating a 90 percent confidence in the estimate, associated with the tract-level counts for the ACS data files, we also constructed low-income and noncitizen ZIP code populations for the lower-bound and upper-bound estimates to see how that might affect our results. The results change very little, and the patterns observed across counties do not change at all.

Finally, some ZIP codes are excluded from our analysis. To be included the ZIP code must physically/spatially exist. We use 2009 ZIP code boundary files produced by the software development company Esri to identify the universe of ZIP codes included in the analysis. ZIP codes that only include P.O. boxes are not included. In all, the 2009 ZIP code file contains 1,698 ZIP codes, and our final ZIP code analytic sample includes information for 1,616 ZIP codes. (The 82 ZIP codes that are not included in the analysis contain about 140,000 people in all, less than 0.5 percent of the total population, with more than half having no reported population.) A small number of ZIP codes are not included in the analysis because they are not able to be mapped to the road network that is used to calculate travel times and distances.

The counts of Medi-Cal beneficiaries at the ZIP code level come from the California Department of Health Care Services, Research and Analytics Services Section, accessed at www.dhcs.ca.gov/dataandstats/statistics/Pages/RASS\_Enrollment\_by\_Geographic\_Region.aspx.

#### County-Level Insurance Data

The county-level insurance estimates used in Figure 1 come from the census' Small Area Health Insurance Estimates (SAHIE) program, which produces county-level insurance estimates by age, sex, and income level.

<sup>&</sup>lt;sup>1</sup> The unauthorized immigrant estimates include P.O. box ZIP codes, as these can be assigned to a county but cannot be represented spatially and so are excluded from our analysis. This results in the exclusion of an estimated 46,908 unauthorized immigrants from the analysis.

The estimates are developed from models that incorporate data from several sources, including the American Community Survey, tax returns, Supplemental Nutrition Assistance Program (SNAP) participation records, county business patterns, Medicaid/SCHIP participation records, and the 2000 Census. We use the 2009 SAHIE data for the county-level estimates of non-elderly uninsured populations. Table A1 shows the values for components we use to make Figure 1.

Table A1.

County uninsurance rates and unauthorized estimates, 2009

County or county group	Total non- elderly population	Total non- elderly uninsured	Percentage uninsured	Total unauthorized immigrant	Percentage uninsured – unauthorized
Alameda	1,318,887	192,959	14.6	118,300	36.8
Alpine, Amador, Calavares, Tuolomne, Mariposa, Mono, Inyo	150,336	25,605	17.0	3,200	7.6
Butte	183,770	32,858	17.9	3,900	7.2
Colusa, Glenn, Tehama, Trinity	103,586	22,723	21.9	12,000	31.6
Contra Costa	902,701	121,700	13.5	75,000	37.0
Del Norte, Siskiyou, Modoc, Lassen	97,633	19,825	20.3	1,100	3.4
El Dorado	154,192	19,807	12.8	3,600	10.9
Fresno	808,278	175,794	21.7	51,700	17.6
Humboldt	110,684	22,409	20.2	2,000	5.4
Imperial	145,461	35,351	24.3	18,600	31.6
Kern	716,533	156,590	21.9	47,300	18.1
Kings	133,281	31,296	23.5	9,500	18.2
Lake, Mendocino	124,800	26,224	21.0	8,300	19.1
Los Angeles	8,663,789	2,150,986	24.8	871,000	24.3
Madera	129,989	31,570	24.3	12,300	23.3
Marin	206,697	24,435	11.8	17,800	43.6
Merced	216,329	46,305	21.4	23,000	29.8
Monterey, San Benito	409,517	95,834	23.4	61,900	38.8
Napa	112,865	19,954	17.7	16,900	51.0
Nevada, Plumas, Sierra	96,298	15,147	15.7	1,800	7.3
Orange	2,651,475	522,055	19.7	273,000	31.3
Placer	289,230	33,604	11.6	7,800	14.0
Riverside	1,844,743	414,921	22.5	137,000	19.8
Sacramento	1,224,907	192,214	15.7	59,700	18.6
San Bernardino	1,806,942	390,141	21.6	134,000	20.6
San Diego	2,663,233	500,631	18.8	179,700	21.5
San Francisco	696,459	103,131	14.8	31,500	18.3
San Joaquin	597,620	114,489	19.2	52,200	27.4
San Luis Obispo	222,467	38,869	17.5	8,600	13.3
San Mateo	622,762	80,232	12.9	53,700	40.2
Santa Barbara	346,290	67,463	19.5	37,800	33.6
Santa Clara	1,588,681	219,104	13.8	173,300	47.4
Santa Cruz	223,481	40,480	18.1	20,800	30.8
Shasta	149,954	26,528	17.7	1,500	3.5
Solano	355,083	51,536	14.5	25,200	29.4
Sonoma	400,958	64,511	16.1	40,500	37.7

County or county group	Total non- elderly population	Total non- elderly uninsured	Percentage uninsured	Total unauthorized immigrant	Percentage uninsured – unauthorized
Stanislaus	448,235	90,325	20.2	36,000	23.8
Sutter, Yuba	144,222	29,446	20.4	9,200	18.7
Tulare	379,835	89,238	23.5	32,000	21.6
Ventura	697,053	126,443	18.1	73,900	35.1
Yolo	176,862	28,444	16.1	12,400	26.2
CALIFORNIA	32,316,118	6,491,176	20.1	2,759,000	25.5

SOURCE: Non-elderly population and uninsured estimates from 2009 Census Small Area Health Insurance Estimates (SAHIE) program. Unauthorized immigrant estimates are the authors' calculations.

NOTE: Percent uninsured likely to be unauthorized assumes that 60 percent of the unauthorized are uninsured, which is based on a national estimate of uninsurance rates among unauthorized immigrants (Passel and Cohn 2009). Actual rates of uninsurance of the unauthorized could vary.

#### **Local Estimates of Unauthorized Immigrants**

Here we describe the justification and methodology for estimating unauthorized immigrant populations for ZIP codes in California. For more detail, see Hill and Johnson, 2011. Unauthorized immigrants have been able to file tax returns using their own unique identifiers beginning in 1996. These identifiers, called Individual Taxpayer Identification Numbers (ITINs), are entered in the place of Social Security numbers (SSNs) on Form 1040 personal tax returns. We use counts of ITIN tax filers for each ZIP code for tax years 2000 through 2008 to develop our estimates of unauthorized immigrants for ZIP codes in California. Despite having worked without authorization, unauthorized immigrants are obligated to file tax returns. Estimates suggest a large percentage do so. Fifty percent is the most common estimate (Hinojosa-Ojeda 2010; Pastor et al. 2010), but others show the share is much higher. A recent PPIC report found that more than 80 percent of unauthorized immigrants reported having filed federal income taxes in the year prior to earning legal permanent residence (Hill, Lofstrom, and Hayes 2010). The Social Security Administration's chief actuary assumed closer to three-quarters of unauthorized immigrants have payroll taxes withheld (Porter 2005).

Though ITIN filers may be a good proxy for unauthorized immigrants, ITIN tax filers will not provide a precise count of unauthorized immigrants for two reasons. First, not all unauthorized immigrants file taxes, and among those that do, not all use the ITIN. Second, not all ITIN filers are unauthorized immigrants. Because most tax returns filed with ITINs with U.S. addresses also include wages (90% in 2008), it is safe to assume that the vast majority of ITIN filers are unauthorized workers. In order to use ITIN data to develop estimates of the distribution of unauthorized immigrants throughout California, there must be a strong relationship between the counts of ITIN filers and existing estimates of unauthorized immigrants. We find ITINs are indeed highly correlated with independently derived state estimates of unauthorized immigrants.<sup>2</sup>

While we could simply use the ratio of unauthorized immigrants in California to ITIN filers in California as the factor to estimate local populations in the state, we know this ratio varies across states, and we therefore suspect that it might also vary within California. To account for this potential variation, we employ a regression framework.

<sup>&</sup>lt;sup>2</sup> There are three sets of state-level estimates available for the unauthorized population that are generated regularly by the Pew Hispanic Center (PHC), the Department of Homeland Security (DHS), and Robert Warren Associates (Warren 2010). The correlation values between ITIN counts and the Warren and PHC estimates by Passel and Cohn range from 0.95 to 0.98 for available states and years. The DHS estimates are only available for the 10 states with the largest unauthorized populations. ITINs are also highly correlated (0.965) with the population of foreign-born noncitizens in the 2006–2008 ACS.

The point of our regressions is to understand cross-state variation in the ratio of unauthorized immigrants to ITIN filers and then apply the coefficients generated by the regression to more accurately adjust the ZIP code level estimates of the unauthorized. Differences in the rate of ITIN usage by a state's unauthorized population may be related to variation in characteristics of employment and earnings among unauthorized immigrants, demographic characteristics of immigrants, and infrastructure available to support immigrant tax filing, for example. Using state-level estimates of the unauthorized, ITIN data, and the American Community Survey (ACS), we use ordinary least squares (OLS) to estimate the following regression model of the ITIN coverage rate for each state (s) and each year (t) with proportionate weight applied to the size of the unauthorized population. We restrict the population to foreign-born residents:

$$(ITIN/_{Warren\ Estimate})_{ts} = X_{ts}\alpha + W_{ts}\beta + Z_{ts}\gamma + \varepsilon_{ts}$$

In the equation, X represents a matrix of demographic characteristics of the immigrant population in each state and each year. Employment characteristics for the immigrant population are represented by the matrix W, and tax-filing characteristics are represented by the matrix Z.

Using estimates from the most relevant and significant predictors in scaling the ITIN returns to match the state-level estimates of the unauthorized population, we then apply these coefficient estimates for the states to ITIN and ACS data for the counties in order to compute a county (or regional) level count of unauthorized immigrants.<sup>3</sup> County estimates of unauthorized immigrants are presented in Table A1. These county estimates are then totaled and scaled to match the estimate of unauthorized immigrants for the state in that year. Our final step is to scale these county- (or regional-) level estimates back down to the ZIP code level, using the distribution of ITINs filed by ZIP code within that county.<sup>4</sup> These steps produce the ZIP code level estimates of the unauthorized used in the regional maps presented in Figures 3 and 4. We present the ZIP code estimates for California in Figure A1.

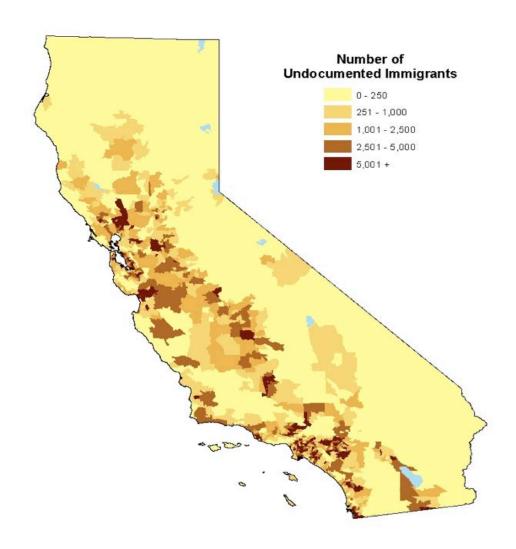
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 $<sup>^{3}</sup>$  We totaled ZIP codes to the county (or regional) level. Many ZIP codes span two (or more) counties and are allocated to counties based on 2000 Census block populations (Kneebone 2008).

 $<sup>^4</sup>$  We could not use our model and ACS data directly at the ZIP code level because ACS data are not available at that level of geography.

Figure A1.

Number of unauthorized immigrants for California ZIP codes, 2009



SOURCE: Authors' calculations.

## Appendix B: Safety Net Capacity and Access Measures

#### **Facility Data**

We define safety net facilities as emergency departments and all clinics. We include several different types of health care clinics to provide the most comprehensive picture of safety net facilities as possible. Below we provide a brief description of different types of safety net providers, which is followed by a description of the data sources we used to compile a listing of the providers used in our study.

**Public hospitals:** Though constituting just 6 percent of all California hospitals, the state's 19 public hospitals provide nearly half of all hospital care to the state's uninsured residents, as well as a significant amount of care to Medi-Cal patients. They pool funding from multiple sources. Many provide a diverse range of inpatient and outpatient services, including ED care, trauma care, burn care, psychiatric services, and diagnostic services.

**Federally qualified health centers (FQHCs):** Located in high poverty or medically underserved areas, these public and private nonprofit centers are required to provide a wide array of preventive and primary care services, with patient fees adjusted based on ability to pay. FQHCs receive funding under Section 330 grant of the Public Health Services Act. FQHCs are also required to provide other services, such as transportation and language assistance, and they receive enhanced reimbursement from Medicaid and Medicare.

**FQHC look-alikes (FQHCLAs):** FQHCLAs do not receive funding under Section 330 grant of the Public Health Services Act but are governed, operate, and provide services in much the same way. They receive enhanced reimbursement under Medicaid and Medicare, but they do have other protections that Section 330 grantees receive. Many FQHCLAs go on to ultimately become FQHCs.

**County-based clinics:** These are county owned and operated clinics (some of which may be FQHCs) that provide primary care services for medically indigent populations under Section17000 of the California Welfare and Institutions Code. The state does not mandate counties to operate clinics or hospitals to fulfill their Section 17000 obligation. Thus, there is a great deal of variation in structure, program administration, and funding, and some counties contract out these services.

Free clinics: These are clinics operated by a tax-exempt nonprofit supported in whole or in part by voluntary donations, gifts, grants, government funds or contributions. Free clinics are not permitted to charge patients directly for services or for drugs, and they rely on volunteers to provide health care services as well as private donations to support operations. They do not receive enhanced reimbursement and may not be licensed as primary care clinics.

**Rural health clinics (RHCs):** RHCs are often nonprofit, freestanding clinics located in a non-urban area in which there is a shortage of health professionals. They receive enhanced reimbursement by Medicaid and Medicare, akin to FQHCs. Though not mandated to provide care to everyone regardless of ability to pay, they often serve the uninsured, as well as Medicaid patients, and other populations.

**Other:** There are number of other safety net providers not required to obtain state licensure that are often included when safety net centers are discussed, as they provide low-cost or free services to vulnerable populations, including school-based health centers, Planned Parenthood clinics, and mobile clinics.

We compiled information on emergency departments (ED) from the California Office of Statewide Health Planning and Development (OSHPD) hospital utilization data files for 2009. We excluded hospitals with a license status of closed and those that do not operate EDs. To be included, the ED license level must be either standby, basic, or comprehensive. Hospitals with EDs included in the analysis total 339, and all are general acute care hospitals and almost all list general medical/surgical as the principal service. OSHPD data include the number of emergency department beds (treatment stations) available in each facility.

We compiled information on clinics based on several sources as there are different types of health care clinics and there is not a single source that includes information for all safety net clinics in California. The primary data source was the OSHPD 2009 primary care clinic utilization data files, which includes information on all free and community clinics licensed by the state of California. We excluded clinics that were designated as closed or not in operation for the year, and also excluded sites that were not thought to provide basic primary care services—for example, clinics providing only dental services, elder care, behavioral/mental health services, or alcohol/drug services. These sites were identified using text matching on the name as well as by visual inspection. The resulting final list of OSHPD clinics contained information on 863 clinics. The OSHPD clinic lists are the sole source of information for the access measures, while the closest facility analysis includes additional clinics discussed below.

We supplemented the OSHPD lists with information from the U.S. Health Resources and Services Administration (HRSA), which maintains listings for all federally qualified health centers (FQHCs). Though the OSHPD clinic data contains information on many FQHCs (there are 514 FQHCs identified in our final OSHPD clinic list) other clinics, such as county-based clinics, are not required to be licensed through the state and thus not included in the OSHPD data files. The HRSA listing allowed us to identify an additional 311 FQHCs. Again, we cleaned the FQHC HRSA list to exclude certain observations, for example, sites that were designated as administrative only (no service delivery), school-based sites, mobile vans, and those that operated fewer than 10 hours a week. Also excluded were sites that provided only dental services, elder care, behavioral/mental health services, or alcohol/drug services. (These were identified using text matching on the name and then visual inspection.) In cases where there were multiple listings of clinics at a single address, we attempted to delete what were clearly duplicates. However, in some cases, such as when facilities are located at hospitals, we kept multiple clinic sites listed at the same address if they appeared to offer different types of services. For example, if a county hospital had five listings at the same address for women's health services, pediatric services, urgent care, family health, etc., we kept all five clinics in the data set.

The OSHPD clinic data does not contain information on county-operated clinics, although several of these are included in the HRSA FQHC data. To make sure we captured as many facilities as possible, we also used lists assembled by the California Association of Public Hospitals (CAPH) of county-based outpatient clinics. It should be noted, though, that not all county-based clinics serve the unauthorized. We also include Rural Health Clinics (RHCs) certified by the U.S. Center for Medicare and Medicaid Services. Unlike community clinics, RHCs are not required to provide services regardless of ability to pay. However, they typically provide a considerable amount of free or reduced-price care to more rural populations, so they are included

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<sup>&</sup>lt;sup>5</sup> Standby EDs provide emergency medical care in a specifically designated area and are capable of providing physician services within a reasonable time, but they do not need to have a physician present in the hospital at all times. Basic EDs have a physician on premises and available 24 hours a day.

<sup>&</sup>lt;sup>6</sup> Two of the 339 did not have any ED beds reported (EMS\_STATIONS), so data from the 2010 preliminary utilization data (where both hospitals did report the number of beds) were used instead.

in our measure for all clinics. The additional clinics identified from the CAPH listing and the RHC listing as well as the HRSA FQHCs are included in the closest facility analysis for health care clinics. The final listing for clinics contained information on 1,596 clinics.

#### Spatial Analysis of Safety Net Resources

First, we geocode (assign longitude and latitude coordinates based on exact address) all safety net facilities, including health care clinics and hospitals with emergency departments. We use the exact location information for safety net facilities and population-weighted centroids for ZIP codes, which designate where our populations of interest are spatially located. These populations of interest include traditional safety net user groups who tend to be uninsured or publicly insured and include unauthorized immigrants, noncitizens, and low-income persons (defined as under 200% FPL).

Using these spatial locations and geographic information systems (GIS) software, specifically ESRIs ArcMAP and the Network Analyst extension, we were able to construct measures that indicate the distance to various safety net providers. These distances are calculated in both miles and travel time measured in minutes. Both of the distance measures (miles and minutes) are based on road distance rather than on Euclidean distance ("as the crow flies"), and utilize the Network Analyst extension and the Street Network maps provided by ESRI.

#### Closest Facility Analysis

We calculated two different constructs to assess the access safety net users have to available safety net resources. The first is a simple distance measure to the closest facility. The second is a measure of time of travel. The closest-facility analysis creates measures of the number of miles and number of minutes it takes to travel to the nearest safety net facility. We calculated the distance to the closest facility separately for EDs and any clinic.

We use these simple measures to assess the proximity to safety net resources for different safety net user groups throughout the state and how they compare across counties. For example, we can answer the question, "What proportion of unauthorized immigrants/noncitizens/low-income/Medi-Cal beneficiaries live within five miles of a safety net provider or more than 30 minutes away from a provider?" These proximity measures have been used in previous research that found distance to clinics and hospitals does affect access to care among uninsured and vulnerable populations (Hadley and Cunningham 2004). Our full results are presented below for clinics (Table B1) and EDs (Table B2).

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 $<sup>^{7}</sup>$  The population-weighted centroids are calculated based on 2010 Census block population data.

Table B1.
Distance to closest clinic for safety net user groups, by county, 2009

	0 to 2 miles to any clinic						2 to 15 mi	les to any	clinic		Over 15 miles to any clinic					
County	Total	Unauthorized immigrants	Low- income	Non- citizen	Medi- Cal	Total	Unauthorized immigrants	Low- income	Non- citizen	Medi- Cal	Total	Unauthorized immigrants	Low- income	Non- citizen	Medi- Cal	
ALAMEDA	76%	77%	81%	78%	80%	24%	23%	19%	22%	20%	0%	0%	0%	0%	0%	
ALPINE	0%	0%	0%	0%	0%	82%	0%	81%	80%	71%	18%	0%	19%	20%	29%	
AMADOR	7%	34%	6%	14%	8%	93%	66%	94%	86%	92%	0%	0%	0%	0%	0%	
BUTTE	65%	78%	67%	70%	58%	35%	22%	33%	30%	42%	1%	0%	1%	0%	1%	
CALAVERAS	19%	4%	26%	22%	30%	81%	96%	74%	78%	70%	0%	0%	0%	0%	0%	
CONTRA COSTA	54%	82%	72%	73%	77%	46%	18%	28%	27%	23%	0%	0%	0%	0%	0%	
DEL NORTE	86%	50%	85%	85%	84%	6%	50%	6%	10%	8%	8%	0%	10%	5%	8%	
EL DORADO	18%	19%	33%	50%	29%	57%	69%	57%	38%	61%	25%	12%	11%	12%	11%	
FRESNO	51%	73%	63%	68%	64%	49%	27%	37%	32%	36%	0%	0%	0%	0%	0%	
GLENN	95%	97%	96%	98%	96%	3%	1%	2%	2%	1%	2%	2%	1%	1%	3%	
HUMBOLDT	62%	67%	63%	75%	61%	33%	33%	31%	22%	31%	5%	0%	6%	3%	8%	
IMPERIAL	62%	74%	64%	60%	69%	38%	26%	36%	40%	30%	1%	0%	0%	0%	2%	
INYO	0%	0%	0%	0%	0%	88%	100%	87%	90%	87%	12%	0%	13%	10%	13%	
KERN	53%	63%	58%	62%	57%	46%	37%	42%	38%	42%	1%	0%	1%	0%	1%	
KINGS	98%	93%	97%	97%	94%	2%	7%	3%	3%	6%	0%	0%	0%	0%	0%	
LAKE	27%	16%	24%	26%	23%	73%	84%	76%	74%	77%	0%	0%	0%	0%	0%	
LASSEN	0%	0%	0%	0%	0%	90%	100%	91%	68%	85%	10%	0%	9%	32%	15%	
LOS ANGELES	73%	87%	84%	84%	85%	26%	13%	16%	16%	15%	0%	0%	0%	0%	0%	
MADERA	71%	87%	79%	86%	83%	28%	13%	20%	14%	16%	1%	0%	1%	0%	0%	
MARIN	41%	63%	52%	55%	57%	59%	37%	47%	45%	43%	0%	0%	0%	0%	0%	
MARIPOSA	0%	0%	0%	0%	0%	52%	64%	58%	36%	66%	48%	36%	42%	64%	34%	
MENDOCINO	73%	80%	73%	81%	78%	20%	20%	19%	16%	15%	6%	0%	8%	3%	6%	
MERCED	91%	90%	92%	91%	94%	9%	10%	8%	9%	6%	0%	0%	0%	0%	0%	
MODOC	52%	19%	47%	39%	52%	44%	81%	49%	58%	44%	5%	0%	4%	3%	3%	
MONO	75%	92%	86%	91%	77%	0%	0%	0%	0%	0%	25%	8%	14%	9%	23%	
MONTEREY	81%	91%	88%	88%	89%	18%	8%	12%	12%	11%	1%	0%	0%	0%	0%	
NAPA	80%	89%	87%	86%	83%	20%	11%	13%	14%	17%	0%	0%	0%	0%	0%	
NEVADA	0%	0%	0%	0%	0%	100%	73%	99%	99%	100%	0%	27%	1%	1%	0%	
ORANGE	42%	68%	58%	60%	64%	58%	32%	42%	40%	36%	0%	0%	0%	0%	0%	
PLACER	11%	27%	13%	20%	12%	86%	73%	84%	80%	85%	2%	0%	3%	0%	3%	

	0 to 2 miles to any clinic						2 to 15 mi	les to any	clinic		Over 15 miles to any clinic					
County	Total	Unauthorized immigrants	Low- income	Non- citizen	Medi- Cal	Total	Unauthorized immigrants	Low- income	Non- citizen	Medi- Cal	Total	Unauthorized immigrants	Low- income	Non- citizen	Medi- Cal	
PLUMAS	46%	100%	46%	77%	45%	39%	0%	34%	22%	36%	15%	0%	20%	1%	20%	
RIVERSIDE	32%	41%	40%	40%	41%	68%	59%	60%	60%	59%	1%	0%	1%	0%	0%	
SACRAMENTO	28%	44%	39%	36%	39%	71%	54%	60%	63%	60%	1%	2%	1%	1%	1%	
SAN BENITO	100%	100%	100%	100%	100%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	
SAN BERNARDINO	21%	26%	26%	25%	26%	57%	63%	49%	61%	46%	22%	11%	25%	14%	27%	
SAN DIEGO	57%	78%	71%	69%	76%	43%	22%	29%	31%	24%	0%	0%	0%	0%	0%	
SAN FRANCISCO	100%	99%	100%	100%	99%	0%	1%	0%	0%	1%	0%	0%	0%	0%	0%	
SAN JOAQUIN	68%	78%	79%	77%	79%	32%	22%	21%	23%	21%	0%	0%	0%	0%	0%	
SAN LUIS OBISPO	88%	89%	91%	90%	90%	10%	6%	8%	8%	7%	2%	5%	1%	2%	3%	
SAN MATEO	60%	74%	71%	69%	72%	40%	25%	29%	31%	27%	0%	1%	1%	0%	0%	
SANTA BARBARA	80%	95%	88%	92%	91%	15%	2%	9%	5%	7%	5%	3%	3%	3%	2%	
SANTA CLARA	53%	68%	63%	62%	64%	47%	32%	37%	38%	36%	0%	0%	0%	0%	0%	
SANTA CRUZ	52%	80%	67%	72%	67%	48%	20%	33%	28%	33%	0%	0%	0%	0%	0%	
SHASTA	11%	8%	11%	17%	13%	87%	92%	87%	82%	86%	2%	0%	1%	1%	1%	
SIERRA	45%	0%	43%	47%	63%	45%	0%	48%	43%	33%	10%	0%	9%	10%	4%	
SISKIYOU	58%	52%	59%	46%	59%	38%	48%	37%	49%	37%	4%	0%	4%	5%	4%	
SOLANO	50%	50%	55%	55%	54%	50%	50%	45%	45%	46%	0%	0%	0%	0%	0%	
SONOMA	76%	82%	77%	81%	79%	24%	18%	23%	19%	21%	0%	0%	0%	0%	0%	
STANISLAUS	92%	92%	94%	95%	94%	8%	8%	6%	5%	6%	0%	0%	0%	0%	0%	
SUTTER	92%	91%	94%	95%	95%	7%	9%	5%	4%	5%	1%	0%	1%	1%	0%	
TEHAMA	92%	87%	90%	88%	93%	7%	13%	8%	11%	7%	1%	0%	1%	1%	0%	
TRINITY	53%	0%	48%	58%	64%	35%	0%	39%	33%	23%	12%	0%	14%	9%	13%	
TULARE	71%	79%	77%	80%	75%	29%	21%	23%	20%	25%	0%	0%	0%	0%	0%	
TUOLUMNE	8%	0%	10%	2%	8%	91%	100%	90%	97%	92%	1%	0%	0%	0%	1%	
VENTURA	78%	91%	87%	87%	91%	22%	9%	13%	13%	9%	0%	0%	0%	0%	0%	
YOLO	55%	52%	58%	56%	52%	45%	48%	42%	43%	48%	0%	1%	0%	0%	0%	
YUBA	71%	100%	82%	91%	92%	29%	0%	18%	9%	8%	0%	0%	0%	0%	0%	
California	59%	75%	69%	71%	70%	40%	25%	30%	28%	28%	2%	1%	2%	1%	2%	

SOURCE: Authors' calculations.

Table B2. Distance to closest emergency department for safety net user groups, by county, 2009

		0 to 2		2 to 15	miles to	ED		Over 15 miles to ED							
County	Total	Unauthorized immigrants	Low- income	Non- citizen	Medi- Cal	Total	Unauthorized immigrants	Low- income	Non- citizen	Medi- Cal	Total	Unauthorized immigrants	Low- income	Non- citizen	Medi-Cal
ALAMEDA	50%	50%	57%	54%	55%	50%	50%	43%	46%	45%	0%	0%	0%	0%	0%
ALPINE	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	100%	0%	100%	100%	100%
AMADOR	18%	26%	20%	13%	27%	61%	74%	61%	74%	54%	21%	0%	20%	14%	20%
BUTTE	18%	28%	20%	21%	16%	80%	72%	79%	79%	82%	1%	0%	1%	1%	2%
CALAVERAS	7%	0%	7%	6%	17%	24%	73%	33%	57%	26%	68%	27%	60%	37%	57%
CONTRA COSTA	27%	45%	39%	37%	43%	73%	55%	61%	63%	57%	0%	0%	0%	0%	0%
DEL NORTE	86%	50%	85%	85%	84%	6%	50%	6%	10%	8%	8%	0%	10%	5%	8%
EL DORADO	37%	49%	56%	64%	51%	57%	51%	39%	34%	42%	6%	0%	5%	2%	7%
FRESNO	18%	17%	14%	16%	14%	73%	63%	74%	67%	75%	10%	20%	12%	16%	11%
GLENN	31%	23%	28%	24%	31%	11%	24%	13%	21%	12%	58%	53%	58%	56%	57%
HUMBOLDT	28%	50%	31%	44%	37%	65%	50%	60%	51%	52%	7%	0%	9%	4%	11%
IMPERIAL	0%	0%	0%	0%	0%	80%	85%	81%	76%	83%	20%	15%	19%	24%	17%
INYO	0%	0%	0%	0%	0%	87%	100%	86%	88%	87%	13%	0%	14%	12%	13%
KERN	17%	18%	19%	22%	20%	67%	57%	62%	58%	63%	16%	25%	18%	20%	17%
KINGS	62%	57%	56%	53%	63%	26%	17%	22%	16%	22%	12%	26%	22%	31%	15%
LAKE	23%	31%	34%	29%	39%	68%	53%	59%	63%	54%	9%	16%	7%	8%	6%
LASSEN	0%	0%	0%	0%	0%	75%	86%	81%	38%	79%	25%	14%	19%	62%	21%
LOS ANGELES	47%	50%	50%	52%	48%	53%	49%	50%	48%	52%	0%	0%	0%	0%	0%
MADERA	0%	0%	0%	0%	0%	62%	86%	73%	85%	79%	38%	14%	27%	15%	21%
MARIN	18%	11%	15%	13%	13%	81%	87%	83%	85%	85%	2%	2%	2%	2%	2%
MARIPOSA	0%	0%	0%	0%	0%	47%	0%	52%	20%	61%	53%	100%	48%	80%	39%
MENDOCINO	70%	72%	70%	74%	75%	14%	11%	11%	7%	8%	16%	17%	18%	19%	17%
MERCED	41%	43%	41%	46%	46%	56%	52%	55%	50%	51%	3%	5%	3%	4%	3%
MODOC	52%	19%	47%	39%	52%	11%	0%	10%	13%	5%	37%	81%	42%	48%	43%
MONO	72%	88%	85%	90%	71%	0%	0%	0%	0%	0%	28%	12%	15%	10%	29%
MONTEREY	25%	39%	32%	34%	33%	65%	52%	59%	56%	58%	10%	9%	8%	10%	9%
NAPA	48%	48%	51%	50%	48%	51%	51%	49%	50%	52%	0%	0%	0%	0%	0%
NEVADA	0%	0%	0%	0%	0%	99%	100%	99%	99%	99%	1%	0%	1%	1%	1%
ORANGE	34%	46%	42%	41%	44%	66%	54%	58%	59%	56%	0%	0%	0%	0%	0%
PLACER	9%	9%	10%	9%	9%	87%	89%	85%	89%	86%	4%	2%	5%	1%	5%

		0 to 2		2 to 15	miles to	ED		Over 15 miles to ED							
County	Total	Unauthorized immigrants	Low- income	Non- citizen	Medi- Cal	Total	Unauthorized immigrants	Low- income	Non- citizen	Medi- Cal	Total	Unauthorized immigrants	Low- income	Non- citizen	Medi-Cal
PLUMAS	36%	100%	41%	71%	42%	45%	0%	35%	17%	36%	19%	0%	24%	12%	22%
RIVERSIDE	18%	20%	20%	21%	20%	81%	78%	78%	78%	78%	1%	2%	2%	2%	2%
SACRAMENTO	25%	31%	27%	28%	27%	74%	67%	72%	71%	72%	1%	2%	1%	1%	1%
SAN BENITO	93%	93%	96%	97%	94%	7%	7%	4%	3%	6%	0%	0%	0%	0%	0%
SAN BERNARDINO	16%	20%	18%	20%	18%	80%	80%	79%	79%	80%	4%	1%	3%	1%	2%
SAN DIEGO	21%	22%	23%	24%	21%	76%	77%	75%	75%	77%	3%	2%	2%	2%	2%
SAN FRANCISCO	60%	57%	61%	61%	52%	40%	43%	39%	39%	48%	0%	0%	0%	0%	0%
SAN JOAQUIN	30%	34%	31%	29%	30%	70%	66%	69%	71%	69%	0%	0%	0%	0%	0%
SAN LUIS OBISPO	42%	29%	51%	44%	34%	52%	60%	45%	50%	60%	6%	11%	4%	6%	6%
SAN MATEO	50%	56%	53%	54%	57%	49%	43%	46%	46%	43%	0%	1%	1%	0%	0%
SANTA BARBARA	28%	28%	25%	25%	27%	72%	71%	75%	75%	72%	0%	0%	0%	0%	0%
SANTA CLARA	24%	29%	28%	26%	27%	76%	71%	72%	74%	73%	0%	0%	0%	0%	0%
SANTA CRUZ	27%	56%	35%	49%	42%	67%	43%	61%	50%	54%	5%	2%	4%	2%	4%
SHASTA	0%	0%	0%	0%	0%	84%	91%	85%	87%	86%	16%	9%	15%	13%	14%
SIERRA	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	100%	0%	100%	100%	100%
SISKIYOU	18%	0%	13%	14%	11%	59%	45%	62%	64%	65%	24%	55%	25%	22%	24%
SOLANO	30%	30%	37%	32%	36%	70%	70%	63%	68%	64%	0%	0%	0%	0%	0%
SONOMA	50%	42%	46%	47%	43%	45%	54%	48%	49%	52%	5%	4%	6%	4%	5%
STANISLAUS	37%	16%	29%	23%	29%	55%	70%	63%	63%	63%	8%	14%	9%	14%	8%
SUTTER	0%	0%	0%	0%	0%	98%	99%	99%	99%	99%	2%	1%	1%	1%	1%
TEHAMA	0%	0%	0%	0%	0%	69%	48%	69%	60%	64%	31%	52%	31%	40%	36%
TRINITY	33%	0%	23%	50%	33%	35%	0%	39%	33%	23%	32%	0%	38%	17%	44%
TULARE	37%	35%	38%	36%	39%	58%	58%	56%	57%	56%	5%	7%	6%	7%	5%
TUOLUMNE	0%	0%	0%	0%	0%	97%	100%	98%	99%	97%	3%	0%	2%	1%	3%
VENTURA	20%	28%	26%	26%	27%	80%	72%	74%	74%	73%	0%	0%	0%	0%	0%
YOLO	46%	34%	46%	45%	33%	53%	64%	53%	54%	66%	1%	2%	1%	2%	2%
YUBA	0%	0%	0%	0%	0%	67%	100%	78%	90%	89%	33%	0%	22%	10%	11%
California	33%	38%	36%	39%	35%	64%	59%	61%	59%	62%	3%	2%	3%	2%	3%

SOURCE: Authors' calculations.

#### Facility-Access Analysis

Although these simple distance measures are obviously informative, they do not take into account demands placed on these safety net facilities by all the populations they serve. Other work shows that while spatial access to social services is often greater in central cities, so is demand for these services (Allard 2004). To more adequately assess the potential accessibility of these health care resources, we use a spatial-based methodology called the two-step floating-catchment-area method that incorporates the role of distance as well as measures of supply and demand. This method has been used in several assessments of physician supply, access to social services, and most recently by a RAND study to understand the accessibility of safety net resources for parolees returning to their communities (Radke and Mu 2000; Luo, 2004; Davis et al. 2009).

The first step (Stage 1) in constructing the accessibility measure involves computing a supply-to-demand ratio for each safety net facility. The numerator of the ratio (supply) is a measure of provider capacity at the facility. We measure supply for emergency departments using the number of ED beds; for community and free clinics licensed by the State (OSHPD clinics) we use the number of primary care provider FTEs working at the facility, where primary care providers include physicians, nurse practitioners, physician assistants, and certified midwives. It should be noted that we only have primary care FTE provider supply data for OSHPD clinics, and thus the accessibility measures calculated using this method include only a subset of clinics. The denominator of the ratio (demand) is the sum of the low-income population (below 200% FPL) of all census tracts whose centroids fall within a designated distance of the facility.

In the second step (Stage 2), the supply-to-demand ratios calculated for each safety net facility that is within a designated distance to the population-weighted ZIP code centroid are then summed to construct the final accessibility measure for each ZIP code. The resulting accessibility measure can be thought of as the average accessibility of all persons within the ZIP code that incorporates the demands placed on the facility from surrounding areas' census tracts within a specified distance, not just the immediate tract where the facility is located. For example, a safety net provider with a relatively high capacity may be located in a certain area that has high demand, but it may also be within the catchment area of other areas with high demand, rendering the overall accessibility measure for this safety net facility low despite relatively high capacity.

In calculating the access scores, we used two different distance constraints: 15-mile road distance, and a 30-minute travel time. These are the designated distances that are used in the first stage to determine which census tracts' low-income populations will be used to calculate demand for the facility and in the second stage to determine which facilities will be included to calculate the final access score for the ZIP code. We selected these distance constraints because they are used by the California Department of Managed Care to assess network adequacy and physician access for managed-care members in the state. We discuss the access measures based on the 15-mile constraint in the main body of the report, but we present those based on the 30-minute travel time constraint below to serve as a sensitivity check. In general, the two measures produce similar patterns of accessibility, although in general more locations are found within the 30-minute constraint relative to the 15-mile constraint, particularly in more urban areas of the state. This results in some minor differences in the levels of access across different regions in the state.

The maps presented in Figures B1–B4 display the 15-mile and 30-minute access measures by ZIP code and group them into low, medium, and high levels based on the distribution of scores across the state. Areas designated as low access are in the bottom third of the distribution of access scores throughout the state. We then overlay these access measures with indicators of large unauthorized immigrant populations (2,500 or more) to assess how the distribution of current safety net resources aligns with population groups that will

continue to rely on these providers after health care reform. However, these measures cannot predict behaviors. For example, non-English-speaking immigrants may travel even farther distances in order to find culturally and linguistically conducive medical services. The access measures created with a 15-mile constraint for both EDs and clinics are presented in the regional maps included in Figures 3 and 4 in the main body of the report. Below, we present statewide access maps for EDs and clinics within 15 miles (Figures B1 and B2) and within 30 minutes (Figures B3 and B4).

Figure B1.
Safety net emergency department access within 15 miles and unauthorized immigrant distribution, by region and ZIP code, 2009

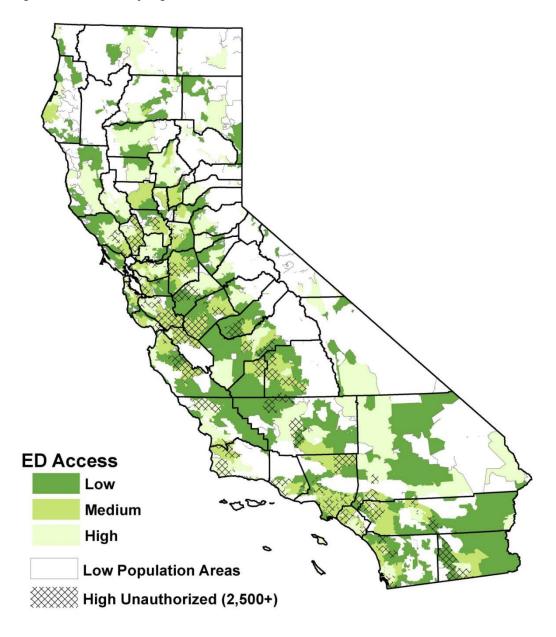


Figure B2.
Safety net clinic access within 15 miles and unauthorized immigrant distribution, by region and ZIP code, 2009

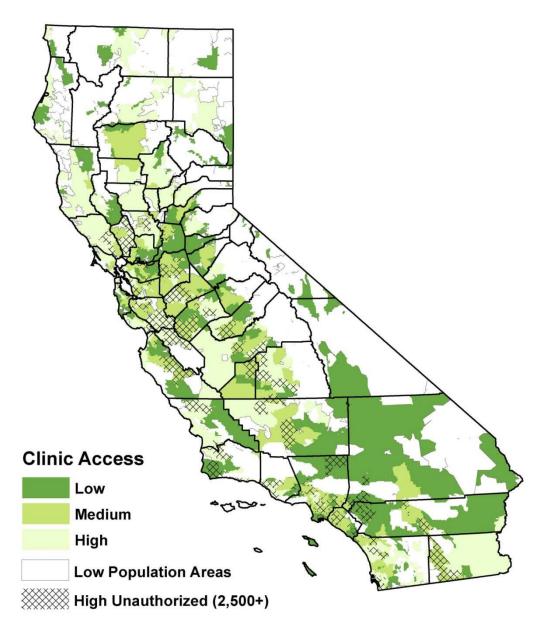


Figure B3.
Safety net emergency department access within 30 minutes and unauthorized immigrant distribution, by region and ZIP code, 2009

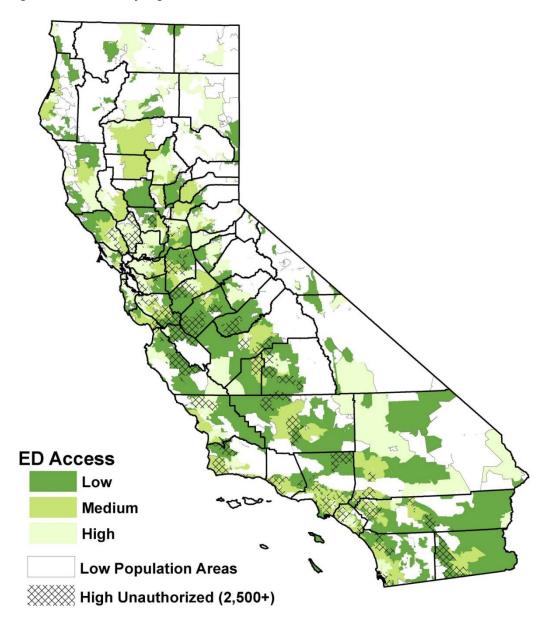
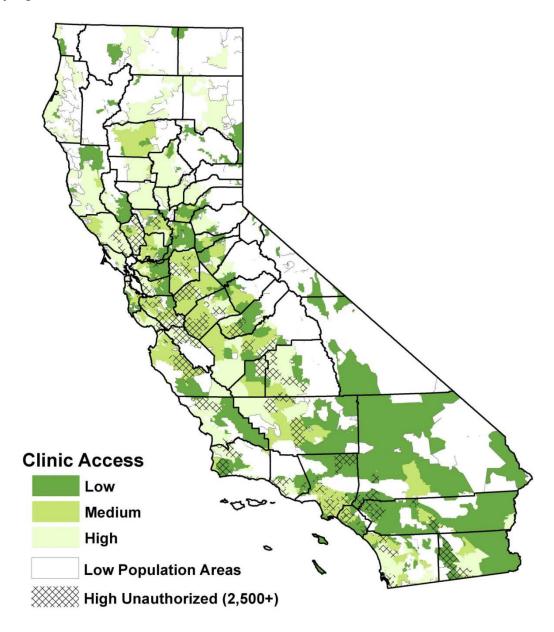


Figure B4.
Safety net clinic access within 30 minutes and unauthorized immigrant distribution, by region and ZIP code, 2009



## Appendix C: Case Studies Interviewees

Sonal Ambegaokar, health policy attorney, National Immigration Law Center

Stephanie Berry, assistant director, federal affairs, California Primary Care Association

Sarah Brooks, assistant director of policy, California Association of Public Hospitals and Health Systems

Cynthia Carmona, director of government and external affairs, Community Clinic Association of Los Angeles County

Ronald Coleman, statewide policy analyst, California Immigration Policy Center

Rosa Coronado, director, Migrant Education, Monterey County Office of Education

Dr. Maximiliano Cuevas, CEO, Clinica de Salud del Valle de Salinas

Ed Kissam, senior research associate, Aguirre International

Jesus Lopez, community worker, California Rural Assistance League

Mari Lopez, health policy specialist, California Partnership

Jim Mangia, CEO, St. John's Well Child and Family Center

Dr. Pedro Moreno, physician, Monterey County Alisal Health Center

Sarah Muller, director of government affairs and communications, California Association of Public Hospitals and Health Systems

Pamela Norton, coordinator, RotaCare Clinic, Monterey

Deborah Ortiz, vice president, Government Affairs, California Primary Care Association

Lauren Padilla-Valverde, East Salinas program officer, The California Endowment

Andie Martinez Patterson, deputy director of regulatory affairs, California Primary Care Association

Gerardo Pinedo, director of government relations and policy, Los Angeles Department of Health Services

Dr. Marc Tunzi, physician and assistant program director, Natividad Medical Center

Dr. Sarah Velasco, medical director, Clinica de Salud del Valle de Salinas

Dr. Casey Vibbard-Rodriguez, medical director, Clinica Oscar A. Romero

Joseph Villela, senior policy advocate, Coalition for Humane Immigrant Rights of Los Angeles

Doreena Wong, project director, Health Access Project, Asian Pacific Legal Center

### **Appendix D: Case Study Protocols**

#### Exhibit D.1. Immigrant advocate interviews, Los Angeles

Thank you for agreeing to participate in our project. We appreciate your taking the time to speak with us.

The interviews will last about an hour and are intended to be semi-structured in that we will propose some general topics and questions and then let the conversation develop from there. We would like to audiotape the interviews, if that is acceptable to you, as it will provide a more thorough and comprehensive way for us to take notes and will also allow us to more fully engage during the discussion itself.

We are planning on including a list of the people and organizations that we interview in an appendix of the report, so the information you provide will not be confidential, although we will not attribute any specific comment(s) to an individual. The second page of this document is an Informed Consent form that discusses your rights as a participant in this research project.

Examples of specific questions that we might ask include:

- From your organization's perspective, what are some of the biggest health issues or concerns facing immigrant populations in your community?
  - o How are these similar/different from issues facing immigrants across the state? Compared to other areas of Los Angeles?
- Can you discuss some of the distinct health, linguistic, and social services that are needed to provide care to immigrant populations in safety net institutions?
  - o How do you think this differs from other vulnerable populations (e.g., low-income groups)?
  - o How has your organization dealt with addressing or calling attention to these unique needs?
- In your opinion, how will the ACA change the relationship between immigrants and the public health care safety net systems? What aspects will remain the same?
  - o Public charge concern?
  - o What about the unauthorized? And mixed-status families, where, e.g., children might be eligible for public coverage?
- What, in your opinion, are some of the challenges in the new law? (e.g., anticipated mismatches between population need and safety net supply? Reduced funding to DSH hospitals?)
- Do you see opportunities in the new law (e.g., more access through coverage expansions)?
- Do you think the ACA will have direct or indirect impacts on immigrants who are currently insured through their employers?
- What strategies have you employed to address anticipated changes in the health care landscape due to implementation of the ACA? (e.g., targeted outreach and enrollment strategies? Working with other religious or philanthropic organizations to corral resources? Lobby or work with state partners on specific issues?)

Please feel free to contact any members of the research team if you have any questions, concerns or would like additional information.

Shannon McConville Helen Lee Laura Hill mcconville@ppic.org lee@ppic.org hill@ppic.org 415-291-4481 415-291-4418 415-291-4424

The Public Policy Institute of California, a nonprofit research organization, is conducting a study to understand how safety net providers and community organizations are preparing for the implementation of health care reform with a focus on providing services to immigrant populations, including the unauthorized. We are asking that you participate in this research by taking part in a 45–to-60-minute interview to discuss your organizations' plans surrounding these issues. The information you provide will be used in case studies that will be a part of a project to inform state and local policymakers as to the needs, preparations, and perspective of safety net and community organizations surrounding issues related to the implementation of health reform and immigrant communities. *The organizations and names of those interviewed will be included in an appendix of the report, so the information you provide will not be confidential*.

Your participation in the study is completely voluntary. If you do not wish to participate, we may attempt to contact another person within your organization to participate. If you do participate, you can stop at any time, do not have to answer any questions for any reason, and should not feel obligated to discuss anything that you are not comfortable with.

#### Exhibit D.2. Health Care Provider Interviews, Los Angeles

Thank you for agreeing to participate in our project. We appreciate your taking the time to speak with us.

The interviews will last about an hour and are intended to be semi-structured in that we will propose some general topics and questions and then let the conversation develop from there. We would like to audiotape the interviews, if that is acceptable to you, as it will provide a more thorough and comprehensive way for us to take notes and will also allow us to more fully engage during the discussion itself. These recordings will be used for our study purposes alone.

We are planning on including a list of the people and organizations that we interview in an appendix of the report, so the information you provide will not be confidential, although we will not attribute any specific comment(s) to an individual. The second page of this document is an Informed Consent form that discusses your rights as a participant in this research project.

Examples of specific questions that we might ask during our interview include:

- From your organization's perspective, what are some of the biggest health issues or concerns facing lowincome and vulnerable populations in your community today?
  - o How is Los Angeles different, in terms of its population mix and needs, from other parts of the state?
  - o How is L.A. different in terms of its ability to finance and provide care for its vulnerable populations? How does that vary across communities in L.A.?
- Can you discuss some of the distinct health, linguistic, and social services that are needed to provide care to immigrant populations in safety net institutions in this community?
  - o How do you think this differs from other vulnerable populations (e.g., low-income groups)?
  - o How has your organization dealt with addressing or calling attention to these unique needs?
- In your opinion, how will the ACA change the relationship between immigrants and the public health care safety net systems? What aspects will remain the same?
  - o Public charge concern?
  - o What about the unauthorized? And mixed-status families, where, e.g., children might be eligible for public coverage?

- What, in your opinion, are some of the challenges in the new law? (e.g., anticipated mismatches between population need and safety net supply? Reduced funding to DSH hospitals?)
- Do you think the ACA will have direct or indirect impacts on immigrants who are currently insured through their employers?
- Do you see opportunities in the new law for safety net institutions? For vulnerable populations, such as immigrants? (e.g., more access through coverage expansions?)
- What strategies have you employed to address anticipated changes in the health care landscape due to implementation of the ACA? (e.g., targeted outreach and enrollment strategies? Working with other religious or philanthropic organizations to corral resources? Lobby or work with state partners on specific issues?)

Please feel free to contact any members of the research team if you have any questions, concerns or would like additional information.

Shannon McConville Helen Lee Laura Hill mcconville@ppic.org lee@ppic.org hill@ppic.org 415-291-4481 415-291-4418 415-291-4424

#### **Informed Consent**

The Public Policy Institute of California, a nonprofit research organization, is conducting a study to understand how safety net providers and community organizations are preparing for the implementation of health care reform with a focus on providing services to immigrant populations including the unauthorized. We are asking that you participate in this research by taking part in a 45-to60-minute interview to discuss your organizations' plans surrounding these issues. The information you provide will be used in case studies that will be a part of a project to inform state and local policymakers as to the needs, preparations, and perspective of safety net and community organizations surrounding issues related to the implementation of health reform and immigrant communities. The organizations and names of those interviewed will be included in an appendix of the report, so the information you provide will not be confidential.

Your participation in the study is completely voluntary. If you do not wish to participate, we may attempt to contact another person within your organization to participate. If you do participate, you can stop at any time, do not have to answer any questions for any reason, and should not feel obligated to discuss anything that you are not comfortable with.

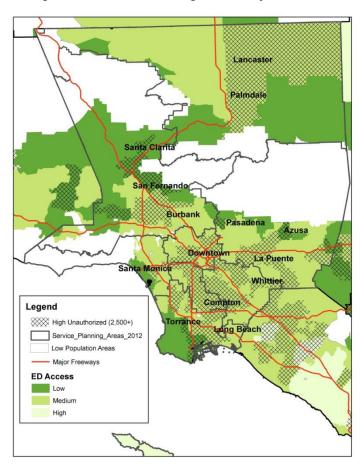
## Appendix E: Safety Net Access in Los Angeles and Monterey Counties

#### Los Angeles County

A closer look at patterns in ED access within L.A. County reveals that most of the urban core of Los Angeles, including South and East L.A., has mid-range levels of access (Figure E1). South Central neighborhoods have higher percentages of unauthorized immigrants, suggesting that ED care is likely to be particularly strained if residents use EDs frequently. The closure of High Desert and King-Drew hospitals arguably made access worse, but it is important to note that access does not necessarily capture impacts on quality of care. Less densely populated neighborhoods, including the northern L.A. area and pockets of the San Fernando and San Gabriel valleys, have the worst access to ED care, and certain communities (e.g., in Santa Clarita and Azusa) also have higher concentrations of unauthorized immigrants. Another area of low ED access and high unauthorized population concentration is in the far southern, port, area of the county near Torrance and San Pedro.

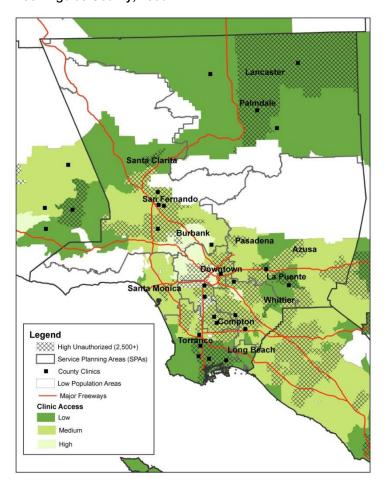
Figure E1.

Safety net emergency department access within 15 miles and unauthorized immigrant distribution, Los Angeles County, 2009



According to our clinic lists, more than 350 primary care safety net clinics provide care to L.A.'s large safety net population. Los Angeles is divided into eight geographical service planning areas (SPAs). Our analysis reveals that Antelope Valley (SPA 1), which covers the northern part of the county, has low access to clinics by our measure, but there are county-operated clinics in this region which are not included in our clinic access analysis. Areas around Lancaster and Palmdale also have high percentages of unauthorized immigrants. South Central Los Angeles (SPA 6) and Metro L.A. (SPA 4) both have mid-levels of clinic access but very high concentrations of unauthorized immigrants. These SPA areas also have much higher rates of residents living in poverty (around 30–40%) than the countywide average (CCALA 2012). The southern neighborhoods in San Gabriel (SPA 3) and the southeastern areas of the San Fernando Valley (SPA 2) are characterized by low levels of clinic access but large concentrations of unauthorized immigrants. Areas in the South Bay (SPA 8) near the Port of Los Angeles, including parts of Torrance, San Pedro, and Long Beach, are also categorized as low access, high unauthorized areas.

Figure E2.
Safety net clinic access within 15 miles and unauthorized immigrant distribution, Los Angeles County, 2009



#### **Monterey County**

When we examine Monterey County's maps, it is apparent that much of the county has low-to-mid-level ED access (Figure E3). In the northern part of the county, ED capacity is high due to proximity to Watsonville

Community Hospital in Santa Cruz County, and there are a fairly large number of unauthorized immigrants in the community. Salinas has mid-level ED access and high numbers of the unauthorized, especially in East Salinas. Soledad and the surrounding area have low-level access to EDs and large unauthorized populations. George Mee Memorial Hospital, in King City, accounts for a medium level of ED access, but large numbers of unauthorized immigrants live in the surrounding ZIP codes (in King City, Greenfield, and Soledad).

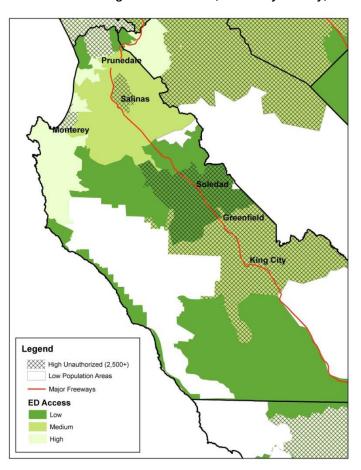


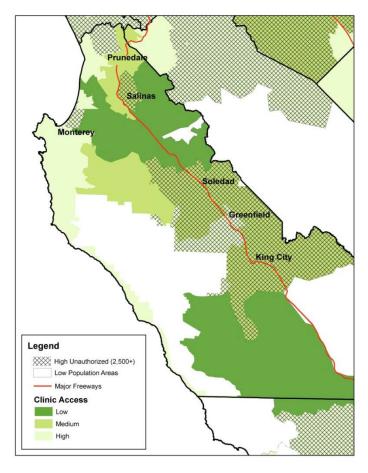
Figure E3. Safety net emergency department access within 15 miles and unauthorized immigrant distribution, Monterey County, 2009

There are seven county clinics in Monterey County. Nonprofit community clinics see patients of all types, but they charge sliding scale fees for their patients without insurance. Clinica de Salud (10 clinics, and a mobile clinic, with 36,000 registered patients) is the largest clinic network serving the low-income and uninsured population. Natividad and George Mee Memorial Hospital have clinic services, and there are a few other smaller clinic chains and independent clinics serving some of the cities in the county. In addition, Planned Parenthood in Salinas and Seaside provide reproductive health services and limited women's health care. Clinic capacity is at the medium level in the part of the county where the largest number and highest concentration of unauthorized immigrants reside, East Salinas (Figure E4).

According to our measures, clinic access is good in the town of Monterey and the ZIP codes south of Watsonville. However, the large numbers of unauthorized immigrants in each of those locales may put even more pressure on provider capacity than we can measure. Demand for free or reduced-fee health care is very

high in the county, higher still in the southern part of the county, where there are very limited providers (e.g., Greenfield). Clinic access is low in the southern part of the county, and while there are high concentrations of unauthorized immigrants there, only in the ZIP code encompassing King City are there substantial numbers of unauthorized immigrants.

Figure E4. Safety Net Clinic Access within 15 Miles and Unauthorized Immigrant Distribution, Monterey County, 2009



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