SAN FERNANDO VALLEY

Service Planning Area SPA

Chapter 2: HIV Epidemiologic Profile

Overview

This chapter:

- Presents a general description of Los Angeles County, including demographic characteristics;
- Describes the HIV and AIDS epidemic in Los Angeles County;
- Describes the HIV and AIDS epidemic across priority populations; and
- Offers resources for population and relevant sociodemographic information.

The Los Angeles County Department of Public Health, HIV Epidemiology Program is responsible for compiling an HIV epidemiologic profile every three to five years. With the many changes related to names-based HIV reporting in the State of California, the HIV Epidemiology Program is just now beginning the planning for the next comprehensive HIV epidemiologic profile. The HIV epidemiologic profile presented here, as part of the *County of Los Angeles HIV Prevention Plan 2009-2013*, represents an interim profile. It will assist community organizations, HIV prevention program planners, policy-makers, and other key stakeholders in the planning, implementation, and evaluation of programs and policies that involve HIV and AIDS care, prevention, education, and research in the County.

HIV reporting by name became mandatory in the State of California in April 2006. This reporting system replaced the non-name code reporting system in place since July 2002. While information on non-AIDS HIV-positive persons collected through non-name code reporting is presented, information on HIV reporting by name thus far is not complete, has not been validated, and therefore is not presented in this current HIV epidemiologic profile.

Description of Los Angeles County

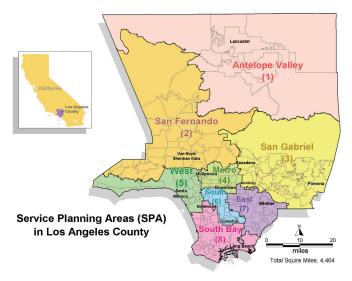
To thoroughly understand the HIV/AIDS epidemic in Los Angeles County and the challenges around designing prevention services, it is important to understand the complexity of Los Angeles County's physical, demographic, and social environment.

■ Geography

Established in 1850, Los Angeles County consists of 4,084 square miles, comprising approximately 3% of California's total land area. The County has 81 miles of ocean shoreline, mountain ranges with 10,000-foot peaks, densely populated metro areas (up to 51,849 persons per square mile), and a sparsely populated desert (approximately 191 persons per square mile) [1]. Los Angeles County includes the islands of San Clemente and Santa Catalina. It is bordered on the east by Orange and San Bernardino Counties, on the north by Kern County, on the west by Ventura and Riverside Counties, and on the south by the Pacific Ocean.

In November 1993, the Los Angeles County Board of Supervisors approved eight regional Service Planning Areas (SPAs) for planning, service coordination, and information- and datasharing by major county departments serving children and families. The Departments of Children and Family Services, Mental Health, Health Services, Public Social Services and Probation were instructed to begin implementation of these common boundaries for planning activities, and non-county entities were asked to adopt the same planning areas. Since that time, the SPA boundaries have been widely used to help organize and coordinate planning across Los Angeles County. Figure 2.1 below depicts a map of Los Angeles County with the eight SPA boundaries.

Figure 2.1 Map of Los Angeles County with Service Planning Areas



■ Population

Los Angeles has the largest population (10,294,280 as of July 2007) of any county in the nation, exceeded by only eight states [2]. Approximately 27.3% of California's residents live in Los Angeles County. The County's population has increased 8.1% since the 2000 census [2] growing from the 9.5 million residents reported in the 2000 census to its current size of nearly 10.3 million. The City of Los Angeles is the County's largest of the County's 88 incorporated cities with a population of 3.8 million, representing 39% of all County residents [3]. The City of Long Beach is the next largest city with a population of 472,494 representing 5% of all County residents.

Age/Gender Composition

As in past years, females accounted for slightly more of the County population (50.5%) in 2006 than did males (49.5%) [3]. The Los Angeles County HIV Epidemiology Program estimates there are approximately 4,400 male-to-female transgender individuals residing in the County. There are no current estimates available on the number and percentage of female-to-male transgender individuals in the County. As compared to the U.S., Los Angeles County has a higher percentage of children and young adults, while the U.S. has a higher percentage of adults aged 40 years and over. This trend indicates that Los Angeles County has a faster growing population than the U.S. Similarly, Los Angeles County had proportionately fewer residents aged 65 years and older (10.2%) than did the U.S. (12.4%), and had proportionally more children under the age of 18

years (26.9%) than did the U.S. (24.6%) [3]. In 2006, Los Angeles County's median age was 33.9 years, lower than that of the U.S., 36.4 years [3].

■ Growth Trends

Ongoing patterns of immigration and domestic migration continue to reshape Los Angeles County. Through June 30, 2007, natural increase (i.e., births over deaths) accounted for 86.3% of the County's population growth since the 2000 census. There were approximately 1.1 million births reported during this period and 433,871 deaths [2]. Net migration (i.e., immigration from other countries and migration from areas outside the County) accounted for the other 13.7% of the growth [2]. This growth was due to the 545,443 persons who came to Los Angeles County from other countries. This exceeded the 439,209 residents who left the County and moved to other areas.

Los Angeles County's birth rate (15 per 100,000 population in 2004) is comparable to that of California as a whole (15 per 100,000) [4]. County birth rates, however, have continued to decline since a peak of 22.9 per 1,000 in 1990 [5]. As seen in Table 2.1, in 2005, Latina or Hispanic mothers delivered 63.1% of all births; Whites, 17.4%; Asian/Pacific Islanders, 10.5%; African Americans or Blacks, 7.2%; and Native Americans 0.1% [1]. Most striking is that Latinas or Hispanics represent 63.1% of all mothers while they comprise only 47% of the female population. The infant death rate fell from 8 infant deaths per 1,000 births in 1990 to 5.9 in 2004 [6]. The proportion of births to teenage mothers (less than 20 years old) was 9.5% in 2004 [4].

Table 2.1 Percent of 2005 Los Angeles County Population and Births by Race/Ethnicity

Race/Ethnicity	Percent of Population	Percent of Births
African American or Black	9.0%	7.2%
Asian or Pacific Islander (API)	12.6%	10.5%
Latino or Hispanic	47.0%	63.1%
Native American	0.3%	0.1%
White	28.9%	17.4%
Two or more races	2.0%	1.1%
Other	0.2%	0.6%

Source: California Department of Health Services as reported in the United Way of Greater Los Angeles, Zip Code Data Book 2005.

■ Recent Immigrants

Constant migration continues to drive the racial/ethnic diversity of Los Angeles County's population. Coming from six continents and nearly 100 countries, over 3.5 million County residents (35.4%) are foreign-born, compared with 27.2% of Californians and 12.5% of Americans, according to the U.S. Census [3]. In fact, Los Angeles is the nation's second largest port of entry for immigrants in the U.S. Nearly half (49.2%) of all Latino residents and 69.5% of Asians are foreign-born [3]. More than half (56.3%) of the County's population speak another language besides English at home, while 27.2% state they do not speak English "very well" [3].

■ Racial Composition

Los Angeles is one of the most ethnically diverse counties in the nation. Los Angeles has been characterized by ethnic transition since the 1700's, shifting from Native American to Mexican to non-Latino White to today's multi-racial, multi-ethnic mix of people from all parts of the world. While Whites are the majority racial/ethnic group in the U.S. as a whole, no racial or ethnic group constitutes greater than 50% of the population in Los Angeles County [3]. Latinos or Hispanics, with 47.0% of the County's population [1], are projected to be 52.6% of the population by 2020 [6]. Non-Latino Whites account for 28.9% of County residents, Asian/Pacific Islanders 12.5%, African Americans or Blacks 9.0%, Native Americans 0.3%, and multiple races/ethnicities or other race/ethnicity accounts for 2.2% of the total population [1]. Although Native Americans represent less than 1% of the total population, they constitute the largest urban concentration of Native Americans in the U.S.

These broad racial/ethnic categories mask an even greater diversity of the ethnic communities in Los Angeles County, which is composed of many nationalities with distinct cultures and languages. For example, as of 2006, countries of origin among the County's Latino or Hispanic residents include Mexico, Cuba, the Dominican Republic, and other countries in Central and South America. Puerto Rico accounted for 1.0% of the County's Latino or Hispanic community [3]. Among Asian/Pacific Islanders (API), 97.9% are Asian and 2.1% Pacific Islander [3]. Countries of origin include China, the Philippines, Korea, Japan, Vietnam, India, Taiwan, and Samoa among others [3]. Los Angeles County's Native American population is also extremely diverse, and includes various tribal groupings (i.e., Cherokee, Chippewa, Navajo, and Sioux among others).

■ Mortality and Cause of Death

In 2004, the overall crude death rate for Los Angeles County was 669 deaths per 100,000 [7]. Coronary heart disease was the leading cause of death in Los Angeles County across all races/ethnicities. The rate was 196 per 100,000 population. This ranged from a low of 119 per 100,000 population among Asian/Pacific Islanders to 312 per 100,000 among African Americans or Blacks. Other leading causes of death were stroke and lung cancer [8]. A significant change from the earlier years is that AIDS is no longer a leading cause of death among Los Angeles County residents. However, it ranks as the third leading cause of premature death among African Americans or Blacks [8].

■ Infant Health

The vast majority of County women (89.9%) received prenatal care in their first trimester in 2004 and nearly all (97.3%) received care by the second trimester [4]. Approximately 10.7% of all mothers had preterm births (i.e., gave birth at less than 37 weeks). African American or Black mothers were the most likely (14.5% of all births among African American or Black women) to have a preterm birth.

Low birth weight is defined as a weight less than 2,500 grams at birth. The *Healthy People 2010* goal is to reduce low birth weight births to an incidence of no more than 5% of live births. In 2004, 7.1% of Los Angeles County births were considered low. Low birth weight was highest among African American or Black women (12.7%) and lowest among Native American women (4.5%). In terms of geography, the highest low birth weight babies were born in Service Planning

Area (SPA) 6: South (6.8%) and SPA 1: Antelope Valley (6.7%). Approximately 1.3% of all Los Angeles County mothers had very low birthweight babies (<1500 grams at birth). Native American mothers (3.8% of births among Native American mothers) and African American or Black mothers (3.2% of births among African American or Black mothers) were the most likely to have very low birthweight babies. This compares to 1.2% of White, Latino or Hispanic, or Asian/Pacific Islander mothers [4].

The *Healthy People: 2010* goal for infant mortality rate (deaths among infants less than one year of age) is 4.5 per 1,000. Los Angeles County's 2004 rate is slightly higher at 5.0 per 1000 live births. Infant mortality is highest among African American or Black women, 11.7 per 1,000 live births. Geographically, infant mortality is highest in SPA 6: South (6.0 per 1,000), followed by 5.6 per 1,000 live births in both SPA 1: Antelope Valley and SPA 2: San Fernando Valley [4].

Description of Selected Co-Factors that Contribute to Risk for HIV

The Prevention Plan Work Group of the Los Angeles County HIV Prevention Planning Committee spent innumerable hours discussing the importance and role of co-factors in contributing to the risk for acquiring or transmitting HIV. Many of the common co-factors are shared across priority populations and include issues such as poverty, educational level, mental health issues, homelessness, and presence of sexually transmitted infections (STIs). Most communities provide measures of these factors to estimate the prevalence within the population. Other co-factors, such as stigma, discrimination and racism are less easy to measure but may also contribute to a person's risk for acquiring or transmitting HIV. The narrative that follows provides available information in Los Angeles County of some of these co-factors. Understanding these co-factors and how they impact a specific priority population will aid organizations as they design programs to meet the needs of their specific community at risk for HIV.

■ Industry and Unemployment

Over the past few years, the County has witnessed a shift in the labor force from manufacturing jobs to service industry jobs, which also implies a shift to lower wages and frequently to positions of lower pay with no health insurance benefits. In November 2007, the leading industries in the County are Professional and Business Services and Government each with 12% of the labor force, followed by Educational and Health Services with 10.1%, Manufacturing with 9%, and Retail Trade with 8.6% [9]. The seasonally adjusted unemployment rate in Los Angeles County was 5.2% in November 2007, compared with 5.6% in California and 4.7% in the U.S. [10].

Income and Poverty

Between 2000 and 2006, the median annual income for Los Angeles County residents, adjusted for inflation, increased 21.6%, from \$42,189 to \$51,315 [3]. According to the U.S. Census 2006 American Community Survey, 12.4% of residents lived at or below the federal poverty line (FPL). In comparison, 13.1% of California's population and 13.3% of the U.S. population live in poverty [11]. However, this varied significantly across racial/ethnic populations in the County with communities of color being the most disproportionately impacted. Approximately 20.4% of Latinos or Hispanics and 21.1% of African Americans or Blacks lived at or below 100% FPL in 2006 compared with 8.1% of Whites and 10.3% of Asian and Pacific Islanders [11].

It is important to note that the federal poverty guidelines are "widely considered to be an inadequate measure of poverty [11]." They were developed in the 1960s and are out of date. They have not taken into account rising prices or geographic differences in the cost of living (e.g., housing, health care, etc.). The 2007 FPL in Los Angeles County was \$20,650 for a family of four. As seen in Table 2.2 below, the California Budget Project estimated that even single adults living in Los Angeles County would need more than \$24,000 to meet their basic needs. The expenses outlined in Table 2.2 represent "bare bones" costs for individuals and families living in Los Angeles County. As can be seen, in most cases, an individual or family living in Los Angeles County has to earn more than twice the FPL in wages to afford basic living expenses. Thus, in Los Angeles County, the FPL is more a measure of people living in extreme poverty.

Table 2.2 Comparison of Monthly Basic Family Budgets and Expenses Excluding Health Care

	Single Adult	Single Parent Family of Three	Two Parent (One Working) Family of Four	Two Working Parent Family of Four	Two Working Parent Family of Four No Child Care Expenses
Housing/Utilities	\$821	\$1,160	\$1,160	\$1,160	\$1,160
Child Care	\$0	\$1,093	\$0	\$1,093	\$0
Transportation	\$409	\$409	\$409	\$741	\$741
Food	\$211	\$507	\$731	\$731	\$817
Miscellaneous	\$206	\$437	\$506	\$506	\$506
Taxes	\$357	\$367	\$220	\$463	\$304
Monthly Total	\$2,004	\$3,972	\$3,026	\$4,694	\$3,528
Annual Total	\$24,050	\$47,665	\$36,311	\$56,331	\$42,336
2007 Federal Poverty Guidelines	\$10,210	\$17,170	\$20,650	\$20,650	\$20,650

Source: UCLA Center for Health Policy Research, 2007.

Housing and Homelessness

In 2006, the housing vacancy rate was a very low 4.8% and only 48% of housing units were owner occupied [3]. This compared to a housing vacancy of 7.8% in California or 11.6% in the U.S. [3]. The rent burden of County residents has become worse over the past few years. Approximately 53% of renters pay more than one-third of their income in rent. This compares to 47% of California and 41% of U.S. renters [13]. These housing costs place a tremendous burden on County residents as they struggle to make ends meet.

Table 2.3 shows the 2008 Fair Market Rent (FMR) established by the U.S. Department of Health and Human Services for Los Angeles County. As can be seen, the cost of housing alone for an efficiency apartment exceeds the 2007 FPL for a single person (Table 2.2).

Table 2.3 Los Angeles County Final FY 2008 Fair Market Rents By Number of Bedrooms

	Efficiency	One-Bedroom	Two-Bedroom	Three-Bedroom	Four-Bedroom	
FY 2008 FMR	\$863	\$1,041	\$1,300	\$1,746	\$2,101	
Annual Cost	\$10,356	\$12,492	\$15,600	\$20,952	\$25,212	

Source: U.S. Department of Housing and Urban Development. Available at http://www.huduser.org/datasets/fmr//fmrs/index.asp?data=fmr08.

According to the Los Angeles Homeless Services Authority's (LAHSA) 2007 homeless count, there are 68,607 homeless people living in Los Angeles County on any given day. As a result, approximately 141,737 people experience homelessness in Los Angeles County at some point during the year [14].

Health Insurance and Access to Care

According to the 2005 California Health Interview Survey, 29.9% of non-elderly adults and 10.4% of children in Los Angeles County did not have health care insurance [15]. This compares to 24.8% of non-elderly adults and 10.7% of children in California without insurance. This proportion increases dramatically for persons living at or below 300% FPL. For non-elderly adults living below 300% FPL, 76.5% were uninsured and 87.8% of children were uninsured. According to the County's Key Indicators of Public Health, 2005, 19.8% of adults and 10.2% of children in the County reported having no regular source of health care. In addition, 30.1% of adults and 14.5% of children were reported to have difficulty accessing medical care [7].

■ Education

The Los Angeles County Office of Education is the nation's largest intermediate educational agency. In 2005-2006, there were 1.7 million students enrolled in 1,942 public schools in 93 school districts in the County [16]. The Los Angeles Unified School District is the largest district with 42.8% of all County public school students enrolled. The average class size of Los Angeles County schools is 27.9 students, slightly higher than that of California (27.3 students). Latinos or Hispanics comprise 62.1% of all students in public schools, while Whites comprise 16%, African Americans or Blacks 10.1%, Asians 7.7%, Filipinos 2.2%, Pacific Islanders 0.4%, and American Indians or Alaskan Natives 0.3%. Students in the County's schools speak 56 different languages.

In 2006, 75% of Los Angeles County residents over 25 years of age had a high school diploma or equivalent [3]. A high school diploma is essential for economic advancement and raising oneself out of poverty; however, only 60% of Los Angeles County students entering school in 2005 will likely receive their high school diploma within four years. This compares to rates of 72% at the state level and 90% nationally [13]. Although graduation rates have been consistently above 75% for Asian/Pacific Islanders and Whites, African Americans or Blacks and Latinos or Hispanics have consistently had graduation rates closer to 50%.

■ Incarceration

Incarceration of adults in Los Angeles County includes inmates of federal, State, and County facilities. The two federal correctional facilities in Los Angeles County have a daily census of approximately 2,039 inmates [17]. The adult California Department of Correction facility houses 4,997 inmates [18]. The daily inmate census for the nine jail facilities and the Inmate Reception Center of the Los Angeles County Sheriff's Department has risen due to facility re-openings from just over 17,000 in 2003 to over 18,980 in 2007. In 2006, 118,115 inmates were booked into the County jail system of which 88% were male. Among males, 48% were Latino or Hispanic, 35% African American or Black, 14% White, and 3% of other race/ethnicity. Among female inmates, 42% were African American or Black, 33% Latino or Hispanic, 22% White, and 3% of other race/ethnicity. Historically, about 95% of the inmates released on probation from the County jail system remain in the County. During 2006, the Los Angeles County Sheriff's Department made a total of 108,995 arrests, including 11.4% among youth (<18 years old). This was up slightly from the 107,579 arrests made in 2005. In 2005, 11.9% were juvenile arrests [19].

While efforts to collect data regarding the proportion of inmates who are either men who have sex with men (MSM) or transgender individuals have begun, annual data are unavailable at this time. However, a "snapshot" provided by the Sheriff's Department on some demographics relating to one day's bookings and housing totals highlighting the profile of MSM in custody in the County jail system. On August 1, 2007, of the new bookings that came into the Inmate Reception Center, 23 (5.8%) answered "yes" to the question in classification stating that they were gay. On August 1, 2007, the male inmates that were already housed in the County jail and answered "yes" to the question in classification stating that they were gay totaled 392 (2.3%). Inmates are housed in various areas according to their classification. Of the 392 total, 43% (167) were African American or Black, 28% (111) were White, 26% (103) were Latino or Hispanic, and 3% (11) were of other race/ethnicity. In this same population, 19% (74) were 18-25 years of age, 46% (182) were 26-39 years of age, and 35% (136) were 40 years of age or older. No data were available at this time regarding transgender populations.

■ Mental Illness

Severe and persistent mental illness includes chronic schizophrenia, bipolar disorder, major depression, dementia, or other psychological conditions that may lead to persistent disability. The California Department of Mental Health estimates that around 6.6% of California's population have serious mental illness and are in need of mental health services [20]. Approximately 645,745 Los Angeles County residents (29% of the State's total) are in need of mental health services. This represents 6.8% of Los Angeles County's population. Table 2.4 below depicts the sociodemographic characteristics of Los Angeles County residents with serious mental illness who are in need of mental health services.

Table 2.4 Characteristics of Los Angeles County Adults (≥ 18 years old) with Serious Mental Illness Estimated to be in Need of Mental Health Services [21].

CHARACTERISTIC	TOTAL PO	PULATION	JSEHOLDS OVERTY	
Adult Total	Cases	Percent of Total Population	Cases	Percent of Total Population
Adults (all)	438,293	6.40%	203,785	8.66%
Age	Cases	Percent	Cases	Percent
18-20	41,174	9.82%	22,739	11.41%
21-24	43,339	7.72%	24,199	9.20%
25-34	95,633	6.05%	49,338	8.06%
35-44	115,429	7.61%	53,593	10.46%
45-54	58,910	5.13%	22,954	7.65%
55-64	35,969	5.17%	14,054	7.76%
65+	47,837	5.16%	16,908	5.90%
Gender	Cases	Percent	Cases	Percent
Male	165,063	4.95%	71,357	6.57%
Female	273,229	7.78%	132,428	10.44%
Ethnicity	Cases	Percent	Cases	Percent
White	141,194	5.81%	38,611	8.61%
African American or Black	39,982	6.28%	18,843	8.16%
Asian	49,192	5.57%	19,833	8.06%
Pacific Islander	1,147	7.32%	504	9.90%
Native American	957	4.99%	539	6.31%
Other	1,210	9.17%	726	10.70%
Multi-Race	11,011	7.57%	5,217	10.09%
Latino or Hispanic	193,600	7.15%	119,513	8.81%
Education	Cases	Percent	Cases	Percent
< High school	185,048	8.83%	118,237	9.87%
High school graduate	206,959	6.42%	76,526	8.09%
College grad	46,286	3.03%	9,022	4.27%
Federal Poverty Line (FPL)	Cases	Percent	Cases	Percent
Below 100%	111,644	10.81%	108,972	10.86%
100%-199%	95,652	7.01%	94,812	7.02%
200%-299%	59,942	5.49%	0	0.00%
300%+ pov	146,670	4.51%	0	0.00%

Source: California Department of Mental Health.

In Table 2.4, there are striking differences across different population groups and relationships between groupings. Across all sociodemographic categories, individuals living in households earning less than 200% FPL have a greater need for mental health services. That is, the percent of the total population that needs mental health services is consistently higher in "< 200% FPL" households than in the total population overall. This is also seen when looking at the FPL category. An estimated 10.8% of individuals living below 100% FPL have a need for mental health services as compared to 6.4% of the total adult population. This trend is similar for individuals with lower educational levels. An estimated 8.8% of individuals with less than a high school education have a need for mental health services, compared to 6.4% of high school graduates and 3.0% of college graduates. Latinos or Hispanics and multi-race individuals have the highest need for mental health services than men. Young adults (ages 18 to 24 years) have the highest need for mental health services across age groups.

Similar to adults, children and youth less than 18 years old who live in households earning less than 200% FPL have a greater need for mental health services than the total youth population (9.0% versus 7.8% respectively). This pattern holds true for children and youth living below 100% FPL. Across race/ethnicity, Native American (8.2%), Latino or Hispanic (8.2%), and African American or Black (8.1%) children and youth have the highest need for mental health services. Both male and female children and youth, and youth across all age categories have a comparable need for mental health services (Table 2.5).

Table 2.5. Demographic Characteristics of Los Angeles County Youth (< 18 years old)
Estimated to be in Need of Mental Health Services [21]

Estimated to be in Need of Mental Health Services [21].									
CHARACTERISTIC	TOTAL PO	PULATION		USEHOLDS OVERTY					
Youth Total	Cases Percent of Total Population		Cases	Percent of Total Population					
Youth (all)	207,453	7.78%	118,895	8.97%					
Age	Cases	Percent	Cases	Percent					
0-5	69,976	7.81%	41,455	8.97%					
6-11	73,225	7.72%	43,681	8.97%					
12-17	64,251	7.80%	33,759	8.96%					
Gender	Cases	Percent	Cases	Percent					
Male	106,653	7.80%	60,940	8.96%					
Female	100,799	7.75%	57,955	8.97%					
Ethnicity	Cases	Percent	Cases	Percent					
White	36,077	6.83%	9,814	8.88%					
African American or Black	21,389	8.07%	12,591	9.20%					
Asian	17,377	7.20%	7,041	8.90%					
Pacific Islander	601	7.91%	355	9.07%					
Native American	526	8.18%	335	8.90%					
Other	534	7.93%	334	9.12%					
Multi-Race	5,724	7.41%	2,447	9.16%					
Latino or Hispanic	125,225	8.16%	85,978	8.94%					
Federal Poverty Line	Cases	Percent	Cases	Percent					
Below 100%	64,213	10.00%	64,042	10.00%					
100%-199%	54,868	8.00%	54,853	8.00%					
200%-299%	32,852	7.00%	0	0.00%					
300%+ pov	48,897	6.00%	0	0.00%					

Source: California Department of Mental Health.

Substance Use

The Los Angeles County Department of Public Health, Alcohol and Drug Program Administration (ADPA) contracts with organizations to provide a range of treatment and recovery services to County residents with alcohol and other drug problems. Consistent with federal, State, and County reporting requirements, each time an individual enters or departs from a treatment program, standardized admission or discharge information is collected. Since a participant may be admitted to more than one program during the fiscal year (FY), or return to the same program more than once, the number of participant program admissions can be greater than the number of individual participants.

From 2001-2002 to 2005-2006, the annual number of admissions to ADPA programs increased by 24.8% and individual participants increased by 23.4% [22]. During the 2005-2006 fiscal year, 150 ADPA contracted agencies provided treatment/recovery services to a total of 44,853 participants who accounted for 56,016 program admissions. Participant demographics have remained relatively constant. During the 2005-2006 fiscal year, the majority of treatment/recovery participants were male (65.4%); Latino or Hispanic (34.2%), White (29.8%), and African American or Black (25.4%); between 25 and 44 years of age (57.5%); had 9 to 12 years of education (75.4%); and unemployed (68.4%). Methamphetamine (30.8%) was the most frequently reported primary drug problem, followed by cocaine/crack (23.0%), and alcohol (19.7%). Over the past five fiscal years, (2001-2002 through 2005-2006), the number of participants reporting methamphetamine as their primary drug of choice has increased each year. The prominence of methamphetamine has grown from 17.4% in FY 2001-2002 to 30.8% in FY 2005-2006.

ADPA-contracted agencies address specific needs of certain populations such as criminal justice defendants, homeless individuals, injection drug users, persons with co-occurring mental illness and substance abuse problems, pregnant and parenting women, and public assistance recipients. The most frequently reported drug problem for CalWORKs (California's welfare to work program) recipients was methamphetamine. Admissions for participants with co-occurring mental illness and substance abuse problems has more than doubled over the past five fiscal years (5,632 in FY 2001-2002 to 12,263 in FY 2005-2006). Alcohol was the most frequently reported primary drug problem for General Relief (County-funded welfare program that provides temporary cash aid to indigent adults who are ineligible for federal or State programs) participants for fiscal years 2001-2002 through 2004-2005. This changed in FY 2005-2006 when methamphetamine became the number one drug problem for General Relief recipients.

A total of 49,950 homeless participants have been admitted to ADPA-funded alcohol and drug treatment/recovery programs from FY 2001-2002 to FY 2005-2006. The percentage of homeless participants reporting mental health concerns has increased over this period, from 15% in FY 2001-2002 to 23.3% in FY 2005-2006. In 2005-2006, the most frequently reported drug problems reported by homeless participants were methamphetamine (30.7%), cocaine/crack (28.8%), and alcohol (19.0%). Each fiscal year, the majority of homeless participants (62.3% in FY 2001-2002 to 56.4% in FY 2005-2006) successfully complied with their treatment plan. Each fiscal year, heroin was the primary drug problem for two-thirds of injection drug users. Noteworthy is the increase in syringe users reporting methamphetamine as their primary drug problem; this has grown from 11.0% in FY 2001-2002 to 19.2% in FY 2005-2006.

During this five-year period, the majority of perinatal program participants (58.2% in FY 2001-2002 to 79.7% in FY 2005-2006) received services from a day care program. Perinatal participants were the most likely to report cocaine/crack or methamphetamine as their primary drug problem. While people seeking treatment for cocaine/crack use has declined (40.1% to 21.7% over five years) among people seeking treatment, methamphetamine use has increased (30.2% to 43.6%) during the same period. The number of pregnant women in alcohol and drug treatment/recovery programs has increased by 29% from FY 2001-2002 through FY 2005-2006. During FY 2005-2006, 6.1% (947 of 15,534) of female participants reported being pregnant. Since FY 2002-2003, methamphetamine has been the most frequently reported primary drug problem followed by cocaine/crack.

CRYSTAL METHAMPHETAMINE

The use of crystal methamphetamine has reached epidemic proportions in Los Angeles County, particularly among groups at highest risk for HIV infection, including gay men and non-gay identified men who have sex with men (MSM). In 2005, Los Angeles County reported 12,535 admissions for methamphetamine abuse, the highest among California counties. According to the 2005 HIV counseling and testing data, 1 out of 10 gay men in Los Angeles County accessing HIV prevention services have used methamphetamine within the last six months.

Increasingly, there is a correlation between new HIV diagnoses and crystal methamphetamine use in the gay and non-gay identified MSM communities. Studies have demonstrated that crystal methamphetamine functions as a sex drug in gay and non-gay identified MSM communities, where it is used to initiate and enhance sexual encounters. The drug's ability to heighten sexual arousal and reduce inhibitions is proving to be a dangerous combination leading to risky sexual behavior, and to an increase in numbers of sexual partners. Methamphetamine using gay men and non-gay identified MSM are between two to three times more likely to be HIV positive than gay men and non-gay identified MSM who do not use methamphetamine.

In November 2005, the Los Angeles County HIV Prevention Planning Committee (PPC) formed the ad hoc Crystal Meth Task Force. This Task Force was charged with: (1) examining available data regarding HIV prevention strategies for gay men and non-gay identified MSM using methamphetamine; (2) identifying successful strategies and/or interventions for HIV prevention targeting methamphetamine users; (3) gathering feedback from community members regarding the prevalence of methamphetamine use and programs that address its use; and (4) formulating recommendations to be considered by the PPC. These recommendations are included in Attachment A at the end of this chapter.

❖ ALCOHOL

The use of alcohol continues to be prevalent across all populations. In 2005, 67% of all gay men and non-gay identified MSM who tested for HIV reported a history of alcohol use within the last two years and/or since their previous test result. Treatment admissions with alcohol being the primary substance used consistently remain around 20% in ADPA funded programs. Like methamphetamine, the use of alcohol reduces inhibitions and often leads to risky sexual behavior.

Other Considerations

Among African Americans or Blacks, social and economic factors including homophobia, high rates of poverty and unemployment, racism, sexism, domestic violence, educational levels and low self-esteem, as well as lack of access to quality health care, including health education, serve as barriers to early HIV testing, diagnosis, and treatment. The major barrier to services for African American or Black gay men and non-gay identified MSM is the perception of stigma, isolation, and alienation from the larger African American or Black community. The recent public attention towards the "down low" phenomenon only served to further blame African American or Black gay men and non-gay identified MSM.

The HIV/AIDS epidemic among Latinos or Hispanics is complicated by a host of inter-related factors that have bearing on how health care and social service providers respond. These factors include: ethnic/cultural differences, migration, immigration policy, socioeconomic status, and geography as well as behavioral risk. For Latinos, compromised access to HIV prevention, care

and treatment and reluctance to get tested for HIV is associated with HIV/AIDS stigma, homophobia, and racism; fear of deportation; lack of information about HIV/AIDS, available services or entitlements; xenophobia; and mistrust of health care systems.

Other major barriers to services for many gay men of color include isolation and alienation from heterosexual communities of color, and marginalization by the larger gay community. Studies have explored the psychosocial correlates of HIV risk behavior for gay men and non-gay identified MSM. These studies have shown that poverty, racism, and homophobia, which are often inter-related, tend to produce heightened risk for HIV infection by increasing social isolation, alienation and a sense of personal shame. For some gay men and non-gay identified MSM of color, financial hardship, family rejection, stigma, and disparities in access to health care and prevention education create barriers to health promoting behaviors, preventing their fair and full participation in community life.

Changing trends in the African American or Black and Latino or Hispanic populations in the State of California create specific demands on service delivery systems and requires creative, coordinated, and consistent use of organizational and community resources. More specifically, health care and social service providers who serve African Americans or Blacks and Latinos or Hispanics at risk for HIV/AIDS must keep programmatic pace with changes in the epidemic and the specific needs of those most impacted.

Epidemiologic Trends in HIV and AIDS in Los Angeles County

As of June 30, 2007, a cumulative total of 52,463 persons living with AIDS and 30,490 AIDS-related deaths were reported in Los Angeles County for a cumulative case-fatality rate of 58%. As of December 2006, Los Angeles County accounted for 5.2% of cumulative reported AIDS cases in the U.S., 5.6% of U.S. AIDS deaths, and 4.9% of the nation's persons living with AIDS (PLWA). There are now 21,973 PLWA in Los Angeles County [23, 24].

Comparison of AIDS Trends in Los Angeles County and the U.S.

While there are some similarities in AIDS trends in the U.S. and Los Angeles County (i.e., the dramatic decrease in reported AIDS cases and AIDS deaths from 1995 to 1998) (see Figures 2.2 and 2.3), there are key differences. These differences are in the distribution of AIDS cases by demographics and risk exposure. Therefore, it is important to look at Los Angeles County data and trends when trying to understand the impact of the epidemic locally.

In both the U.S. and Los Angeles County, the number of AIDS cases diagnosed annually increased sharply, peaking in 1992-1993. After a few years of steady decline, a steeper decline was seen from 1996 to 1998 before leveling off from 1999 to 2002. Nationally, the CDC reported a 2.2% increase in annual diagnosed AIDS cases from 2001 to 2002, sparking concerns about the growing resistance of HIV to highly-active antiretroviral therapy (HAART). Unlike the U.S., Los Angeles County has yet to see a similar increase in annual AIDS cases.

Figure 2.2 AIDS Cases in Los Angeles County by Year of Diagnosis and AIDS Deaths by Year of Death, from 1986 through 2005

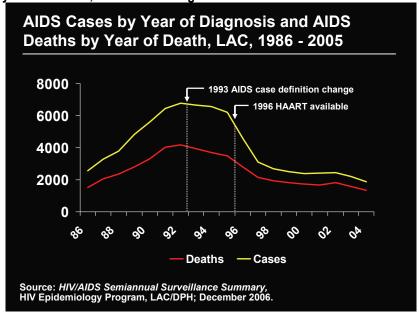
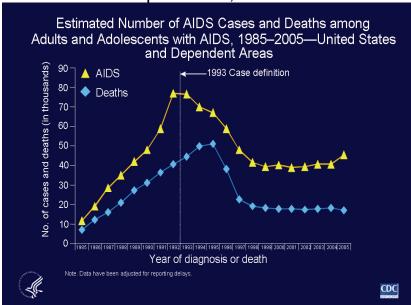
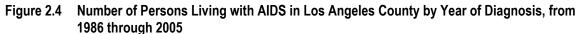


Figure 2.3 Estimated Number of AIDS Cases and Deaths among Adults and Adolescents with AIDS in the United States and Dependent Areas, 1985-2005



Annual AIDS deaths have also shown nearly identical patterns in the U.S. and Los Angeles County, with steady increases seen up to 1995, followed by steep declines from 1996 to 1998 (when HAART was introduced), followed again by less steep declines thereafter. In 2001, the County saw its first increase in AIDS deaths since 1994—an increase of 1.1%. With the decline in deaths outpacing the decline in new cases, the number of persons living with AIDS in the U.S. and Los Angeles County continues to increase (see Figures 2.4 and 2.5).



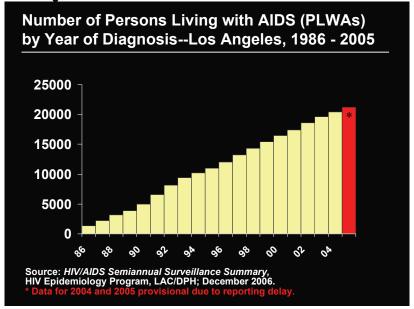
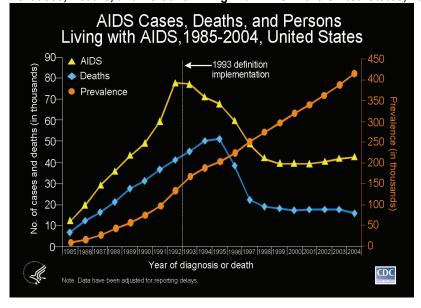


Figure 2.5 AIDS Cases, Deaths, and Persons Living with AIDS in the United States, 1985-2004



❖ GENDER

The percentage of males living with AIDS is much higher than for females. Men living with AIDS account for a higher proportion in Los Angeles County (89%) than they do nationally (77%). From 1993 to 2005, there has been a trend of increasing proportion of new AIDS diagnoses in females; but this trend has been less marked for Los Angeles County than for the U.S. (see Figures 2.6 and 2.7). Males comprised 86% of newly reported AIDS cases in the County in 2005. Because data are lacking for transgender individuals, the proportion of males is inflated because transgender women are reported as males in the data.

Figure 2.6 Number of Adults/Adolescents Living with AIDS by Gender in Los Angeles County, 1995-2002

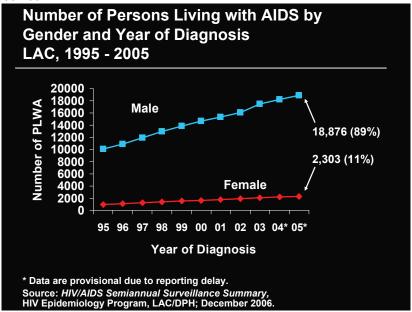
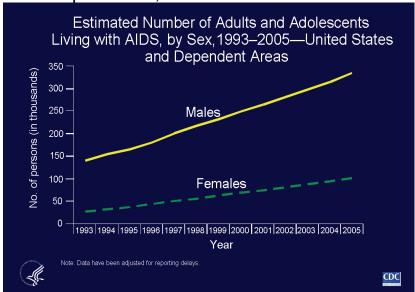


Figure 2.7 Estimated Number of Adults and Adolescents Living with AIDS, by Sex in the United States and Dependent Areas, 1993-2005

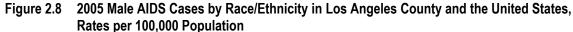


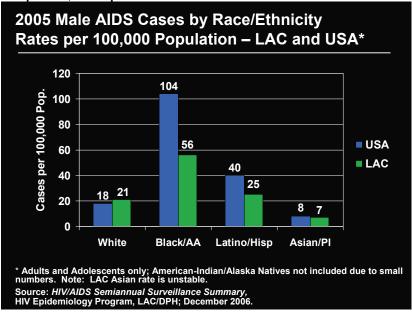
❖ RACE/ETHNICITY

The racial/ethnic distribution of persons with AIDS differs markedly between Los Angeles County and the U.S. While Whites were the predominant group affected in both the U.S. and Los Angeles County in the 1980's and early 1990's, Latinos or Hispanics have become the predominant group in the County since 1997 and African Americans or Blacks have become the predominant group in the U.S. since 1996.

In 2005, Latinos or Hispanics accounted for 46% of persons with AIDS diagnosed in Los Angeles County, but only 18% of U.S. cases. African Americans or Blacks accounted for 22% of County cases, but nearly half (48%) of all U.S. cases. Whites accounted for 27% of Los Angeles County cases and 28% of U.S. cases, while other race/ethnicities—such as Asian/Pacific Islanders and American Indian/Alaskan Natives—accounted for less than 5% of County cases and less than 2% of U.S. cases.

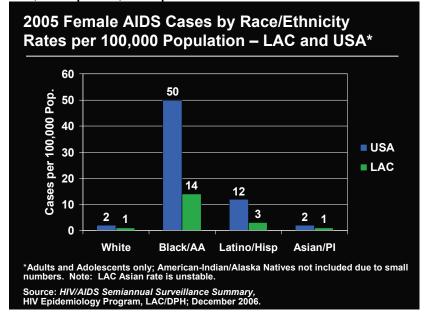
The percentage distribution of persons living with AIDS is heavily influenced by underlying differences in the racial/ethnic population distributions of the U.S. compared to Los Angeles County, as seen in the previous section. For this reason, AIDS *rates* by race/ethnicity are a better indicator for measuring the relative impact of AIDS among these groups. For both the U.S. and Los Angeles County, the highest 2005 annual incident AIDS rates for men and women were seen among African Americans or Blacks, while the lowest rates were seen in Asians.





Rates of newly diagnosed AIDS cases were high for both U.S. and Los Angeles County African American or Black males (104 and 56 cases per 100,000 population respectively) and for Latino or Hispanic males (40 versus 25 per 100,000), and nearly identical for Asian males (8 versus 7 per 100,000). The rate of new cases for White males in the U.S. was a less than that for White males in Los Angeles County (18 versus 21 per 100,000) (see Figure 2.8).

Figure 2.9 2005 Female AIDS Cases by Race/Ethnicity in Los Angeles County and the United States, Rates per 100,000 Population



Among women, the U.S. and Los Angeles County rates for 2005 were similar for Whites and Asians and Pacific Islanders; but among Latina females, U.S. rates were four times as high as Los Angeles County rates and among African American or Black females U.S. rates were more than three times as high as Los Angeles County rates (see Figure 2.9).

In 1998, the California Office of AIDS report entitled *A Spatial Study of AIDS Surveillance Data by Demographic Subgroups in California*, compared gender and race/ethnic-specific (White, Latino, and African American) AIDS rates by county. Only among Latino or Hispanic males, did Los Angeles County have a statistically higher AIDS incidence rate (36 per 100,000) than did the State (28 per 100,000).

❖ MODE OF EXPOSURE

Mode of exposure describes how HIV is transmitted—that is, through sexual contact, sharing of HIV-contaminated injection equipment, from mother to child, or by receiving HIV-contaminated blood or blood products. The distribution of AIDS cases by modes of exposure differs greatly between Los Angeles County and other regions of the country. Los Angeles County has always had a higher proportion of cases attributed to male-to-male sexual behavior than the nation overall (see Figures 2.10 and 2.11).

From 1986 to 2005, the proportion of annual AIDS cases attributable to transmission by male-to-male sex decreased from 65% to 43% nationally, while Los Angeles County decreased from 85% to 63%. Conversely, cases attributable to heterosexual contact increased nationally from 3% in 1985 to 31% in 2005; while in Los Angeles County, the increase was from less than 1% in 1985 to 7% in 2005.

In recent years, there has been a larger proportion of AIDS cases reported with "no identified risk" (NIR). As a result, AIDS incidence among some exposure categories may be underestimated unless an adjustment is done. The HIV Epidemiology Program has adopted the

methods developed by CDC to re-distribute these NIR cases into other valid categories based on cases that were investigated and reclassified in the past. Figure 2.10 depicts an *unadjusted* mode of transmission. This is evident in the sharp upward trend from 2003 to 2005.

Figure 2.10 Unadjusted Percent of Adult/Adolescent AIDS Cases in Los Angeles County by Exposure Mode and Year of Diagnosis, 1993-2005

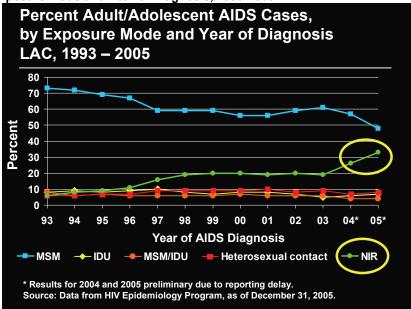


Figure 2.11 Proportion of AIDS Cases Among Adults and Adolescents in the United States by Transmission Category and Year of Diagnosis, 1985-2005

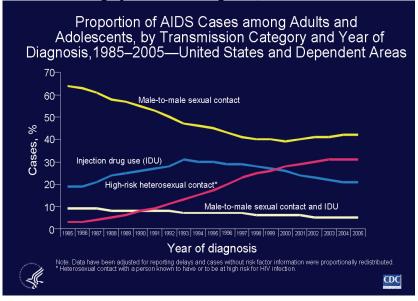


Figure 2.12 presents the distribution of newly diagnosed AIDS cases in 2005 by mode of exposure for both Los Angeles County and U.S. adults and adolescents. Men who have sex with men (MSM-- in blue) and MSM/IDU (MSM who also inject drugs, in orange), together accounted for 75% of the County's incident cases, but only 48% of national cases. Conversely, significantly higher proportions of U.S. cases reported HIV exposure through (non-MSM) injection drug use (20% versus 10%) or heterosexual contact (31% versus 13%) compared with Los Angeles County cases.

Adjusted Mode of Exposure* for AIDS Cases Diagnosed in 2005, Los Angeles and United States US LAC 10%/6% 5% 31% 13% 20% 2% 1% 69% 43% ■ MSM ■ IDU ■ MSM/IDU ■ Heterosexual contact ■ Other * Adjusted for reporting delay. LAC cases with no identified risk were redistributed into risk categories. National data from CDC. Source: HIV/AIDS Semiannual Surveillance Summary, HIV Epidemiology Program, LAC/DPH; December 2006

Figure 2.12 Adjusted Mode of Exposure for AIDS Cases Diagnosed in 2005, Los Angeles County and the United States

AIDS in Adolescents and Adults in Los Angeles County

Comparing historical data to current data helps to illustrate how the AIDS epidemic is evolving in Los Angeles County. Data presented are on adolescent and adult AIDS cases. The Centers for Disease Control and Prevention define this population as persons diagnosed with AIDS aged 13 years and older.

❖ GENDER

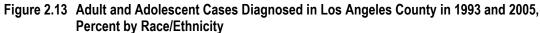
The number of male adolescent and adult AIDS cases diagnosed annually in Los Angeles County has decreased substantially from about 3,600 cases in 1993 to only 1,017 cases in 2005. Female AIDS cases have also decreased from a high in 1995 of 358 cases diagnosed to 158 cases for 2005. In 1993, males comprised 92% and females 8% of all adults and adolescent AIDS cases in Los Angeles County. The proportion of female cases rose to 13% in 2005.

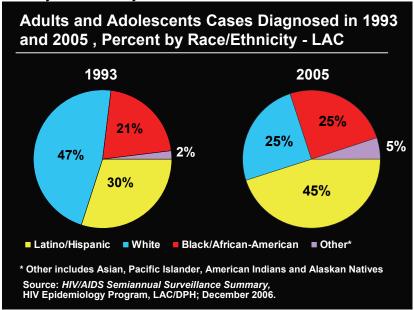
Starting in 2002, the State of California added transgender male and transgender female to the gender classifications for HIV and AIDS reporting. Due to underreporting and small numbers, these data are not specifically presented in the current epidemiologic profile. Until transgender classifications are accurately reported and numbers are large enough to report without compromising confidentiality or statistical integrity, data for transgender females are included with males and data for transgender males are included with females.

❖ RACE/ETHNICITY

The annual number of diagnosed adult and adolescent AIDS cases decreased for all races/ ethnicities in the last 10 years, most dramatically among Whites, whose annual total dropped from 1,845 cases in 1993 to only 298 cases in 2005. Latino or Hispanic cases also dropped sharply, from 1,179 in 1993 to 537 in 2005, while African American or Black cases dropped from 847 to 314 cases in the same time period.

In 1993, Whites comprised 47% of adults and adolescents diagnosed with AIDS in Los Angeles County, Latinos or Hispanics 30%, African Americans or Blacks 21%, and Other 2% (see Figure 2.13). By 2005, however, Latinos or Hispanics comprised the largest number of diagnosed cases with 45%, followed by Whites at 25%, African Americans or Blacks at 25%, and Other at 5%. Not shown in the figure due to small numbers, American Indians and Alaskan Natives comprised 0.5% of all County adults and adolescents living with AIDS in both 1993 and 2005.





While Whites once had, and Latinos or Hispanics now have, the highest number and proportion of cases, African Americans or Blacks have had the highest rate of infection among all races/ethnicities in the County. African American or Black adult and adolescent male annual AIDS rates, while steadily decreasing in the last 10 years, continue to be more than twice that of Latino males and three times that of White males (see Figure 2.14). Similarly, among adult and adolescent females, African Americans or Blacks have the highest rate of any racial/ethnic group, four times higher than Latina rates and 16 times higher than Whites in 2005 (see Figure 2.15).

Figure 2.14 Male Adult/Adolescent Annual AIDS Rates by Race/Ethnicity and Year of Diagnosis in Los Angeles County, 1993-2005

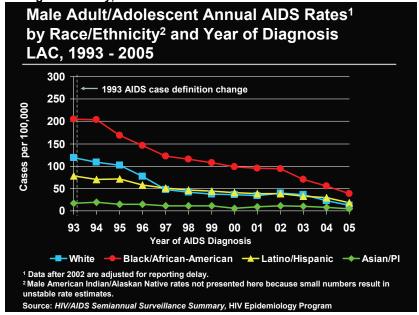
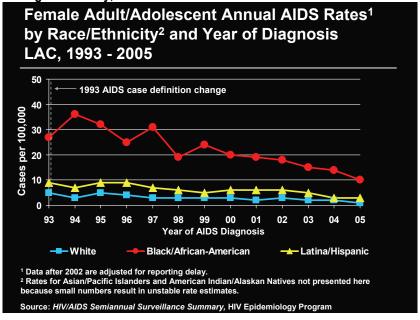


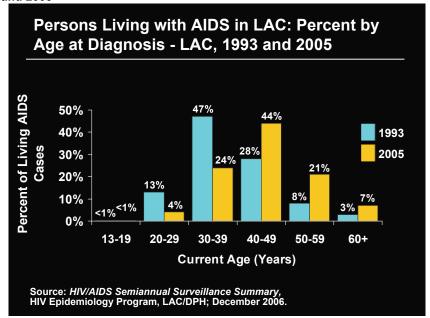
Figure 2.15 Female Adult/Adolescent Annual AIDS Rates by Race/Ethnicity and Year of Diagnosis in Los Angeles County, 1993-2005



❖ AGE

Compared with 1993, there were proportionately fewer AIDS cases diagnosed in Los Angeles County in 2005 among younger age groups than among older age groups (see Figure 2.16). Correspondingly, the median age at diagnosis rose from 33 years in 1993 to 39 years in 2005.

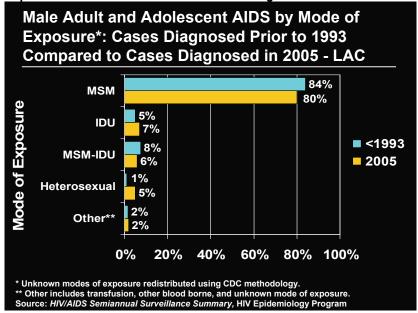
Figure 2.16 Persons Living with AIDS in Los Angeles County: Percent by Age at Diagnosis, 1993 and 2005



❖ MODE OF EXPOSURE

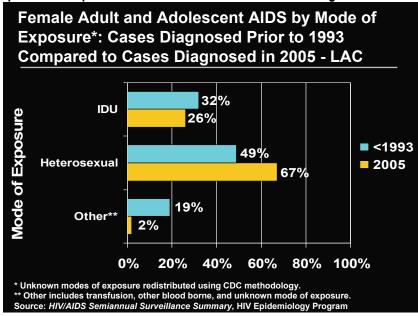
While declining slightly, men who have sex with men, including MSM who inject drugs, continue to account for the vast majority of male adult and adolescent AIDS cases in Los Angeles County. Before 1993, MSM accounted for 84% of cases; this has declined to 80% of cases diagnosed in 2005 (see Figure 2.17). The proportion of male cases exposed through injection drug use (IDU) among heterosexuals accounted for 5% of cases diagnosed prior to 1993 and 7% of cases diagnosed in 2005. Prior to 1993, heterosexual contact accounted for 1% of all male AIDS cases in the County. Among adult and adolescent males diagnosed with AIDS in 2005, 5% of cases reported heterosexual transmission as the mode of exposure.

Figure 2.17 Male Adult and Adolescent AIDS in Los Angeles County by Adjusted Mode of Exposure: Comparison Cases Prior to 1993 with Cases Diagnosed in 2005



The proportion of female adults and adolescents in Los Angeles County who reported heterosexual contact as their mode of exposure to HIV increased from 49% among cases prior to 1993 to 67% among cases diagnosed in 2005 (see Figure 2.18). In contrast, injection drug use among female cases has decreased from 32% prior to 1993 to 26% in 2005. Similarly, other modes of transmission among females, such as blood transfusion, hemophilia, and unknown exposure, have decreased from 19% in pre-1993 to 2% in 2005.

Figure 2.18 Female Adult and Adolescent AIDS in Los Angeles County by Adjusted Mode of Exposure: Comparison Cases Prior to 1993 with Cases Diagnosed in 2005



❖ HIV AND AIDS IN CHILDREN IN LOS ANGELES COUNTY

As of June 2007, a cumulative total of 250 children 12 years of age or younger at the time of diagnosis had been reported with AIDS in Los Angeles County [23]. The number of children diagnosed with AIDS in the County declined from a peak of 28 in 1994 to two new pediatric AIDS cases in 2005. The decrease in the number of children with AIDS in recent years is due to the effectiveness of providing antiretroviral treatment to HIV positive pregnant women.

Another factor contributing to the decline in new pediatric AIDS cases is the increasing use of highly-active antiretroviral therapy (HAART) since 1995 in HIV-infected children who have not progressed to AIDS. Data from the Pediatric Spectrum of Disease study (see below) suggest that at their last medical contact, 79% of HIV-infected children were receiving HAART.

The majority of children reported with AIDS have been exposed to HIV via perinatal (mother-to-child) transmission. Of the 250 cumulative children diagnosed with AIDS under age 13, 70% acquired HIV from their mothers; 25% were infected through a blood transfusion; and 3% had hemophilia or a coagulation disorder. In 2% of cases among children, no exposure category could be determined.

The racial/ethnic distribution for children with AIDS is similar to that of adult female cases. Overall, 18% of the 250 of children diagnosed with AIDS in Los Angeles County were White, 34% African American or Black, 45% Latino or Hispanic and 3% were Asian, Pacific Islander, Native American or Alaska Native.

❖ PEDIATRIC SPECTRUM OF DISEASE STUDY

The Los Angeles County Pediatric Spectrum of Disease (PSD) study collected data on all children in the County who have been exposed to or infected with HIV, as well as those who have been diagnosed with AIDS from 1990 to 2004. Follow-up reviews were done every six months to document new symptoms, treatment regimens, immunologic status, and death. PSD data suggest that the widespread use of antiretroviral therapy in HIV-infected mothers and their newborns has been a major factor in the decline in perinatal HIV infection among the County's children.

PSD data show that in addition to the 55 children with an AIDS diagnosis, 107 children less than 13 years of age are currently living in Los Angeles County with HIV infection. Of the 162 cumulative children diagnosed with HIV and AIDS under age 13, 93% acquired HIV from their mothers, 4% were infected through a contaminated blood transfusion, and 2% had an unknown exposure.

❖ HIV TESTING IN PREGNANT WOMEN

PSD data suggest that HIV-infected women who do not receive prenatal care are more likely to transmit HIV to their infants (28% vs. 7%) [25]. To maximize HIV prevention efforts, women must be identified as having HIV infection as early as possible during pregnancy and offered antiretroviral therapy. In 1998, PSD surveyed a sample of private obstetrical practices in Los Angeles County and found that while 96% of the practices were offering HIV testing to all pregnant women, only about half reported that 95-100% of their patients accepted the test. Implementation of mandatory prenatal HIV testing with an "opt out" clause has been shown to increase greatly HIV testing of pregnant women [25].

In 2003, California enacted an "opt out" prenatal testing law (California Health and Safety Code Sections 125085, 125090, 125105, and 125107) which mandates that all prenatal care providers make HIV testing a routine part of the blood panel for pregnant women. The new testing law is intended to increase the number of pregnant women tested for HIV during their prenatal care. All pregnant women must sign a consent form and have a right to refuse the test. The test must also be documented in the medical chart. Women presenting to labor and delivery with no documentation of a prenatal HIV test must be HIV tested, again with her consent and with the right to refuse the test. The Centers for Disease Control and Prevention (CDC) recommended that a rapid HIV test be done in labor and delivery so that treatment can begin for the woman and her infant to prevent HIV transmission.

In 2006, the CDC revised its recommendations for HIV testing. The new recommendations, which include those for pregnant women, support the universal screening of pregnant women for HIV [26]. For pregnant women, the recommendations state:

- HIV screening should be included in the routine panel of prenatal screening tests for all pregnant women.
- HIV screening is recommended after the patient is notified that testing will be performed unless the patient declines (opt-out screening).
- Separate written consent for HIV testing should not be required; general consent for medical care should be considered sufficient to encompass consent for HIV testing.
- Repeat screening in the third trimester is recommended in certain jurisdictions with elevated rates of HIV infection among pregnant women.

❖ PERSONS LIVING WITH AIDS (PLWA)

As of June 30, 2007, there were 21,973 persons living with AIDS (PLWA) in Los Angeles County. This represents 36% of the 60,957 Californians living with AIDS and 5.0% of the 437,982 Americans living with AIDS. [Please note: the total number of PLWA will differ in the following figures according to the date the database was accessed to do each analysis. These data are also provisional.]

❖ GENDER

As discussed above, the number of persons living with AIDS in Los Angeles County has increased steadily since the beginning of the epidemic. This increase can be seen for males and females, resulting in 19,474 or 89% males and 2,384 or 11% females living with AIDS in the County as of June 30, 2007.

❖ AGE

Figure 2.19 shows the current age of PLWA in Los Angeles County as of December 31, 2005. Nearly three-quarters of PLWA were 40 years of age or older; the majority were age 40-49 years. Less than 1% of PLWA were under the age of 20 years and 8% were age 60 years and older.

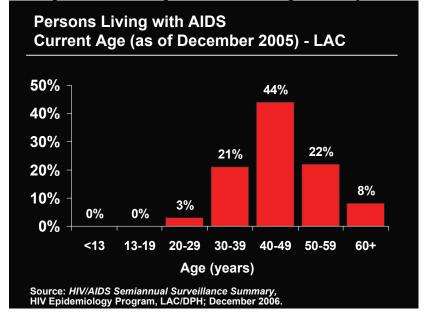
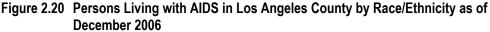


Figure 2.19 Current Age of Persons Living with AIDS in Los Angeles County as of December 2005

❖ RACE/ETHNICITY

As seen in Figure 2.20, 40% of PLWA in Los Angeles County are Latino or Hispanic, 36% White, 21% African American or Black, and 3% Asian/Pacific Islander. About 0.5% of cases are American Indian/Alaskan Native. When viewed by gender (see Figure 2.21), these proportions vary slightly. Among female PLWA, 36% are African American, 18% White, 43% Latina or Hispanic 2% Asian/Pacific Islander, and 1% American Indian/Native American.



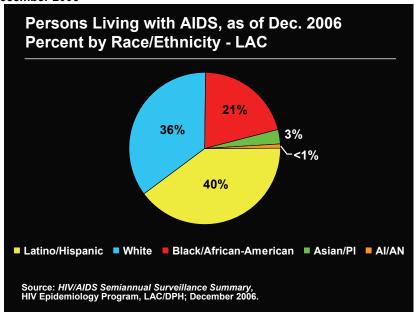
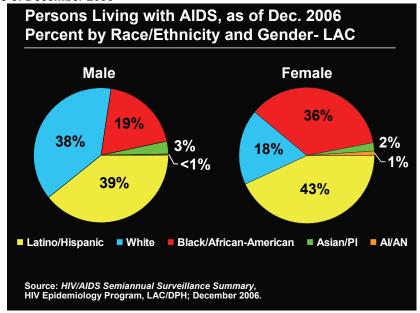


Figure 2.21 Persons Living with AIDS in Los Angeles County, Percent by Race/Ethnicity and Gender as of December 2006



Among male PLWA under the age of 40, Latinos or Hispanics make up the largest proportion of cases, while Whites predominate in the older age groups. Among female PLWA under the age of 30, Latinos or Hispanics again make up the largest proportion of cases, but African Americans or Blacks account for about 40% of PLWA age 30–59 years.

❖ MODE OF EXPOSURE

About 72% of PLWA are MSM, and 7% of PLWA reported a risk for HIV both through sharing needles or injection paraphernalia and sex with men. Approximately 8% of PLWA reported injection drug use (i.e., risk of exposure through sharing needles and/or injection paraphernalia) as their mode of exposure; 11% reported heterosexual contact (see Figure 2.22).

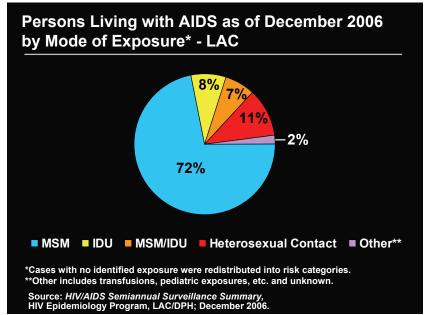


Figure 2.22 Persons Living with AIDS in Los Angeles County by Adjusted Mode of Exposure as of December 2006

❖ PERSONS LIVING WITH HIV INFECTION

As noted at the beginning of this chapter, the State of California mandated name-based HIV reporting in April 2006. This reporting system replaced the previous non-name code reporting system that had been in place since July 2002. Information on HIV reporting by name is not yet complete, has not been validated, and so is not presented in this current HIV epidemiologic profile. However, the importance of understanding the scope of the epidemic cannot be overstated. It is essential for program development and planning. To gain this understanding, information on non-AIDS HIV infected persons collected through non-name code reporting is presented here. The Los Angeles County HIV Epidemiology Program will continue to update information as names-based HIV reporting is validated.

As depicted in Figure 2.23, the HIV Epidemiology Program estimates that there are between 42,400 and 46,600 persons living with HIV or AIDS who are currently aware of their status in Los Angeles County. This number is composed of 21,187 persons who have been reported with AIDS by July 1, 2007 and an estimated 21,187 to 25,424 persons who have been diagnosed with HIV (non-AIDS) based on a range of 1.0 – 1.2 living HIV (non-AIDS) cases to every 1.0 AIDS case. The CDC's national average estimate of the percentage of all living HIV-infected persons (including both non-AIDS HIV and AIDS cases) who are unaware of their status is 25% [Glynn, 2005]. Using this national average, the HIV Epidemiology Program estimates that between 14,100 and 15,500 additional persons are HIV infected and unaware of their status. The CDC also estimates that between 54% and 70% of new infections are transmitted by people unaware of their HIV infection. With an estimated 2,000 yearly incident infections in Los Angeles County, persons with undiagnosed HIV may account for anywhere between 1,080 to 1,400 incident infections. In total, there are an estimated 56,500 to 62,200 persons living with HIV or AIDS in the County, whether or not they are aware of their HIV status.

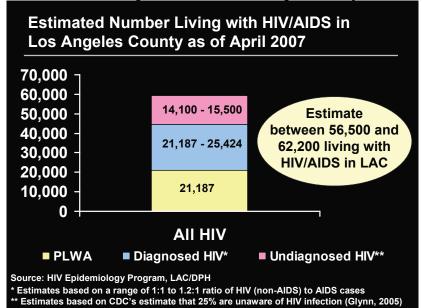


Figure 2.23 Estimated Persons Living with HIV/AIDS in Los Angeles County

❖ HIV/AIDS REPORTING SYSTEM (HARS)-BASED ESTIMATES OF HIV AND AIDS

Estimates of persons living with HIV and AIDS (PLWHA) are presented in Table 2.6. HIV (non-AIDS) estimates were based on AIDS cases reported to the HIV/AIDS Reporting System (HARS). Estimates were distributed by sex, age groups, race/ethnicity, and CDC-defined modes of exposure-including men having sex with men (MSM), injection drug use (IDU), MSM/IDU, heterosexual risk (male and female) and blood-borne risk (such as, hemophilia and blood transfusions).

While AIDS began as a disease mostly seen among Whites in the 1980s, it transitioned in the 1990s to a disease predominantly affecting persons of color. Taken together, Latinos or Hispanics and African Americans or Blacks now comprise 60.2% of persons living with AIDS (PLWA), about 67.8% of all AIDS cases diagnosed in 2004-2005, and an estimated 58% of persons living with (non-AIDS) HIV (PLWH) in Los Angeles County. Whites comprise 36.1% of County residents living with AIDS, 27.4% of AIDS cases diagnosed in 2004-2005 and an estimated 36.2% of PLWH. Of persons estimated to be living with HIV and AIDS (PLWHA), most are Latino or Hispanic (37.1%), followed by Whites (36.1%), African Americans or Blacks (21.9%), Asian/Pacific Islanders (2.7%), and American Indian/Alaskan Natives (0.4%).

Unlike in other parts of the U.S., the HIV/AIDS epidemic in Los Angeles County remains largely a male phenomenon. Women in the County comprise 10.9% of PLWA, 13% of newly diagnosed AIDS cases in 2004-2005, and an estimated 14.4% of PLWH. Among adults and adolescents in Los Angeles County, men who have sex with men continues to be the predominant mode of exposure reported among PLWA (72%), newly diagnosed AIDS cases (69.3%), and PLWH (78.9%). Heterosexual sex was the exposure risk for 10.8% of PLWA, 13.1% of AIDS cases diagnosed in 2004-2005, and 8% of PLWH. Injection drug use, including injection drug use among men who have sex with men, combined are the reported risk for 14.9% of PLWA, 15.3% of AIDS cases diagnosed in 2004-2005, and 11% of PLWH.

Newly Diagnosed Cases (Incidence) of AIDS for 2004-2005 and Estimated HIV/AIDS Table 2.6 Prevalence (Number of PLWHA Who are Aware of Their Disease) in Los Angeles County†

Category	All Incid 2004-	ence 2005*	Preva	DS lence*	(Non- Preva	lence [*]	(non-Al Preval	nated DS) HIV ence**	Prevale HIV and	nated ence of I AIDS**
	No.	Percent	No.	Percent	No.	Percent	No.	Percent	No.	Percent
Race/Ethnicity										
White	704	27.4%	7,646	36.1%	5,343	36.2%	9,193	36.2%	16,839	36.1%
African-American	587	22.8%	4,373	20.6%	3,388	22.9%	5,829	22.9%	10,202	21.9%
Latino	1,156	45.0%	8,386	39.6%	5,178	35.0%	8,909	35.0%	17,295	37.1%
Asian/PI	101	3.9%	607	2.9%	365	2.5%	628	2.5%	1,235	2.7%
American Indian/AN	9	0.4%	97	0.5%	58	0.4%	100	0.4%	197	0.4%
Multiple	8	0.3%	39	0.2%	26	0.2%	45	0.2%	84	0.2%
Not Specified	5	0.2%	39	0.2%	419	2.8%	721	2.8%	760	1.6%
Gender										
Male	2,237	87.0%	18,884	89.1%	12,649	85.6%	21,763	85.6%	40,647	87.2%
Female	333	13.0%	2,303	10.9%	2,128	14.4%	3,661	14.4%	5,964	12.8%
Age (years)										
<13	5	0.2%	42	0.2%	122	0.8%	210	0.8%	252	0.5%
13-19	19	0.7%	50	0.2%	136	0.9%	234	0.9%	284	0.6%
20-44	1,840	71.6%	10,981	51.8%	9,796	66.3%	16,854	66.3%	27,835	59.7%
45+	706	27.5%	10,114	47.7%	4,723	32.0%	8,126	32.0%	18,240	39.1%
Exposure Category, Adult/ Adolescent										
MSM	1,781	69.3%	15,254	72.0%	11653	78.9%	20,050	78.86%	35,304	75.74%
IDU	248	9.7%	1,680	7.9%	762	5.2%	1,311	5.16%	2,991	6.42%
MSM-IDU	143	5.6%	1,486	7.0%	857	5.8%	1,474	5.80%	2,960	6.35%
Heterosexual	336	13.1%	2,280	10.8%	1178	8.0%	2,027	7.97%	4,307	9.24%
Other blood-borne	30	1.2%	287	1.4%	91	0.61%	156	0.61%	443	0.95%
Mother at risk for HIV	6	0.2%	83	0.4%	236	1.60%	406	1.60%	489	1.05%
Other/ undetermined***	26	1.0%	117	0.6%	<5	-	<5	-	<5-	-
Sub-total, Adult	2,570	100%	21,187	100%	14,777	100%	25,424	100%	46,611	100%
Exposure Category, Pediatric										
Maternal risk for HIV	<5	-	70	28.00%	184	89.76%	269	89.76%	339	61.69%
Other blood-borne	<5	-	176	70.40%	21	10.24%	31	10.24%	207	37.59%
No identified risk	<5	-	<5	-	7	0.00%	<5	-	<5	-
Sub-total, Pediatric	<5	100%	250	100%	212	100%	300	100%	550	100%
TOTAL	2,572	100%	21,437	100%	14,989	100%	25,724	100%	47,161	100%

[†]Percentages may not add to 100% due to rounding.

^{*}Data from Los Angeles County HIV Epidemiology Program's HIV/AIDS Reporting System for cases diagnosed as of December 2005 and reported by April 30, 2007, including both coded and named HIV cases. Note that HIV reporting in California started in July 2002 for code-based reporting and in April 2006 for name-based reporting, thus the reported HIV data are still preliminary and unreliable.

^{**}These estimates are based on a 1.2:1 ratio of living HIV(non-AIDS) to AIDS cases based on April 2007 data and do not include persons who are either undiagnosed or unaware of their infection.
****HIV and AIDS cases with undetermined risk were redistributed according to CDC protocol.

***** HIV INCIDENCE STUDIES

A goal of HIV surveillance is to detect recent infections, in order to identify who is acquiring HIV and how they are acquiring it. It is important to identify trends in recent infections, so that HIV prevention and testing efforts can be targeted more effectively. The ability to detect these recent cases has thus far been elusive. With the recent development of a HIV antibody laboratory test, known as the "Serologic Testing Algorithm for Recent HIV Sero-conversion" (STARHS), we can now determine whether or not persons with newly diagnosed HIV were likely to have been infected in the 6 to 12 months prior to their HIV test [27, 28].

STD Clinic Study and Alternative Testing Site database

Stored blood from a study conducted at Los Angeles County's Sexually Transmitted Disease (STD) Clinics from 1993 to 1999 was tested using STARHS technology to estimate the level of recent infection in that study group.

HIV incidence was also estimated at State-funded "alternative testing sites" (ATS) among "repeat testers"—that is, those seeking testing who have a history of having a previous negative HIV test—using the ATS client database from 1995 to 2002.

Results from these two studies, distributed by gender and exposure mode, are presented in Table 2.7. Despite the differing methodologies, HIV incidence rates from the two studies appear comparable, with transgender women, MSM and MSM-IDU having the highest rates (3-6% per year), while men who have sex with women (MSW) and women had much lower rates (<0.5% per year). The HIV incidence rate for MSM at STD clinics (5.9% per year) was twice that for MSM at alternative testing sites (2.9% per year). This difference is perhaps not surprising, when one considers that persons attending STD clinics have most likely engaged in unprotected sexual intercourse, whereas the same may not be true of those testing at alternative testing sites.

Table 2.7 HIV incidence rate estimates by gender and exposure mode for Los Angeles County in STD Clinic Study (1993-1999) and Alternative Test Site data (1995-2002).

	,	STD Clinic S	Study, 1993-1	999	Alternative Test Site, 1995-2002			
Exposure Group	No.1 Recently Infected	Denomi- nator ²	Incidence Rate ³	95% Confidence Limits	No. ⁴ Newly Infected	Denomi- nator ⁵	Incidence Rate ³	95% Confidence Limits
MSM	48	2,100	5.9	(3.7, 9.2)	1,286	44,929	2.9	(2.7, 3.0)
MSM-IDU	3	139	4.7 ⁶	(0.5, 19) ⁶	64	1,707	3.8	(2.8, 4.7)
MSW-IDU	3	443	1.9 ⁶	(0.3, 6.7) ⁶	35	8,847	0.4	(0.3, 0.4)
MSW	40	29,750	0.4	(0.2, 0.6)	152	46,073	0.3	(0.3, 0.4)
Female IDU	0	264	6	6	18	6,114	0.3	(0.2, 0.5)
Females	20	19,394	0.3	(0.1, 0.5)	120	57,626	0.2	(0.2, 0.25)
Transgender Women					36	645	5.6	(3.8, 7.6)

¹The number of recently infected persons in the STD Clinic Study was calculated based on those HIV-positive specimens that were available for STARHS testing (see Technical Notes).

²The denominator for the STD Clinic Study is the number of clients who tested negative for HIV plus those recently infected; it excludes non-recent HIV-infected persons (see Technical Notes).

³ Incidence rate for both studies can be thought of as equivalent to the average number of individuals infected per 100 persons per year, over the study period (see Technical Notes).

⁴The number of new infections at Alternative Test Sites is the number of repeat testers who seroconverted since their previous self-reported negative HIV test; STARHS was not used.

⁵The denominator for Alternative Test Site data is the sum of all the time intervals between the two most recent HIV tests among clients who reported repeat HIV testing (see Technical Notes).

⁶ Incidence rate and confidence limits based on zero observations are not definable and rates based on few observations are considered unreliable; therefore, making firm conclusions based on these rates is not advised (see Technical Notes).

Geographic Distribution of AIDS in Los Angeles County

In 1993, Los Angeles County aggregated its 26 health districts into eight Service Planning Areas or SPAs. SPAs were created by the Los Angeles County Children's Planning Council and approved by the County Board of Supervisors to make public health service planning more responsive to local needs. The eight Service Planning Areas are: Antelope Valley, SPA 1; San Fernando Valley, SPA 2; San Gabriel Valley, SPA 3; Metro, SPA 4; West, SPA 5; South, SPA 6; East, SPA 7; and South Bay, SPA 8 (see Figure 2.1 earlier in this chapter). Describing the HIV/AIDS epidemic by SPA provides a geographic lens to identify highly impacted areas when comparing SPAs across the County. However, equally important is the need to focus attention on the nature and differences of eight local epidemics within the County. Each SPA has its own story of the epidemic and how its local communities are impacted. Thus, although the number of PLWHA in SPA 1: Antelope Valley may be the lowest in the County, there is a very distinct local epidemic within this geographic boundary, which when combined with other available data. inform the extent of need for services as well as the type of services needed. Care must be taken when comparing information for multiple SPAs using percentages. High percentages do not always mean high numbers. Examining the actual numbers associated with the percentages is also important and may assist decision-making.

Geographic Profiles (see Chapter 7) of this plan highlights key socio-demographic characteristics and health indicators of the County as a whole as well as each SPA individually. These profiles illustrate the tremendous variation that exists across the County and areas of disproportionate impact. For example, although HIV has spread across Los Angeles County's 4,084 square miles, SPA 4: Metro remains the epicenter of the epidemic. Tracking the epidemic across this expanse is critical. As HIV prevention planners and program designers better target services to the most highly impacted geographic areas, the County will more likely begin to stem the growth of the epidemic in these communities. Although SPA data are helpful in this effort, zip code data (when available) reveal pronounced needs in very specific areas. It is also critical that HIV prevention planners and program developers *know* their target population. Although an individual at risk for acquiring or transmitting HIV may reside in one SPA, he or she may recreate in other parts of the County, as well as seek services (i.e., HIV testing, prevention, and care) in still other parts of the County. This mobility creates additional complexity in designing programs to meet the needs of very diverse communities.

Table 2.8 shows (1) the cumulative number of PLWA reported through December 2006, (2) the number and rate per 100,000 population of new AIDS cases in 2005, and (3) total PLWA in Los Angeles County by SPA reported through December 2006. As noted, SPA 4 (Metro) remains the epicenter of Los Angeles County's epidemic and has the highest number (7,893) and rate (626 per 100,000) of PLWA among all SPAs. SPA 8 (South Bay) ranks second with 4,006 PLWA and a rate of 249 per 100,000. SPA 1 (Antelope Valley) has the lowest number (233) and rate (67 per 100,000) of PLWA in the County. Among new cases diagnosed in 2006, SPA 4 (Metro) has the highest number (299) and SPA 8 (South Bay) ranks second with 288 new cases. SPA 4 has an AIDS case rate of 24 per 100,000 for newly diagnosed cases, while SPA 8 has an AIDS case rate of 18 per 100,000. SPA 6 (South) has the third highest number (141) of new AIDS diagnoses.

Table 2.8 Cumulative Number of AIDS Cases, New AIDS Cases and Rate per 100,000 in 2006, and Number of Persons Living with AIDS and Rate per 100,000 by Service Planning Area, reported through December 2006.

	Cumulative	Cases Diagr	nosed in 2006	PLWA as of December 2006		
Service Planning Area	Number AIDS Cases	Number	Rate per 100,000	Number	Rate per 100,000	
SPA 1: Antelope Valley	496	11	3	233	67	
SPA 2: San Fernando	7,282	120	6	2,786	130	
SPA 3: San Gabriel	3,791	71	4	1,471	79	
SPA 4: Metro	19,866	299	24	7,893	626	
SPA 5: West	2,958	45	7	1,139	179	
SPA 6: South	5,146	141	14	2,167	208	
SPA 7: East	3,011	59	4	1,379	100	
SPA 8: South Bay	8,407	288	18	4,006	249	
TOTAL	52,463	1,049	10	21,858	213	

Source: HIV Epidemiology Program, HIV/AIDS Semi-Annual Surveillance Summary, July 2007.

Table 2.9 shows the racial/ethnic profile of AIDS cases reported by SPA as of December 2006. Among all SPAs, SPA 7 (East) has the highest proportion PLWA of a common race/ethnicity (75% are Latino or Hispanic). This is followed by SPA 5 (West) where 59% of PLWA are White. Although the highest proportion of African American or Black PLWA are in SPA 6 (South), the largest number are in SPA 4, followed closely by SPA 8. American Indian or Alaskan Native (AI/AN) are evenly spread across SPAs 3 (San Gabriel), 4 (Metro), and 7 (East) (1%).

Table 2.9 Persons Living with AIDS by Service Planning Area, Percent by Race/Ethnicity as of December 2006

Service Planning Area	Number	White	African American	Latino	API	AI/AN			
SPA 1: Antelope Valley	233	41%	29%	29%	-	-			
SPA 2: San Fernando	2,786	46%	11%	38%	3%	1%			
SPA 3: San Gabriel	1,471	23%	16%	52%	7%	1%			
SPA 4: Metro	7,893	41%	17%	38%	3%	1%			
SPA 5: West	1,139	59%	15%	22%	3%	<1%			
SPA 6: South	2,167	4%	53%	43%	<1%	<1%			
SPA 7: East	1,379	14%	7%	75%	3%	1%			
SPA 8: South Bay	4,006	41%	25%	30%	3%	<1%			

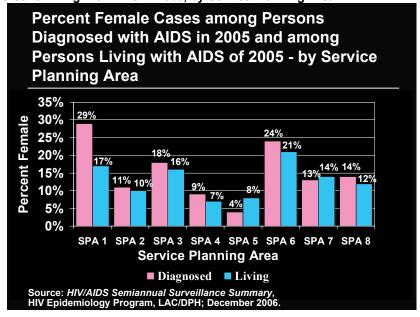
Source: HIV Epidemiology Program, HIV/AIDS Semi-Annual Surveillance Summary, July 2007.

While men are the most heavily impacted by the HIV/AIDS epidemic in Los Angeles County in terms of the number and percentage of men infected, the proportion of women is growing and varies considerably by SPA (see Figure 2.24). SPA-specific HIV/AIDS prevalence data regarding transgender individuals are not available at this time.

Approximately 10.9% of all PLWA in Los Angeles County are female (see Table 2.6); 13% of newly diagnosed AIDS cases are female. SPA specific data show that SPA 6 (South) has the largest proportion of female PLWA (21%) in Los Angeles County, followed by 17% in SPA 1 (Antelope Valley), 16% in SPA 3 (San Gabriel), and 14% in SPA 7 (East). The smallest

proportion of PLWA is 7% in SPA 4 (Metro). Among persons diagnosed with AIDS in 2005, the highest proportion of females is in SPA 1 (Antelope Valley) (29%), followed by SPA 6 (South) (24%), and SPA 3 (San Gabriel) (18%).

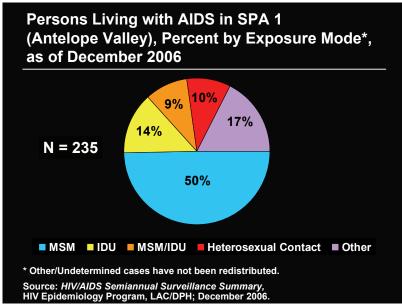
Figure 2.24 Percent Female Cases among Persons Diagnosed with AIDS in 2005 and among Persons Living with AIDS in 2006, by Service Planning Area



■ SPA 1: Antelope Valley

As of December 2006, there was a cumulative total of 487 persons reported with AIDS whose residence at the time of diagnosis was SPA 1 (Antelope Valley). Among the 487 total AIDS cases reported in SPA 1, 235 (48%) were still living with AIDS. Most PLWA in the Antelope Valley were men (83%), and between 30-50 years of age (62%). In SPA 1, 41% of PLWA were White, 29% African American or Black, and 29% Latino or Hispanic (Table 2.9). Nearly two of every three PLWA was either MSM (50%) or MSM/IDU (9%) and, compared with other SPAs, SPA 1 had a relatively high proportion of cases with reported heterosexual IDU exposure (14%) (Figure 2.25).

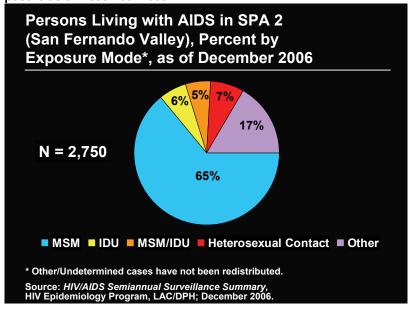
Figure 2.25 Persons Living with AIDS in SPA 1 (Antelope Valley) by Unadjusted Mode of Exposure as of December 2006



■ SPA 2: San Fernando Valley

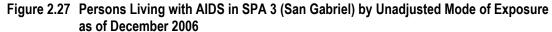
A cumulative total of 7,211 persons with AIDS were reported in SPA 2 (San Fernando Valley) as of December 2006. Among all cumulative AIDS cases, 2,750 (38%) were still living, giving SPA 2 the third highest number of PLWA among all SPAs, behind SPA 4 (Metro) and SPA 8 (South Bay). As shown in Table 2.9, most PLWA in SPA 2 were White or Latino or Hispanic (46% and 38%), and the most common mode of exposure to HIV reported was male-to-male sex (65%).

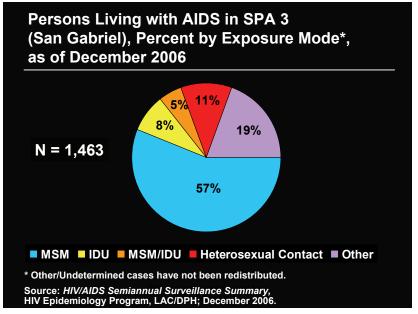
Figure 2.26 Persons Living with AIDS in SPA 2 (San Fernando Valley) by Unadjusted Mode of Exposure as of December 2006



■ SPA 3: San Gabriel

The cumulative total of persons reported with AIDS in SPA 3 (San Gabriel Valley) as of December 2006 was 3,752. Of this number, 1,463 (40%) were living. In SPA 3, Latinos or Hispanics accounted for over half (52%) of PLWA, followed by Whites (23%), African Americans or Blacks (16%), and Asian/Pacific Islanders (7%) (Table 2.9). In 2005, 18% of the persons diagnosed with AIDS in SPA 3 were female, 36% were age 40-49, and 15% were 50 years of age or older. Through December 2006, the majority of PLWA in SPA 3 reported MSM (57%) and MSM/IDU (5%) as their likely mode of transmission. By mode or exposure, IDU accounted for 8% and heterosexual contact accounted for 11% of cases (Figure 2.27).

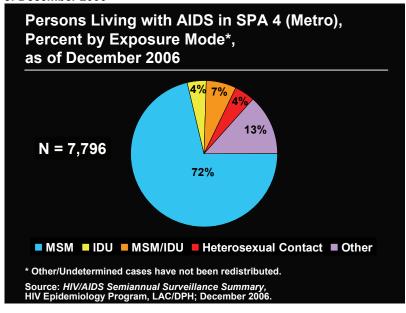




■ SPA 4: Metro

Since the beginning of the AIDS epidemic, SPA 4 (Metro) has been the SPA with the highest AIDS case rate in the County. It represents 38% of all cumulative AIDS cases (n=19,645). Among these, 7,796 (39.6%) were living as of December 2006. Of the 318 persons diagnosed with AIDS in SPA 4 in 2005 (Table 2.8), 91% were male, 46% were Latino or Hispanic, and 30% were White. African Americans or Blacks in SPA 4 represented 17% of PLWA (Table 2.9); their AIDS case rate was highest for PLWA in SPA 4 among all races/ethnicities (1,766 per 100,000 population). MSM and MSM/IDU (79% of all PLWA in SPA 4) were reported as the mode of transmission for the majority of PLWA in SPA 4 through December 2006 (Figure 2.28).

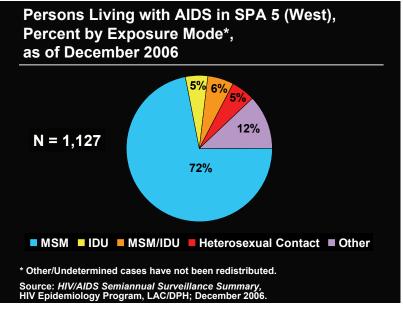
Figure 2.28 Persons Living with AIDS in SPA 4 (Metro) by Unadjusted Mode of Exposure as of December 2006



■ SPA 5: West

SPA 5 (West) reports 2,926 persons with AIDS since 1981. Among them, 1,127 (35.5%) were living as of December 2006. PLWA in SPA 5 were predominantly male (92%), age 30-59 (90%), and White (59%). MSM and MSM/IDU together accounted for 78% of the living AIDS cases, while 5% of PLWA were reported as heterosexual male or female IDU and 5% reported a risk for contracting HIV through heterosexual contact (Figure 2.29).

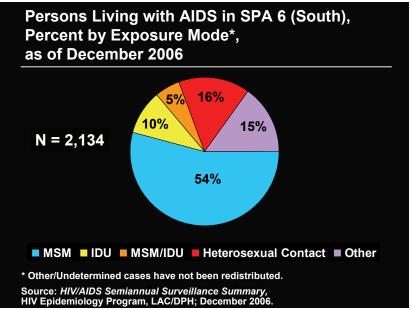
Figure 2.29 Persons Living with AIDS in SPA 5 (West) by Unadjusted Mode of Exposure as of December 2006



■ SPA 6: South

A cumulative total of 5,063 persons were reported with AIDS in SPA 6 (South) through December 2006. Among them, 2,134 (42%) were living as of December 2006. Among all SPAs, SPA 6 has the highest proportion of female (21%) PLWA. This compares with 10.9% female PLWA in the County overall. In 2005, 24% of SPA 6 residents diagnosed with AIDS were female. Among PLWA in the SPA 6, 53% were African American or Black and 43% Latino or Hispanic (Table 2.9). Approximately 7% of PLWA are under the age of 30. While male-to-male sexual contact and MSM/IDU accounted for 59% of HIV transmission in SPA 6, another 16% reported they were infected through heterosexual contact, and 10% reported injection drug use as their mode of exposure (Figure 2.30).

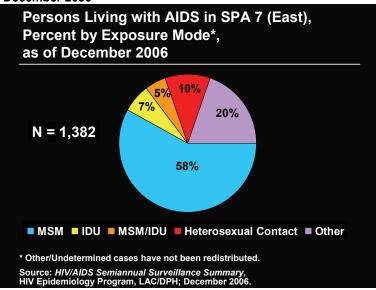




■ SPA 7: East

Through December 2006, there were 2,986 cumulative AIDS cases reported in SPA 7 (East), of whom, 1,382 (46%) were PLWA. PLWA in SPA 7 were predominantly male (86%) and 5% were less than 30 years old. PLWA in SPA 7 were predominately Latino or Hispanic (75%), with only 14% White and 7% African American or Black (Table 2.9). Approximately 63% of PLWA reported MSM or MSM/IDU as their exposure mode, 10% reported heterosexual exposure, and 7% IDU as their risk for exposure (Figure 2.31).

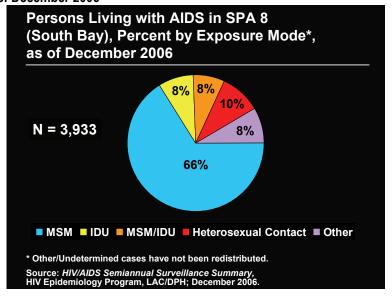
Figure 2.31 Persons Living with AIDS in SPA 7 (East) by Unadjusted Mode of Exposure as of December 2006



■ SPA 8: South Bay

SPA 8 (South Bay) has the second highest AIDS rate in Los Angeles County (Table 2.8). Through December 2006, the cumulative number of persons reported with AIDS in SPA 8 was 8,214. Among them, 3,933 (47.8%) were living. In 2005, males accounted for 86% of SPA 8 newly diagnosed AIDS cases. Among PLWA in SPA 8, 41% were White, 30% Latino or Hispanic, 25% African American or Black, and 3% Asian/Pacific Islander (Table 2.9). Of new AIDS diagnoses for 2005, 33% were White while 32% were Latino or Hispanic. Among PLWA in SPA 8, 74% reported MSM or MSM/IDU, 8% reported other IDU, and 10% reported high-risk heterosexual contact as their mode of exposure (Figure 2.32).

Figure 2.32 Persons Living with AIDS in SPA 8 (South Bay) by Unadjusted Mode of Exposure as of December 2006



American Indians and Alaskan Natives

Of the approximately 30,879 American Indians and Alaskan Natives (AI/AN) living in Los Angeles County in 2005, the largest concentration live in SPA 2 (20%), followed by SPA 3 (18%), SPA 8 (17%), SPA 7 (14%), and SPA 4 (12%) (Figure 2.33). In contrast, of the 96 AI/AN estimated to be living with AIDS in the County, the greatest number reside in SPA 4 (42%), followed by SPA 2 (16%), and SPA 8 (14%) (Figure 2.34).

Figure 2.33 American Indian/Alaskan Native Population Living in Los Angeles County by Service Planning Area, 2005

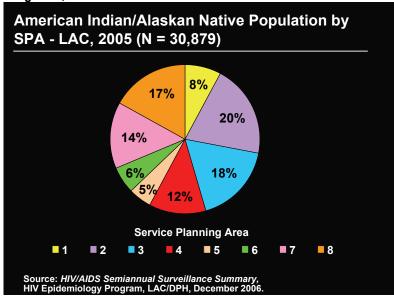
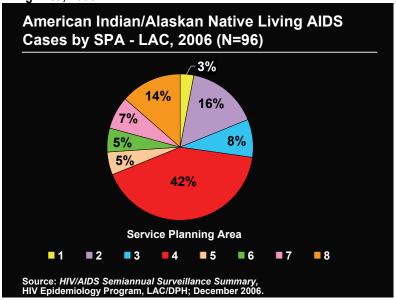


Figure 2.34 American Indians/Alaskan Natives Living with AIDS in Los Angeles County by Service Planning Area, 2006



Nationally, American Indians and Alaskan Natives (AI/AN) have the third highest AIDS diagnosis rate (8.0 per 100,000) behind African Americans or Blacks (59 per 100,000) and Latinos or Hispanics (19.8 per 100,000) [24]. In Los Angeles County, 3.1 out of every 1,000 AI/AN are living with AIDS, with the impact of the disease on this population second only to its impact on African Americans or Blacks (Figure 2.35). Eighty-five percent (85%) of AI/AN AIDS cases were among men. Nearly two out of three AI/AN AIDS cases are among men who have sex with men (MSM), including those who also inject drugs (MSM-IDU; Figure 2.36). Together, IDU and MSM-IDU accounted for 23% of AI/AN cases.

Figure 2.35 Persons Living with AIDS per 1,000 Population in Los Angeles County by Race/Ethnicity, 2006

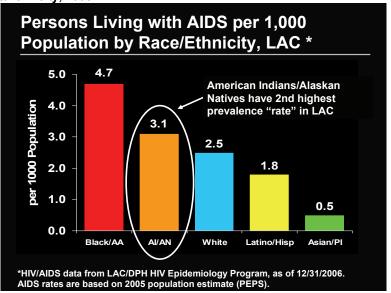
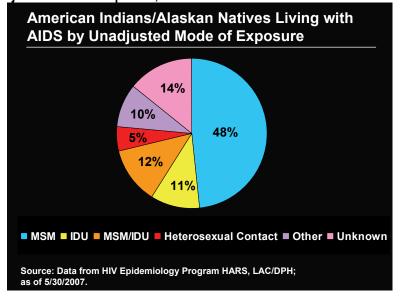


Figure 2.36 American Indians/Alaskan Natives Living with AIDS in Los Angeles County by Unadjusted Mode of Exposure, 2006



❖ AMERICAN INDIAN/ALASKAN NATIVE 2002 VALIDATION PROJECT

Because routine methods for ascertaining race/ethnicity information in the HIV/AIDS Reporting System (HARS) might lead to a pronounced underestimation of AI/AN living with AIDS due to racial misclassification, the HIV Epidemiology Program's core surveillance unit undertook a study in conjunction with the U.S. Indian Health Service (IHS) and CDC to validate race/ethnic data using the IHS database, the Los Angeles County Vital Records mortality database, and the Office of AIDS Programs and Policy's Ryan White CARE Act client database.

In 2002, HARS AI/AN cases were misclassified as follows: 67% as White, 22% as Latino or Hispanic, 5% as African American or Black, 3% as Asian, and 3% as unknown. AIDS cases reported at private facilities were significantly more likely to have AI/AN misclassification (68%) than were those reported at public facilities (33%). After the correction of misclassified cases in HARS, the average annual AIDS rate for AI/AN increased 29% in HARS, from 2.1 to 2.7 per 1,000. When adjusted for misclassification based on all data sources, AI/AN cases increased even more to 3.1 per 1,000, a 48% increase. As of December 2006, the rate of AI/AN living with AIDS was 3.1 per 1,000.

Priority Populations

The 2009-2013 comprehensive community planning process resulted in the definition and identification of six new priority populations, with critical target populations identified within each group. It is important to understand that although data and information can be organized around these specific population groups, it is their specific behavior (i.e., sexual risk behavior and sharing injection paraphernalia) that puts an individual at risk for acquiring or transmitting HIV. In addition, key co-factors contribute to one's risk for HIV (e.g., stigma and discrimination, poverty, homelessness, etc.). Lastly, identity, whether it is cultural identity (e.g., Latino or Hispanic, African American or Black), sexual orientation identity (e.g., gay, bisexual, samegender loving, Two Spirit, etc.), or other identity (e.g., religious, family, peer group, etc.) shapes one's perception of risk as well as their access to services. This new planning model, which is intentionally broad in order to respond to Los Angeles County's diverse communities, replaces the County's previous behavioral risk group model as the foundation for planning.

In describing persons at risk for acquiring HIV, the PPC prioritizes the populations outlined in Table 2.10 (see also Chapter 4: Priority Populations).

Table 2.10 Priority and Critical Target Populations at Risk for Acquiring/Transmitting HIV

Table 2.10 TH	Table 2.10 Priority and Critical Target Populations at Risk for Acquiring/Transmitting filv						
Priority Population	HIV Positive Individuals	Youth 12-24 years	Men	Women	Transgender Individuals	People who Share Needles/ Works	
Mode of Transmission	Sexual	Sexual	Sexual	Sexual	Sexual	Sharing Injection Paraphernalia	
Critical Target Populations	-Gay men -Non-Gay identified men who have sex with men/ transgenders/ multiple genders -Transgender -Women at risk for transmitting HIV	-Gay men -Non-Gay identified men who have sex with men/ transgenders/ multiple genders -Transgender -Sex workers -Young women who have sex with partners of unknown HIV status/risk and/or in highly impacted geographic areas/zip codes*	-Gay men -Non-Gay identified men who have sex with men/ transgenders/ multiple genders	-Women who have sex with partners of unknown HIV status/ risk and/or in highly impacted geographic areas / zip codes*	ALL	ALL	

^{*} Highly impacted geographic areas/zip codes must be based on surveillance, HCT, and other relevant data.

Because this is a new planning model approved by the PPC on November 16, 2007, data have not yet been fully organized to describe the HIV/AIDS epidemic using this framework. Unlike the previous behavioral risk group planning model, the new priority populations are not mutually exclusive. For example, youth are a distinct priority population, yet they also cross all priority populations. Based on the epidemiologic data, the PPC also affirms that the HIV/AIDS epidemic in Los Angeles County has not equally impacted all racial/ethnic communities. In 2006, African American or Black males had the highest AIDS incidence rates (48 per 100,000) followed by White males (18 per 100,000), and Latino or Hispanic males (15 per 100,000). In terms of absolute numbers, Latino or Hispanic males comprised the largest proportion of AIDS cases among males in 2006 (41%) followed by White males (31%) and African American or Black males (23%).

The information that follows is a preliminary attempt to describe the HIV/AIDS epidemic within the new planning framework, using the approved priority populations. Epidemiologic data and population estimates for several priority populations are summarized in Table 2.11. This information is for persons ages 15-64 years. Through the priority-setting process, the PPC adopted a definition of youth to include persons ages 13-24 years. This is due to the fact that at age 13, youth are able to give consent for an HIV test without parental consent. Estimates of the youth population have yet to be compiled for inclusion in this table. Also not included are the estimates of HIV-positive persons as they are inherently included in the table. This population has been extensively described in the preceding pages. Lastly, the estimate of the total number of transgender individuals living in Los Angeles County is significantly smaller than the previous estimate of 10,000 that was published in the last comprehensive HIV prevention plan. The previous estimate of 10,000 referred to an estimate of the number of transgender males and females in California. The current estimate of 4,400 includes only male-to-female transgenders

and is based on a combination of California Office of AIDS estimation guidelines and local data sources. Guidelines from the 2001 California Department of Health Services' Consensus Meeting on HIV Prevalence and Incidence in California estimated that 1% of the MSM population is transgender. Thus, the estimate for Los Angeles County would be approximately 2,596 transgender individuals. Because we think Los Angeles County may have a higher proportion of male-to-female transgenders relative to the rest of California, we considered additional data from local research studies and services. The LA Men's Survey (part of the National HIV Behavioral Surveillance system) in 2004 indicated that 0.6% of MSM in the sample were male-to-female transgenders. The 2007 Web-based HIV Behavioral Surveillance study identified 1.47 percent of MSM participants as being transgender, and 2.9 percent of the MSM who tested at OAPP's publicly funded sites were transgender. Taking an average of the prevalence estimates from NHBS, the Web-based study and OAPP's HIV Counseling and Testing population, the HIV Epidemiology Program estimated that 1.7% (~4,400) of the overall 259,630 MSM are male-to-female transgender.

■ Estimates of Persons Living with HIV and AIDS by Priority Population

The number and racial/ethnic distribution of prevalent and incident HIV and AIDS cases for four priority populations were estimated by the HIV Epidemiology Program. The methodologies employed by the HIV Epidemiology Program to arrive at these estimates and group population estimates are outlined in the Technical Notes (see Attachment 1 at the end of this chapter), including data sources, assumptions, and limitations.

In order to assess the impact of HIV and AIDS on each priority population, the population size of each group and their racial/ethnic breakdown were estimated using a variety of sources—including the U.S. Census' 2005 American Community Survey; the 1999, 2002-2003, and 2005 LA Health Survey; the HIV/AIDS Reporting System (HARS); the State-funded Alternate Testing Site database; 2004-2005 Alcohol and Drug Program Administration data; Sexually Transmitted Disease Clinic data; 2005 HIV Counseling and Testing data; information from epidemiological studies (e.g., Sharps Study, LA Men's Survey) performed by the HIV Epidemiology Program, and other relevant data.

Table 2.11 shows the estimated population size of each priority population. Women have the largest population at risk (224,425), while the total number of people who share injection paraphernalia sums to 84,000 (includes specific sub-populations such as gay and non-gay identified MSM, heterosexual men, and women). Yet, despite the overall size of the female atrisk and IDU population estimates, the largest number of persons living with HIV and AIDS (PLWHA) is clearly among the two critical populations of men: (1) 26,788 estimated HIV-positive gay men and non-gay identified MSM; and (2) the 7,590 estimated HIV-positive men who have sex with multiple genders (i.e., men, women, and/or transgender individuals). Even though the overall numbers of PLWHA are smaller, the estimated HIV seroprevalence rates are highest among people who share injection paraphernalia and also have a sexual risk with other men (22.8%), and transgender individuals (21%).

White gay men and non-gay identified MSM represent the largest proportion (26.2%) of the HIV/AIDS epidemic in Los Angeles County, followed by Latinos or Hispanics (21.1%). Across all priority populations, African American or Black gay men and non-gay identified MSM have the highest seroprevalence rate in the County. The HIV Epidemiology Program estimates that 36.9% of African American or Black gay men and non-gay identified MSM are HIV positive, and

are therefore the most disproportionately impacted population. According to the estimates, the top eight impacted populations in Los Angeles County are:

- 1. African American or Black gay men and non-gay identified MSM (36.9% seroprevalence);
- 2. White men who share injection paraphernalia and have sex with men (29.9%);
- 3. African American or Black men who share injection paraphernalia and have sex with men (27.5%);
- 4. Native American gay men and non-gay identified MSM (26.1%);
- 5. African American or Black men who have sex with multiple genders (25.4%);
- 6. African American or Black transgender individuals (24.9%);
- 7. Latino or Hispanic transgender individuals (24.7%); and
- 8. Asian/Pacific Islander transgender individuals (23.4%).

Among women, African Americans or Blacks and Latinas or Hispanics are the most impacted populations.

Although not a separate priority population, the PPC approved the use of 1% of HIV prevention funds to target American Indians/Alaskan Natives because of the disproportionate impact on this smaller population. The data available regarding this population are presented to gain a better picture of the epidemic within this relatively small population.

Table 2.11 Estimated persons living with HIV/AIDS in Los Angeles County by Selected Populations, Age 15-64 Years

Population Race/ Ethnicity		Estimated Size of Population	Estimated Number of PLWH/A in Population	Proportion of PLWHA In Los Angeles County	Estimated HIV Seroprevalence in Group*
	Gay/Non-Gay	1 opulation	1 opaiation	- County	Gioup
	Identified MSM	180,385	26,788	57.5%	14.9%
	White	83,841	12,192	26.2%	14.5%
7	African Amer./Black	10,185	3,755	8.1%	36.9%
	Latino/Hispanic	57,264	9,822	21.1%	17.2%
	Asian/PI	28,064	822	1.8%	2.9%
	Native American	383	100	0.2%	26.1%
	Other	648	97	0.2%	15.0%
MEN	Men who have sex	010	01	0.270	10.070
	with Multiple Genders	61,845	7,590	16.3%	12.3%
	White	16,200	1,670	3.6%	10.3%
	African Amer./Black	7,200	1,830	3.9%	25.4%
	Latino/Hispanic	31,200	3,815	8.2%	12.2%
	Asian/PI**	6,620	214	0.5%	3.2%
	Native American	275	38	0.1%	13.8%
	Other	350	23	0.0%	6.6%
	Women	224,425	3,190	6.8%	1.4%
	White	84,600	459	1.0%	0.5%
z	African Amer./Black	24,929	1,083	2.3%	4.3%
WOMEN	Latina/Hispanic	85,309	1,531	3.3%	1.8%
8	Asian/PI**	26,684	89	0.2%	0.3%
_	Native American	903	22	0.0%	2.4%
	Other	2,000	6	0.0%	0.3%
	Gay/Non-Gay	_,			0.07
	Identified MSM	13,000	2,960	6.4%	22.8%
≰	White	4,550	1,362	2.9%	29.9%
I≱I	African Amer./Black	2,475	681	1.5%	27.5%
	Latino/Hispanic	5,000	829	1.8%	16.6%
뿔	Asian/PI**	208	39	0.1%	18.8%
I₹	Native American	150	33	0.1%	22.0%
Α	Other	617	16	0.0%	2.6%
HO SHARE INJECTION PARAPHERNALIA	Heterosexual Men	41,600	1,944	4.2%	4.7%
[음 [White	17,098	600	1.3%	3.5%
ည	African Amer./Black	5,200	680	1.5%	13.1%
3	Latino/Hispanic	15,558	620	1.3%	4.0%
Щ.	Asian/PI**	790	20	0.0%	2.5%
¥	Native American	541	16	0.0%	3.0%
ᇰ	Other	2,413	8	0.0%	0.3%
오	Women	29,400	1,047	2.2%	3.6%
≥	White	12,083	325	0.7%	2.7%
ᆲ	African Amer./Black	3,675	364	0.8%	9.9%
PEOPLE W	Latino/Hispanic	10,996	335	0.7%	3.0%
<u>R</u>	Asian/PI**	559	10	0.0%	1.8%
	Native American	382	8	0.0%	2.1%
	Other	1,705	5	0.0%	0.3%
SS	Transgenders	4,400	926	2.0%	21.0%
TRANSGENDERS	White	559	58	0.1%	10.4%
Z	African Amer./Black	1,170	291	0.6%	24.9%
SG	Latino/Hispanic	2,086	515	1.1%	24.7%
A	Asian/PI**	158	37	0.1%	23.4%
TR	Native American	57	11	0.0%	19.3%
	Other	370	those persons unaware of t	0.0%	3.8%

^{*} Estimated seroprevalence in this column include those persons unaware of their HIV infection.

^{**} PI represents persons of Pacific Islander ancestry.

Co-Morbid Communicable Diseases: Case Comparisons

■ Tuberculosis

Tuberculosis (TB) is one of 26 AIDS-defining opportunistic infections. HIV has been characterized as the most significant risk factor for progression of latent TB infection to active TB [29]. While approximately 10% of persons infected with tuberculosis will develop active TB in their lifetimes, about 50% of all persons compromised by HIV infection will develop active TB [30]. In addition, not only does infection with HIV increase a person's susceptibility for tuberculosis infection and progression, TB has detrimental effects on the course of HIV disease as well; the risk of death in an HIV-infected person with TB is twice that of an HIV-infected person without TB, even with similar CD4 cell counts [31].

❖ HIV/AIDS REPORTING SYSTEM (HARS)

Overall, 5.9% of AIDS cases reported in HARS also had TB. White AIDS cases had the lowest prevalence of TB (2.4%), while Asian/PI had 4.1 times, African-Americans or Blacks had 3.8, Latinos or Hispanics had 3.7, and AI/AN had 3.5 times higher likelihood of having TB compared to Whites (Table 2.12). Female AIDS cases were 1.2 times more likely to be co-infected with TB than male AIDS cases (OR-1.2 95% CI 1.1,1.4). There was little difference in TB co-morbidity among age groups; only the 20-29 year old age group had a statistically higher likelihood of having TB than did AIDS cases aged 30-39 years (7.1% versus 5.8%). By mode of exposure, male AIDS cases who reported sex with men (MSM) as their exposure for HIV had the lowest prevalence of TB (4.2%), while those exposed to HIV through injection drug use (IDU) had 3 times the prevalence of active TB (12.5%) and MSM-IDU cases had twice the prevalence (9.7%) compared to MSM cases. Lastly, foreign-born AIDS cases had more than twice the likelihood of having TB than did US-born cases (10.7% versus 4.6%) and US territories-born AIDS cases had nearly twice the likelihood of having TB compared U.S. born cases (8.4 versus 4.6%).

Table 2.12 Number, percent, and unadjusted odds ratios of HIV-TB co-infection among AIDS cases, by demographic variables. Los Angeles County, 2007, as reported in HARS.¹

by demographic variables, Los Angeles County, 2007, as reported in HARS.						
Demographic	Total Number of Cumulative AIDS Cases	Number of AIDS Cases with TB	Percent with TB	Odds Ratio ²		
Gender						
Male	47,891	2783	5.8	Reference		
Female	4,375	311	7.1	1.2 (1.1, 1.4)		
Transgender	Not Available	Not Available	Not Available	Not Available		
Race/Ethnicity						
White	23,839	575	2.4	Reference		
Latino	16,198	1488	9.2	3.7 (3.3, 4.1)		
Asian/PI	1,199	104	8.7	4.1 (3.7, 4.5)		
African American	10,643	896	8.4	3.8 (3.1, 4.8)		
AI/AN	211	17	8.1	3.5 (2.1, 5.9)		
Other	176	14	8.0	3.5 (2.0, 6.1)		
Age Group						
<13 years	251	5	2.0	""		
13-19 years	274	19	6.9	1.2 (0.8, 1.9)		
20-29 years	8,529	604	7.1	1.2 (1.1, 1.4)		
30-39 years	22,839	1321	5.8	Reference		
40-49 years	13,811	765	5.5	1.0 (0.9, 1.0)		
50-59 years	4,900	286	5.8	1.0 (0.9, 1.2)		
60+ years	1,662	94	5.7	1.0 (0.8, 1.2)		
Exposure Mode						
MSM	36,082	1533	4.2	Reference		
IDU	3,580	449	12.5	3.2 (2.9, 3.6)		
MSM-IDU	3,562	347	9.7	2.4 (2.2, 2.7)		
Heterosexual	2,772	176	6.3	1.5 (1.3, 1.8)		
Hemophilia	193	8	4.1	""		
Transfusion	625	36	5.8	1.4 (1.0, 1.9)		
Other/NRR	5,452	546	10.0	2.5 (2.3, 2.8)		
Place of Birth						
US-born	34,396	1576	4.6	Reference		
US Territories-born	323	27	8.4	1.9 (1.3, 2.8)		
Foreign-born	12,593	1349	10.7	2.5 (2.3, 2.7)		
Total	52,266	3094	5.9			

¹HARS is the HIV/AIDS Reporting System of Los Angeles County; reported as of April 30, 2007.

Sexually Transmitted Diseases

Many sexually transmitted diseases (STDs) can facilitate the transmission of HIV. Those that cause an open ulcer on the genitalia such as syphilis, herpes, and chancroid as well as those that do not—such as gonorrhea, chlamydia, and trichomoniasis decrease the protective mucosal/skin barrier and/or increase HIV viral shedding and thereby increase the likelihood of transmission by two to five fold [32]. STDs are indicators of unprotected sexual intercourse such as gonorrhea and chlamydia.

²Odds ratio followed by 95% confidence limits in parentheses. Statistically significant differences given in bold, non-significant differences in gray; "---" denotes inability to calculate valid confidence limits (see Technical Notes).

³MSM = men who have sex with men; IDU = injection drug use.

Finally, there are those diseases not thought of as STDs, that nonetheless may be transmitted between sexual partners; examples include hepatitis A and shigellosis that both spread via the fecal-oral route and Staphylococcus skin infections that spread via skin-to-skin contact. The Los Angeles County Acute Communicable Disease Control Unit reports that there have been small outbreaks of, and increased risk for, these diseases among MSM in recent years.

In Los Angeles County, diseases reportable to the STD Program include syphilis, gonorrhea, and chlamydia. Unless otherwise noted, the following data have been abstracted and/or summarized from Los Angeles County's *Sexually Transmitted Disease Morbidity Report 2005*. [Please note that the data presented below excludes data from the health departments within City of Pasadena and City of Long Beach.]

❖ CHLAMYDIA

In Los Angeles County, the rate of chlamydial infections increased 13%, from 358 cases per 100,000 population in 2001 to 405 per 100,000 in 2005. The County's chlamydial rates for 2005 were 15% higher than the rate in California (352 per 100,000) and 22% higher than the U.S. rate (332 per 100,000) for the same year. The strongest predictors of chlamydia risk include being a woman, young (age 15-24 years), African American or Black, and living in SPA 6 (Table 2.13).

❖ GONORRHEA

From 2001 to 2005, gonorrhea rates increased from 80 to 109 per 100,000. For 2005, Los Angeles County gonorrhea rates were 18% higher than that for California (92 per 100,000) and comparable to the U.S. rate (115 per 100,000). In the County, gonorrhea case reports were predominant in men, youth (age 15-24 years), African Americans or Blacks, and residents of SPA 6 (Table 2.13). There was a single reported case of gonorrhea among transgenders in 2005.

❖ SYPHILIS

Primary and secondary syphilis case rates in Los Angeles County have continued to increase, from 2.1 per 100,000 in 2001 to 6.7 per 100,000 in 2005. The 2005 County primary and secondary syphilis rate is higher than rates for both the U.S. and California. Unlike chlamydia and gonorrhea, the highest syphilis rates were seen among adults aged 35-44 years, African Americans or Blacks, and residents of SPA 4 (Table 2.13).

In 2005, men had 9.5 times the rate of syphilis than did women (12.3 vs. 1.3 per 100,000). However, a recent increase in reported cases of primary and secondary syphilis among women was observed from 2004 to 2005 from 38 to 61 cases, respectively. In 2005, there were four cases of primary and secondary syphilis among transgenders. From 2001 to 2005, the syphilis rate in White men increased 73%, from 4.6 to nearly 18 per 100,000. This recent increase of primary and secondary syphilis seen in Los Angeles County was first recognized in 2000 as an outbreak among gay men and non-gay identified MSM throughout Southern California [33]. This outbreak prompted a multifaceted response by the Los Angeles County STD Program that included media campaigns, an increase in Public Health Investigation, increased community collaborations, targeted screening in incarcerated populations, and online partner notification.

Nevertheless, a decline in new syphilis cases has yet to be realized. As of December 31, 2005, the number of reported early syphilis cases (i.e., primary, secondary, and early latent cases not shown on Table 2.13) continued to rise, from 423 in 2001 to 1,217 cases in 2005. A similar trend was seen for California—with 961 early syphilis cases reported in 2001 and 2,748 cases for 2003 [34].

Table 2.13 Comparison of selected sexually transmitted diseases by demographic subgroup and Service Planning Area (SPA), Los Angeles County, 2005 [34]

Syphilis Chlamydia Gonorrhea (Primary & Secondary) Demographic No. % Rate¹ No. % Rate¹ No. % Rate¹ Gender and Race/Ethnicity 11,423 29.4 240.9 5.736 54.8 121.0 583 90.5 12.3 Male White 1,076 9.4 102.1 875 15.3 80.2 249 42.7 17.7 2.989 26.2 2.173 709.0 21.5 African American 1.009.2 37.9 85 14.6 Latino 3.984 34.9 236.3 1,214 21.2 50.2 198 34.0 8.8 Asian/Pacific Isl. 314 2.7 71.3 83 1.4 18.2 22 3.8 3.7 0.4 Other² 48 0.4 25 5 0.9 27,385 70.6 565.7 4.736 45.2 97.8 61 9.5 1.3 Female White 2.190 8.0 192.9 486 10.3 41.3 8 13.1 0.5 6,010 21.9 1,669.3 2.099 44.3 31 50.8 African American 562.4 6.7 43.6 679.8 1,104 23.3 60.6 22 36.1 1.0 Latina 11,953 0 Asian/Pacific Isl. 1,096 4.0 215.1 117 2.5 22.1 0 0 Other² 133 0.5 27 0.6 0 0 0 0 0 1 4 Transgender (M to F) Age Group <15 years 391 1 17.8 113 1 5.1 0 0 0.0 15-19 years 10,813 28 1,542.3 2,346 22 334.6 29 2 4.1 20-24 years 13,374 34 2,017.9 2,865 27 432.3 122 10 18.4 25-29 years 6,853 18 1,020.6 1,810 17 269.6 142 12 21.1 30-34 years 3,414 9 454.6 149.0 192 16 25.6 1,119 11 35-44 years 7 2,874 190.1 15 102.6 40 32.1 1,551 485 45-54 years 2 5 60.3 528 41.4 13.4 769 171 14 0 55-64 years 145 17.2 86 10.2 45 4 5.4 1 0 23 0 2.4 1.2 60+ years 45 4.6 12 1 Unknown 184 0 53 1 1 0 **SPA** 1: Antelope Valley 395.3 407 1,355 3 4 118.7 13 1 3.8 2: San Fernando 5,486 14 441.3 11 89.9 178 14.3 1,118 15 12 3: San Gabriel 4,631 712.8 8 121.4 8.2 789 53 4 4: Metro 4,918 13 289.1 1,744 17 102.5 527 44 31.0 3 402 36.4 5 5.4 5: West 1,342 121.4 4 60 23 6: South 8,908 3,007 29 290.1 150 13 14.5 859.5 4,710 12 220.9 719 7: East 7 33.7 84 7 3.9 7 8: South Bay 4,300 11 313.4 12 92.8 85 6.2 1,273 8 49 Unknown SPA 3.212 1.035 10 4 TOTAL⁴ 38,862 100 10.494 100 109.5 644 100 6.7 405.5

¹ Rate = adjusted rate in cases per 100,000 population; rates based on <19 cases are unreliable.

² Includes data for race/ethnicity reported as "Other" and "Native American".

⁴ Total category includes cases with unknown demographic information not otherwise shown.

Percentages may not total to 100%, due to rounding; excludes cases in Long Beach and Pasadena

Although not depicted in Table 2.13, of early syphilis cases reported in Los Angeles County for 2005, 88% were male, nearly three-quarters of cases were either White (36%) or Latino or Hispanic (37%), and 56% were aged 30–44 years. In 2001, half of the cases were in MSM; by 2005, 63% of all cases were MSM, over half of which were also HIV-infected. Of MSM contracting syphilis in 2005, more than half reported having anonymous sex and only one-quarter reported using a condom during sexual intercourse [34].

Hepatitis C

Hepatitis C virus (HCV) infection is the most common bloodborne infection in the U.S., with an estimated 1.8% of all Americans infected [35]. HCV is predominantly transmitted through contact with contaminated blood and blood products. Persons at high risk for HCV include those receiving clotting factors made before 1989 and persons who inject drugs (IDU). Those persons who received a blood transfusion or solid organ transplant prior to 1992 (hemodialysis patients, persons with undiagnosed liver problems, and infants born to infected mothers) are at intermediate risk [36]. While it has been shown that HCV is not easily transmitted through sexual intercourse [37, 38], sexual transmission may account for up to 15% of cases.

Once established, HCV is not cleared in 85% of infected persons and leads to chronic illness, such as cirrhosis, liver failure, and liver cancer among 60–70% of those infected [39]. Unlike for hepatitis A and B viruses, there is currently no vaccine for HCV. Although recent advances have been made, HCV disease in persons co-infected with HIV is especially difficult to treat [40]. In one recent study, HIV-HCV co-infected patients were found to have a significantly higher proportion of depression and other psychiatric problems (70%) than did mono-infected persons (57%) [41].

Key Resources

DESCRIPTION & WEBSITE

2005 California Health Interview Survey (Released 2007)

http://www.chis.ucla.edu./

The California Health Interview Survey (CHIS) is the most comprehensive source of health information on Californians. CHIS data are used by legislators, policy makers, state agencies, local health departments, community organizations, advocacy groups, foundations, researchers, and many others.

2007 Greater Los Angeles Homeless Count

http://www.lahsa.org/homelesscount.asp

On January 23, 24, and 25, 2007, the 2007 Greater Los Angeles Homeless Count was performed by using U.S. Department of Housing and Urban Development-recommended practices for counting homeless persons and estimating the number of homeless people on any given time and over the course of a year. This comprehensive study includes: (1) Street Count, (2) Shelter and Institution Count, (3) Homeless Demographic Survey, (4) General Population Telephone Survey, and (5) Statistical Projection.

2007 LA County Zip Code Data Book

http://www.unitedwayla.org/getinformed/ccrs/socialreports/Pages/2007zipcode.aspx

The 2007 data book contains important social and demographic data on L.A. County zip codes, with data on over 100 LA communities as well as data across the 8 Service Planning Areas of the county. Data is through 2005. Key features include:

- Summary of race/ethnic population by L.A. County Service Planning Areas (SPAs) and by zip codes.
- Summary of homeownership rates by ethnicity, renters by ethnicity/race and zip code, families living in
 poverty by zip code and community.
- Maps by SPA on poverty, educational attainment, languages spoken at home, and more.
- Tables by SPA on household size, poverty by race/ethnicity, employment status and more.

California Department of Finance: Demographic, Financial, and Economic Research

http://www.dof.ca.gov/Research/Research.php

The Demographic Research Unit of the California Department of Finance is designated as the single official source of demographic data for state planning and budgeting.

California Employment Development Department Employment Market Information

http://www.labormarketinfo.edd.ca.gov/

This website provides a variety of employment-related information resources, including:

- <u>Find an Occupation Profile</u>: Get a description, wages, employment outlook, training providers, and skills of a single occupation. Or compare occupations to find the best one for you.
- <u>Find Local Area Profile</u>: Get an overview of labor market information in the state or a county including employment and unemployment, industry data, wages, consumer price index and more!.
- <u>Find the Data</u>: Use the *Data Library* to find Occupational Projections of Employment, Occupational Wages, Industry Employment, Unemployment Rates, and more.

Key Indicators of Health, 2005 (Released April 2007)

http://www.lapublichealth.org/ha/reports/Key05Report FINAL.pdf

Key indicators are standardized measures through which we can consider and compare many aspects of health and well-being. In this report, we describe indicators for each of Los Angeles County's Service Planning Areas (SPAs) and for the county overall. When possible, we compare the health measures of Los Angeles County residents with those of the United States population, and with the Healthy People 2010 goals, which represent the health standard measures our nation is trying to achieve within a decade.

DESCRIPTION & WEBSITE

Los Angeles County Children's Planning Council

http://www.lapublichealth.org/childpc/

The Los Angeles County Children's Planning Council - a countywide public/private collaborative - is dedicated to improving the lives of children and families by encouraging partnerships, promoting the use of data, developing resources and tools, and emphasizing the importance of outcomes and results. The website has extensive data by zip codes and Service Planning Areas (SPAs) to facilitate program planning.

Since 1994, the Los Angeles County Children's Planning Council has produced the Children's ScoreCard, a tool to track progress toward improving the lives of children and families in our county. Measuring and tracking data in key areas of child well-being not only call attentions to needed changes, but can help mobilize us to work together to achieve the outcomes we want for children: good health, safety and survival, economic well-being, social and emotional well-being, and education and workforce readiness.

Los Angeles County HIV Epidemiology Program

http://lapublichealth.org/phcommon/public/reports/rptspubdisplay.cfm?unit=hiv&ou=ph&prog=hae

The Los Angeles County HIV Epidemiology Program is responsible for publishing the Los Angeles County semi-annual HIV/AIDS surveillance summary reports. In addition, the Program conducts extensive HIV specific research and provides specialized data, such as the *Supplemental HIV/AIDS Surveillance (SHAS)* report.

Quality of Life in Los Angeles County; 2007 State of the County Report (March 2007)

http://www.unitedwayla.org/getinformed/ccrs/socialreports/Pages/qofl.aspx

Summary: This is the 2007 edition of the State of the County report. This year, we have incorporated a new feature: the Quality of Life Index. The index, based on 4 areas of economics, health, education, and public safety, is a 10 point scale, with a higher score indicating a higher quality of life. Some of the indicators that comprise the index include measurements of obesity, asthma, child poverty, student proficiency in math and reading, housing affordability, wages, air quality, violent crime, access to healthcare and more. With this index, policy makers, the public and the media will have a better understanding of where LA lies on key issues in comparison to the state and the nation, as well as better tools to address key problems.

U.S. Census 2006 American Community Survey

www.census.gov

America is changing, and so is the census. The American Community Survey (ACS) lets communities see how they are changing - filling in the gaps between each 10-year census.

United Way of Greater Los Angeles

http://www.unitedwayla.org/getinformed/ccrs/Pages/default.aspx

United Way of Greater Los Angeles has produced a series of Social Reports that explore many social conditions and trends in our community.

Often created in partnership with some of the most respected research institutions in Los Angeles County, these reports offer readable, insightful, and actionable information on the trends that shape life in Greater Los Angeles.

Chapter References

- 1. United Way of Greater Los Angeles. *The 2007 LA County Zip Code Data Book*. May 2007. Available at:
 - http://www.unitedwayla.org/getinformed/ccrs/socialreports/Pages/2007zipcode.aspx
- State of California, Department of Finance, Population Estimates and Components of Change by County, July 1, 2000-2007. Sacramento, California, December 2007. Available at: http://www.dof.ca.gov/html/DEMOGRAP/ReportsPapers/Estimates/E6/E6-00-05/E-6_Report_00-07.php
- 3. U.S. Bureau of the Census. *2006 American Community Survey*. Available at: www.census.gov.
- 4. Los Angeles County, Department of Health Services, Maternal, Child, and Adolescent Health Programs. *County of Los Angeles California MCAH Family Health Outcomes Project Title V Perinatal Indicators 2004*. Available at: http://lapublichealth.org/mch/fhop/FHOP04/FHOP%20Report%202004.pdf.
- 5. Los Angeles County, Department of Health Services, Maternal, Child, and Adolescent Health Programs. Crude Birth Rates: 1990-2000. Web site. Available at: http://lapublichealth.org/mch/fhop/fhop01/individuals01/FHOP01 1.pdf.
- 6. State of California, Department of Finance, *Population Projections for California and Its Counties 2000-2050, by Age, Gender and Race/Ethnicity,* Sacramento, California, July 2007.
- 7. Los Angeles County Department of Public Health. *Key Indicators of Health*, 2005. Available at: http://www.lapublichealth.org/ha/reports/Key05Report FINAL.pdf.
- 8. Los Angeles County Department of Public Health. *Mortality in Los Angeles County 2003: Leading Causes of Death and Premature Death.* Available at: http://lapublichealth.org/phcommon/public/reports/rptspubdisplay.cfm?unit=dca&ou=ph&prog=hae.
- 9. State of California, Employment Development Department. *Los Angeles-Long Beach-Glendale Metropolitan Division (Los Angeles County)*. Labor Market Information Division. Available at: http://www.calmis.ca.gov/file/lfmonth/la\$pds.pdf. Last accessed: 12/30/2007.
- 10. State of California, Employment Development Department. *California and Los Angeles County Model and United States CPS Labor Force Data 2006 Benchmark*. Labor Market Information Division. Available at: http://www.calmis.ca.gov/file/lfmonth/calPR.pdf. Last accessed: 12/30/2007.
- 11. Los Angeles Alliance for a New Economy. *Poverty, Jobs, and the Los Angeles Economy: An Analysis of U.S. Census Data and the Challenges Facing Our Region.* August 28, 2007. Available at:
 - http://www.laane.org/docs/research/Poverty Jobs and the Los Angeles Economy.pdf.

- 12. Carroll D, Roby DH, Ross J, Snavely M, Brown ER, and Kominski GF. *What Does It Take for a Family to Afford to Pay for Health Care?* Los Angeles: UCLA Center for Health Policy Research, 2007. Available at: http://www.healthpolicy.ucla.edu/pubs/files/Family Afford HCare RT 082707.pdf.
- 13. United Way of Greater Los Angeles Center for Community Research and Solutions. *Quality of Life in Los Angeles: 2007 State of the County Report.* March 2007. Available at: http://www.unitedwayla.org/getinformed/ccrs/socialreports/Pages/qofl.aspx.
- 14. Los Angeles Homeless Services Authority. 2007 Greater Los Angeles Homeless County. Available at: http://www.lahsa.org/2007homelesscountreport.asp.
- Brown ER, Lavarreda SA, Ponce N, Yoon J, Cummings J, Rice T. The State of Health Insurance in California: Findings from the 2005 California Health Interview Survey. UCLA Center for Health Policy Research, 2007. Available at: http://www.healthpolicy.ucla.edu/pubs/files/shic07_losangeles.pdf.
- Los Angeles County Office of Education. 2007 Facts and Stats. LACOE pamphlet. Downey, CA. Available at: http://www.lacoe.edu/includes/templates/document-frame.cfm?tourl=documents&id=3952.
- 17. Federal Bureau of Prisons. *Weekly Population Report*. Website. Available at: http://www.bop.gov/locations/weekly_report.jsp.
- 18. California Department of Corrections, Estimates and Statistical Analysis Branch. *Weekly Report of Population*. Website. Available at: http://www.cdcr.ca.gov/Reports_Research/Offender_Information_Services_Branch/Population_Reports.asp.
- 19. Los Angeles Sheriff's Department. *Department Overview: 2006 Synopsis.* Website. Available at: http://www.lasd.org/sites/yir9600/yir2006/15.pdf.
- 20. California Department of Mental Health Services. Estimates of Need for Mental Health Services for California for Serious Mental Illness for 2000 Index for Population of All Ages. Updated January 2006. Website. Available at: http://www.dmh.cahwnet.gov/Statistics and Data Analysis/CNE/p5wsmi01 caindex1.htm.
- 21. California Department of Mental Health Services. *Estimates of Need for Mental Health Services for California, Los Angeles County for Serious Mental Illness for 2000*. Updated January 2006. Website. Available at: http://www.dmh.cahwnet.gov/Statistics and Data Analysis/CNE/p5wsmi01 ca037.htm.
- 22. Annual Review of Participants in Alcohol and Drug Programs Contracted by the ADPA: 2005-2006 Fiscal Year. Website. Available at: http://www.lapublichealth.org/adpa/annualreview/annualreview.htm#.
- 23. HIV Epidemiology Program, Los Angeles County Department of Public Health. *HIV/AIDS Surveillance Summary*, July 2007:1-28.

- 24. Centers for Disease Control and Prevention. *HIV/AIDS Surveillance Report: HIV Infection and AIDS in the United States and Dependent Areas*, 2005. Website. Available at: http://www.cdc.gov/hiv/topics/surveillance/basic.htm.
- 25. Jayaraman GC, Preiksaitis JK, Larke B. Mandatory Reporting of HIV Infection and Opt-out Perinatal Screening for HIV Infection: Effect on Testing Rates. *Canadian Medical Association Journal*. 2003; 168: 679-682.
- Centers for Disease Control and Prevention. Revised Recommendations for HIV Testing of Adults, Adolescents, and Pregnant Women in Health-Care Settings. MMWR. 2006; 55(RR14);1-17.
- 27. Kothe D, Byers RH, Caudill SP, Satten GA, Janssen RS, Hannon WH, and Mei JV. Performance Characteristics of a New Less Sensitive HIV-1 Enzyme Immunoassay for Use in Estimating HIV Seroincidence. *Journal of Acquired Immune Deficiency Syndromes*. 2003; 33: 625-634.
- 28. Janssen, RS, Satten GA, Stramer SL, Rawal BD, O'Brien TR, Weiblen BJ, Hecht FM, Jack N, Cleghorn FR, Khan OK, Chesney MA, Busch MP. New Testing Strategy to Detect Early HIV-1 Infection for Use in Incidence Estimates and for Clinical and Prevention Purposes. *Journal of the American Medical Association.* 1998; 280:42-49.
- 29. Rieder HL, Cauthen GM, Comstock GW, Snider DE Jr. Epidemiology of Tuberculosis in the United States. *Epidemiology Reviews*. 1989; 11: 79-98.
- 30. Shafter RW and Montoya JG. Tuberculosis. *Textbook of AIDS Medicine*. Editor, Broder *et al.* 1994; Williams and Wilkins, Baltimore, MD. Pp. 259-284.
- 31. Barnes PF, David MD, Lakey DL and Burman WJ. Tuberculosis in Patients with HIV Infection. *Infectious Disease Clinics of North America*. 2002; 16 (1): 107-108.
- 32. Fleming DT and Wasserjeit J. From epidemiological synergy to public health policy and practice: The contribution of other sexually transmitted diseases to sexual transmission of HIV infection. *Sex Transmission and Infection*. 1999; 75:3-17.
- 33. Center for Disease Control and Prevention. Outbreak of Syphilis Among Men Who Have Sex With Men --- Southern California, 2000. MMWR. 2001; 50(07); 117-120.
- 34. Sexually Transmitted Disease Program, Los Angeles County Department of Public Health. 2005 Sexually Transmitted Disease Morbidity Report: pp. 1-201.
- 35. Centers for Disease Control and Prevention. Recommendations for Prevention and Control of Hepatitis C Virus (HCV) Infection and HCV-Related Chronic Disease. *Morbidity and Mortality Weekly Report.* 1998; 47 (RR-19): 1-38.
- 36. Centers for Disease Control and Prevention. Recommendation for testing based on risk for HCV infection. *Hepatitis C Fact Sheet*. Web site. Available at: www.cdc.gov/nci/dod/diseases/hepatitis/c/fact.htm.

- 37. Hammer GP, Kellogg TA, McFarland WC, Wong E, Louie B, Williams I, Dilley J, Page-Shafer K, and Klausner JD. Low Incidence and Prevalence of Hepatitis C Virus Infection among Sexually Active Non-Intravenous Drug-Using Adults, San Francisco, 1997-2000. *Sexually Transmitted Diseases*. 2003; 30 (12): 919-924.
- 38. Vandelli C, Renzo F, Romano L, Tisminetzky S, de Palma M, Stroffolini T, Ventura E, Zanetti A. Lack of Evidence of Sexual Transmission of Hepatitis C among Monogamous Couples: Results of a 10-year Prospective Follow-up Study. *American Journal of Gastroenterology*. 2004; 99 (5): 855-859.
- 39. Alter MJ, Mast EE, Moyer LA, and Margolis HS. Hepatitis C. *Emerging Infectious Diseases*. 1998; 12 (1): 13-26.
- 40. Pawlotsky J. Treating Hepatitis C in "Difficult-to-Treat" Patients. *New England Journal of Medicine*. 2004; 351 (5): 422-423.
- 41. "Depression High among HIV-Positive Patients: Rates are more than five times greater." *AIDS Alert*. March 2004; 19(3): 34.

Attachment 1: Technical Notes

1. Estimation of population size and HIV prevalence in Priority Populations (Table 2.11)

Population sizes for priority populations were estimated using a variety of sources. The first was the 2005 population estimate from the U.S. Census American Community Survey. Other population estimate sources include the LA Health Survey (1999, 2002-2003, and 2005)²⁻⁴, the 2001 Consensus meeting on HIV/AIDS Incidence and Prevalence in California⁵, the HIV Counseling and Testing database kept by Office of AIDS Programs and Policy⁶, and the Los Angeles County Alcohol and Drug Program Administration⁷. Several research articles⁸⁻¹⁰ containing estimates of the IDU and MSM population sizes for Los Angeles County, as well as a variety of community-based HIV prevalence studies were also used. 11-16

Because only AIDS and not all HIV cases have been reportable in Los Angeles County until recently, HIV prevalence was based on a CDC-recommended formula for estimating all persons living with HIV from the number of persons living with AIDS. ¹⁷ Using this formula, we estimate about 56,500-62,200 persons to be living in Los Angeles County with HIV/AIDS. Of the approximately 35,300-40,924 persons without an AIDS diagnosis, one of four HIV-infected individuals is estimated to be unaware of their infection. To calculate the prevalence of HIV within each population sub-group, the HIV Epidemiology Program again used data from recent AIDS cases¹⁷ to approximate racial/ethnic-specific estimates.

For more details about how population size and HIV prevalence were estimated, please call Trista Bingham at the HIV Epidemiology Program (ph. 213-351-8175).

- 1. U.S. Census Bureau. 2005 American Community Survey. B01001.
- 2. Los Angeles County Department of Public Health, Office of Health Assessment and Epidemiology. LA Health Survey, 1999.
- 3. Los Angeles County Department of Public Health, Office of Health Assessment and Epidemiology. LA Health Survey, 2002-03.
- 4. Los Angeles County Department of Public Health, Office of Health Assessment and Epidemiology. LA Health Survey, 2005.
- 5. California Department of Health Services, Office of AIDS. Consensus Meeting on HIV/AIDS Incidence and Prevalence in California, December 2001.
- 6. Los Angeles County Department of Public Health, Office of AIDS Programs and Policy, HIV Counseling and Testing Data, 2005.
- 7. Los Angeles County Department of Public Health, Alcohol and Drug Program Administration. Annual review of participants in alcohol and drug programs contracted by Alcohol and Drug Program Administration, 2004-05.
- 8. Lieb S, Friedman SR, Zeni MB, Chitwood DD, Liberti TM, Gates GJ, Metsch LR, Maddox LM, & Kuper T. An HIV prevalence-based model for estimating urban risk populations of Injection Drug Users and men who have sex with men. *Journal of Urban Health: Bulletin of the New York Academy of Medicine*. 2004, Vol. 81, No. 3, 401-415.
- 9. Holmberg SD. The estimated prevalence and incidence of HIV in 96 large US metropolitan areas. *American Journal of Public Health*. May 1996, Vol. 86, No. 5, 642-654.
- 10. Friedman SR, Tempalski B, Cooper H, Perlis T, Keem M, Friedman R & Flom PL. Estimating numbers of injection drug users in metropolitan areas for structural analyses of community vulnerability and for assessing relative degrees of service provision for injecting drug

- users. *Journal of Urban Health: Bulletin of the New York Academy of Medicine*. 2004, Vol. 81, No. 3, 377-400.
- 11. Los Angeles County Department of Public Health, HIV Epidemiology Program, National HIV Behavioral Surveillance, Los Angeles Men's Survey (MSM) 2004.
- 12. Los Angeles County Department of Public Health, HIV Epidemiology Program, National HIV Behavioral Surveillance, Sharps Study (IDU), 2005.
- 13. Los Angeles County Department of Public Health, HIV Epidemiology Program, Web-based Study, 2007.
- 14. Los Angeles County Department of Public Health, HIV Epidemiology Program, Jail Study, 2003-04.
- 15. Los Angeles County Department of Public Health, Alcohol and Drug Program Administration. Annual review of participants in alcohol and drug programs contracted by Alcohol and Drug Program Administration, 2005-06.
- 16. Los Angeles County Department of Public Health, HIV Epidemiology Program, HITS Study, 2003-04.
- 17. Los Angeles County Department of Public Health, HIV Epidemiology Program, HIV/AIDS Reporting System, 2005.