



# MORTALITY IN LOS ANGELES COUNTY 2010

Leading Causes of Death and Premature Death with Trends for 2001-2010

A PUBLICATION OF THE LOS ANGELES COUNTY DEPARTMENT OF PUBLIC HEALTH



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### MORTALITY 2010

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## Message from the Director



I am pleased to report that the number of deaths among residents of Los Angeles County continues to decline. During the 10-year period from 2001 through 2010, the death rate in the County decreased 19%. During the same time period, the United States death rate decreased only 13%. The reductions in Los Angeles County reflect the important work of the Department and our partners in educating the community about how to reduce their risk of certain conditions

and to adopt healthier lifestyles, ensuring access to quality medical screenings and treatment, and creating communities that promote health.

In 2010, the age-adjusted death rate in Los Angeles County was 615 deaths per 100,000 population, which was substantially below the United States rate of 747 deaths per 100,000 population. Notable declines in the death rate from many of the leading causes of death contributed to the overall decline. For example, from 2001 through 2010, there was a 37% decrease in the death rate from coronary heart disease, a 35% decrease in the death rate from stroke, and a 22% decrease in the death rate from lung cancer. Death rates in the County were at or below national goals established by Healthy People 2010 for female breast cancer, coronary heart disease, lung cancer, motor vehicle crash, and stroke.

Although there have been improvements, we face challenges in making certain that all Angelenos benefit equally. The lowest overall death rate (354 deaths per 100,000 population) was among Asian/Pacific Islander women while the highest overall death rate (1,087 deaths per 100,000 population) was among black men. Geographically, the lowest death rate, 497 deaths

per 100,000 population, was in the West Service Planning Area while the highest death rate, 799 deaths per 100,000, was in the Antelope Valley Service Planning Area. Some residents are at higher risk of death than others because of their health behaviors, the environment in which they live, their education and employment opportunities, and their access to medical care. We continue to work with our partners to close this gap. While some death rates decreased, the death rate from Alzheimer's disease continued to increase, and there has been little improvement in recent years in the death rates from preventable injuries such as drug overdoses and suicide. Violence, particularly gun violence, is a leading cause of premature mortality (especially for black and Hispanic men), and disproportionately affects communities of lower socioeconomic status. Violence prevention initiatives for communities and individuals can help to increase life expectancy in those communities.

Measures of mortality are important indicators for monitoring the health of a community. In Los Angeles County, we continuously review and analyze the information collected from death certificates for residents of the County.

This report, *Mortality in Los Angeles County 2010: Leading Causes of Death and Premature Death with Trends for 2001-2010*, is a comprehensive analysis and summary of the most recent year's finalized data. This resource can be used to help identify priorities for action and guide our efforts to improve the public's health. We hope the information in this report will help us work collaboratively to formulate local and state policies, and implement programs to improve and enrich the lives of all Angelenos.

*Jonathan E. Fielding*

Jonathan E. Fielding, MD, MPH  
DIRECTOR AND HEALTH OFFICER

## Data Highlights for 2010

Unless otherwise noted, rates are age-adjusted

- In 2010, there were 56,538 deaths—a 1.9% decrease from 2009. The death rate was 615 deaths per 100,000 population compared with 747 deaths per 100,000 in the U.S. (**See Note on Page 6 for information about the 2010 County population and the impact on death rates in 2010.**)
- The number of deaths among men and women was nearly equal—28,772 men and 27,766 women—but overall, men died at a younger age than women. The median age at death for men was 73 years compared with 82 years for women.
- Overall, whites and Asians/Pacific Islanders lived longer than blacks and Hispanics. The median age at death was 81 years for whites, 80 years for Asians/Pacific Islanders, and 70 years for both blacks and Hispanics.
- The highest overall death rate, 1,087 deaths per 100,000 population, was among black men. This was more than three times higher than the rate among Asian/Pacific Islander women, who had the lowest death rate at 354 deaths per 100,000 population.
- On an average day in Los Angeles County, 155 people died, including 35 from coronary heart disease, 9 from injuries (homicide, suicide, and unintentional), and 9 from stroke. Five of the deaths were among children or young adults less than 25 years of age.
- Twenty-two percent of the deaths in 2010 were caused by coronary heart disease (12,635 deaths), which was the leading cause of death and premature death.
- Of the deaths caused by cancer, lung cancer was the most common (2,941 deaths), followed by colorectal cancer (1,285 deaths) and breast cancer (1,116 deaths). There were 13,860 deaths from all types of cancer combined.
- Diabetes (1,894 deaths) remained an important cause of death and premature death for both men and women, and for all race/ethnic groups. The death rates were highest for blacks and Hispanics, and higher for men than for women.
- Accidents (also called unintentional injuries)—primarily motor vehicle crashes and drug overdoses—were the leading cause of death among people aged 1 to 44 years (739 deaths). In this age group, all types of injuries combined caused 42% of the deaths (739 unintentional injuries, 534 homicides, and 364 suicides).
- Homicide was the leading cause of death for 15- to 24-year-olds, the second-leading cause of death for 25- to 44-year-olds, and the leading cause of premature death for Hispanic and black men.
- Firearms caused 796 deaths: 77% of the 651 homicides and 35% of the 792 suicides.
- Alzheimer's disease was the third-leading cause of death for women (1,491 deaths), but it was the ninth-leading cause of death for men (751 deaths).
- HIV remained an important cause of premature death for black men and in the Central Health District.
- Death rates were higher for men than for women for every leading cause of death and premature death, except for Alzheimer's disease and breast cancer.
- For most of the leading causes of death and premature death, the highest death rate was among black men, and the lowest rate was among Asian/Pacific Islander or Hispanic women.
- Death rates in the Antelope Valley and South Service Planning Areas were generally higher than in other areas of the County.
- Overall, 44% of the deaths were among persons less than 75 years of age. These 24,640 deaths contributed more than 430,000 years of life lost before age 75.

## Trend Data Highlights for 2001-2010

Unless otherwise noted, rates are age-adjusted

- During the last 10 years, the overall death rate in the County decreased 19%, from 756 to 615 deaths per 100,000 population. The U.S. death rate decreased 13%, to 747 deaths per 100,000 population, during the same time period.
- There was a notable decrease (37%) in the death rate from coronary heart disease—the leading cause of death and premature death—from 220 deaths per 100,000 in 2001 to 138 in 2010. The death rates from coronary heart disease among residents of the Antelope Valley and South Service Planning Areas were consistently higher than other areas.
- Coronary heart disease was the leading cause of death and premature death every year for the last 10 years.
- Death rates from stroke, the second-leading cause of death, decreased 35% overall during the last 10 years. The largest decrease (41%) was among white women. While the rate for blacks decreased 34% from 82 to 54 deaths per 100,000 population, the 2010 rate still exceeded the Healthy People 2010 goal.
- Stroke was the second-leading cause of death every year for the last 10 years.
- Since 2001, the overall death rate from lung cancer declined by 22%. The largest decrease (30%) was among black men, but in 2010, their death rate of 66 deaths per 100,000 population still exceeded the Healthy People 2010 goal.
- From 2001 through 2010, the overall death rate from diabetes decreased 13% but, among women, the decrease was 21%. Throughout the 10-year time period, black men consistently had the highest death rate.
- For the last 10 years, the four leading causes of death have remained unchanged: coronary heart disease, stroke, lung cancer, and emphysema.
- Coronary heart disease and homicide were the two leading causes of premature death during the last 10 years. In 2010, suicide replaced motor vehicle crash as the third-leading cause of premature death.
- Since 2001, the number of deaths from Alzheimer's disease has more than doubled from 905 in 2001 to 2,242 in 2010.
- The number of homicides peaked at 1,148 in 2002, and began declining in 2007 after several years of little change. In 2010, there were 651 homicides. The overall homicide rate decreased to 6 deaths per 100,000 population in 2010, but the homicide rate among black men remained very high—45 deaths per 100,000 population.
- Drug overdose has been one of the leading causes of premature death every year for the past 10 years. In recent years, the death rate has remained unchanged.
- The suicide rate has changed little during the past 10 years. Since 2009, the number of suicides exceeded the number of homicides. The number of suicides peaked in 2008. The suicide rate was consistently highest for white men.
- HIV has not been among the overall leading causes of death or premature death since 2004; in 2010 it remained an important cause of death for some groups.

## Background

When a death occurs in California, state law requires that a certificate of death be filed within eight days of death and before a decedent is buried or cremated. The certificate of death is a legal document that serves as a permanent record of the death of an individual. To complete a certificate of death, the funeral director or medical facility collects identifying and demographic information about the decedent from family members and medical records. The decedent's physician or the coroner provides information about the medical conditions or events that precipitated the death.

When the death certificate is complete, it is filed with the local registrar using the Electronic Death Registration System.<sup>1</sup> Then, the local registrar submits the document to the State Registrar of Vital Records, and state records are aggregated by the National Center for Health Statistics to create an annual national mortality database. There is a delay of about two years before the annual national mortality database is available for use, although the use of electronic death registration systems are helping to shorten this timeframe. Errors, omissions, and inaccuracies can occur when the death certificate is completed, and later when it is processed. Some of these errors are detected and corrected; others are not.

This report summarizes information obtained from death certificates (Appendix 1) for all Los Angeles County residents who died in 2010, and mortality trends for 2001 through 2010. While it cannot provide information about every cause of death, it lays the groundwork for future efforts and provides valuable information for public health and medical research, evaluation of prevention and intervention programs, community needs assessments, policy development, and program planning. Death certificate data represent an important endpoint in the spectrum of disease and help us to better understand the burden of disease in our community. Because death certificates are required by state law, they provide a readily available, and a consistently and continuously collected source of information on a wide range of health conditions.

### **PREMATURE DEATH: WHAT IS IT?**

We expect most people to live a long life, but many do not. In 2010, almost half (44%) of the people who died were less than 75 years old. To quantify the impact of early, or premature, death we must consider how long a person was expected to live. For this report, we set our expected lifespan at 75 years of age, a standard cut-off used in public health. Ideally, most people will live longer than 75 years.

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<sup>1</sup> The Electronic Death Registration System (EDRS) is an Internet system for death certificate origination and registration that enables coroners, funeral directors, doctors, and hospitals to submit death certificates for registration 24 hours per day. This results in improved efficiency, faster registration, and improved data quality. EDRS was first implemented in Los Angeles County in October 2007.

## MEASURES

This report provides the number of deaths, death rates, and years of life lost before age 75 for the leading causes of death and premature death for 2010 and the 10-year period, 2001 through 2010, for Los Angeles County residents. The variables included in the analysis were age at death, gender, race/ethnicity, service planning area and health district of residence, and underlying cause of death. To protect the identity of decedents, the exact number of deaths was not provided if there were fewer than five deaths in a particular group.

If we expect everyone to live to at least 75 years of age, then people who die younger are considered to have died prematurely. For example, a person who died at 63 years of age lost 12 years of expected life, while a person who died at 80 exceeded the expectation and did not lose any years of expected life. For everyone who died during the year, we calculated the years of expected life that were lost if they died before 75. Then, by adding up the total years of life lost for each cause of death, we identified those causes of death responsible for the greatest amount of premature death. Calculations of years of life lost were limited to persons who were at least 1 year of age at the time of death. Infants less than 1 year of age were excluded because prevention of infant mortality differs from prevention of other causes of early mortality.

A standardized coding system, the International Classification of Diseases (ICD), was used to classify causes of death and to group similar causes of death into categories for analysis.<sup>2</sup> The cause of death groups were based on categories developed by the National Center for Health

Statistics.<sup>3</sup> To identify the leading causes of death, the cause of death groups were ranked by the number of deaths in each group. If two groups had the same number of deaths, then the cause of death that resulted in the most years of life lost was ranked first. To identify the leading causes of premature death, the groups were ranked by the years of life lost in each group. If two causes of death resulted in the same number of years of life lost, then the group that resulted in the greatest number of deaths was ranked first. The ICD tenth revision was used for classifying deaths that occurred in 1999 or later. From 1979 through 1998, the ICD ninth revision was in use. To facilitate comparisons with earlier years, ninth and tenth revision codes are provided for each of the leading causes of death and premature death.

When a person dies, it is likely that several factors or conditions contributed to the death. For this report, we analyzed the underlying cause of death, which is the condition that most directly caused the death. By using a single cause of death rather than considering all the conditions present at the time of death, the number of deaths and rates in this report do not reflect the full impact of certain diseases and conditions.<sup>4</sup>

Healthy People is a set of national health objectives for improving the health of all Americans, which are updated every 10 years. First released for 1990, Healthy People objectives were updated for 2000, 2010, and 2020. Some figures in this report include national goals established by Healthy People 2010.<sup>5</sup>

2 International statistical classification of diseases and related health problems, tenth revision. Geneva: World Health Organization, 1992.

3 Instruction manual, Part 9. ICD-10 cause-of-death lists for tabulating mortality statistics (updated October 2007 to include WHO updates to ICD-10 for data year 2007). [www.cdc.gov/nchs/data/dvs/Part9InstructionManual2007.pdf](http://www.cdc.gov/nchs/data/dvs/Part9InstructionManual2007.pdf).

4 Redelings MD, Sorvillo F, Simon P. A comparison of underlying cause and multiple causes of death: U.S. vital statistics, 2000-2001. *Epidemiology*. 2006 Jan;17(1):100-3.

5 Healthy People, Office of Disease Prevention and Health Promotion, U.S. Department of Health and Human Services. [www.healthypeople.gov](http://www.healthypeople.gov).

## DEFINITIONS AND TECHNICAL NOTES

- **Age-adjusted death rate:** There are age-related differences in the rates at which most health conditions occur. Some conditions are more common among young people, while others are more common among older people.

Age adjustment is a technique for removing the effects of age from crude rates so they can be compared. Age adjustment is used to compare two or more populations at one point in time or one population at two or more points in time. To control for differences in the age distribution of the populations being compared, the death rates for each population group are applied to a standard population in order to create a comparable summary measure of mortality. In this report, age-adjusted death rates were calculated using the 2000 standard population published by the National Center for Health Statistics (Appendix 2).<sup>6</sup> All rates were rounded to the nearest whole number; therefore, rates that appear to be the same may differ by a fractional amount. Rate change percentages were calculated before rates were rounded and may differ slightly from rate change percentages calculated from rates rounded to the nearest whole number.

- **Age-specific death rate:** The number of deaths in a specific age group divided by the population at risk in that age group.
- **Death rate:** The number of deaths divided by the population at risk. Death rates make comparisons between different population groups more meaningful than frequencies alone. This type of rate is also called the crude death rate.
- **Health District:** Using census tract boundaries, the County is divided into 26 health districts that are responsible for planning and providing public health services according to the health needs of the local communities (Appendix 3).

- **Median:** The midpoint of a set of values; the point at which, when the values are put in numerical order, half of the values fall above and half fall below. The median of 25, 27, 28, 36, and 41 is 28.

- **Service Planning Area (SPA):** Health districts are aggregated to form service planning areas. The County is divided into eight service planning areas (Appendices 3 and 4).

**Note:** From 2001–2009, the population of the County was estimated to increase each year, but the 2010 Census enumeration resulted in a 5.7% *reduction* in the County population compared with the estimate for 2009. The population for prior years (2001–2008) was likely overestimated as well. Because the 2009 population was overestimated, the death rates shown for 2009 underestimate the true rates. The rates for prior years may also underestimate the true rates but likely to a lesser degree. Changes in death rates from 2009 to 2010 should be interpreted with caution. Most apparent increases in rates from 2009 to 2010 are likely to be artifactual.

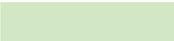
The decennial census is the basis for annual estimates of the total population of Los Angeles County, the population groups used in this report, and the standard population used for age adjustment. The decennial census may not accurately count every resident of the County, and some groups may experience less accurate enumeration than others. Following the decennial census, statistical methods are used to estimate the population for the years between the censuses. This may also result in inaccuracies that ultimately affect the crude and adjusted death rates.

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<sup>6</sup> Hoyert DL, Heron MP, Murphy SL, Kung H. Deaths: Final Data for 2003. National vital statistics reports; vol 54 no 13. Hyattsville, MD: National Center for Health Statistics. 2006.

### USER'S GUIDE TO COLOR

To make the figures easier to understand and interpret, color codes have been used throughout the report. To make it easier to see the overall impact of cancer, the same color is used for all cancers regardless of the type. All unintentional injuries (accidents), such as drug overdoses or motor vehicle crashes, also have the same color code.

|   |  |
|---|--|
|    | Coronary heart disease                                 |
|    | Stroke   |
|    | Cancer   |
|    | Emphysema/chronic obstructive pulmonary disease (COPD) |
|    | Pneumonia/influenza                                    |
|    | Diabetes   |
|    | Alzheimer's disease                                    |
|    | Homicide   |
|   | Unintentional injury (accident)                        |
|  | Self-inflicted injury (suicide)                        |
|  | Liver disease  |
|  | Human immunodeficiency virus (HIV)                     |
|  | Birth defect   |
|  | Perinatal period condition                             |
|  | Other conditions                                       |

### HOW TO GET MORE INFORMATION

L.A. HealthDataNow! is an online query system to facilitate access to County mortality data. Users can query the system to obtain mortality statistics by cause of death, demographic group, and geographic area within the County. The system is accessible at <http://dqs.publichealth.lacounty.gov/>.

## User's Guide

The following series of figures compares the 10 leading causes of death with the 10 leading causes of premature death (death before age 75) for the County overall and selected population groups. These figures are designed to facilitate comparisons within population groups. Other figures are designed to facilitate comparisons between population groups.

**A** The 10 leading causes of death are shown from highest (top) to lowest (bottom) based on the number of deaths from each cause.

**B** The 10 leading causes of premature death are shown from highest (top) to lowest (bottom) based on the number of years of life lost before age 75 from each cause.

- 1 The cause of death group coded by color (see Page 7).
- 2 The number of deaths due to the specific cause; e.g., there were 12,635 deaths from coronary heart disease and 2,622 deaths from emphysema/COPD.
- 3 The premature death rank for this cause of death; e.g., liver disease was the ninth-ranked cause of death (1,171 deaths), but was the fifth-ranked cause of premature death (19,425 years of life lost before age 75).
- 4 The cause of premature death group coded by color (see Page 7).
- 5 The total years of life lost before age 75 for the specific cause of death.
- 6 The death rank for this cause of premature death; e.g., stroke was the eighth-ranked cause of premature death, resulting in 14,709 years of life lost before age 75, but was the second-ranked cause of death (3,278 deaths).

| A                       |                        |               |                      | B                                 |                        |                    |            |
|-------------------------|------------------------|---------------|----------------------|-----------------------------------|------------------------|--------------------|------------|
| Leading causes of death |                        |               |                      | Leading causes of premature death |                        |                    |            |
| Rank                    | Cause of death         | No. of deaths | Premature death rank | Rank                              | Cause of death         | Years of life lost | Death rank |
| 1                       | Coronary heart disease | 12,635        | 1.                   | 1                                 | Coronary heart disease | 57,607             | 1.         |
| 2                       | Stroke                 | 3,278         | 8.                   | 2                                 | Homicide               | 28,442             | 17.        |
| 3                       | Lung cancer            | 2,941         | 7.                   | 3                                 | Suicide                | 22,390             | 14.        |
| 4                       | Emphysema/COPD         | 2,622         | 15.                  | 4                                 | Motor vehicle crash    | 19,750             | 18.        |
| 5                       | Alzheimer's disease    | 2,242         | 45.                  | 5                                 | Liver disease          | 19,425             | 9.         |
| 6                       | Pneumonia/influenza    | 1,964         | 21.                  | 6                                 | Drug overdose          | 18,652             | 19.        |
| 7                       | Diabetes               | 1,894         | 10.                  | 7                                 | Lung cancer            | 18,100             | 3.         |
| 8                       | Colorectal cancer      | 1,285         | 11.                  | 8                                 | Stroke                 | 14,709             | 2.         |
| 9                       | Liver disease          | 1,171         | 5.                   | 9                                 | Breast cancer          | 12,999             | 10.        |
| 10                      | Breast cancer          | 1,116         | 9.                   | 10                                | Diabetes               | 12,221             | 7.         |

**Figure 1.** Ten leading causes of death and premature death

**Los Angeles County**  
56,538 total deaths  
430,926 years of life lost\*

| Leading causes of death |                        |               |                      | Leading causes of premature** death |                        |                     |            |
|-------------------------|------------------------|---------------|----------------------|-------------------------------------|------------------------|---------------------|------------|
| Rank                    | Cause of death         | No. of deaths | Premature death rank | Rank                                | Cause of death         | Years of life lost* | Death rank |
| 1.                      | Coronary heart disease | 12,635        | 1.                   | 1.                                  | Coronary heart disease | 57,607              | 1.         |
| 2.                      | Stroke                 | 3,278         | 8.                   | 2.                                  | Homicide               | 28,442              | 17.        |
| 3.                      | Lung cancer            | 2,941         | 7.                   | 3.                                  | Suicide                | 22,390              | 14.        |
| 4.                      | Emphysema/COPD         | 2,622         | 15.                  | 4.                                  | Motor vehicle crash    | 19,750              | 18.        |
| 5.                      | Alzheimer's disease    | 2,242         | 45.                  | 5.                                  | Liver disease          | 19,425              | 9.         |
| 6.                      | Pneumonia/influenza    | 1,964         | 21.                  | 6.                                  | Drug overdose          | 18,652              | 19.        |
| 7.                      | Diabetes               | 1,894         | 10.                  | 7.                                  | Lung cancer            | 18,100              | 3.         |
| 8.                      | Colorectal cancer      | 1,285         | 11.                  | 8.                                  | Stroke                 | 14,709              | 2.         |
| 9.                      | Liver disease          | 1,171         | 5.                   | 9.                                  | Breast cancer          | 12,999              | 10.        |
| 10.                     | Breast cancer          | 1,116         | 9.                   | 10.                                 | Diabetes               | 12,221              | 7.         |

\*Excludes infants less than 1 year of age and persons of unknown age.

\*\*Death before age 75 years.

- There were almost four times more deaths from coronary heart disease (12,635 deaths) than there were from stroke (3,278 deaths), the second-leading cause of death.
- Together, cancer and coronary heart disease caused nearly half (47%) of all the deaths. All cancers combined (13,860 deaths) caused more deaths than coronary heart disease (12,635 deaths).
- Injuries (accidents [1,910 deaths], suicide [792 deaths], and homicide [651 deaths]) caused 23% of the years of life lost, but only 6% of the deaths, highlighting the dramatic impact of injuries, which are largely preventable, on premature death.
- Alzheimer's disease was an increasingly important cause of death, although it had limited impact on premature death.

**Figure 2.** Ten leading causes of death and premature death, by gender

| <b>Males</b>                |                        |                                     |                      | <b>Females</b>              |                        |                                     |            |
|-----------------------------|------------------------|-------------------------------------|----------------------|-----------------------------|------------------------|-------------------------------------|------------|
| 28,772 total deaths         |                        |                                     |                      | 27,766 total deaths         |                        |                                     |            |
| 278,268 years of life lost* |                        |                                     |                      | 152,658 years of life lost* |                        |                                     |            |
| Leading causes of death     |                        | Leading causes of premature** death |                      | Leading causes of death     |                        | Leading causes of premature** death |            |
| Rank                        | Cause of death         | No. of deaths                       | Premature death rank | Rank                        | Cause of death         | Years of life lost*                 | Death rank |
| 1.                          | Coronary heart disease | 6,651                               | 1.                   | 1.                          | Coronary heart disease | 42,703                              | 1.         |
| 2.                          | Lung cancer            | 1,602                               | 7.                   | 2.                          | Homicide               | 24,589                              | 12.        |
| 3.                          | Stroke                 | 1,405                               | 8.                   | 3.                          | Suicide                | 17,674                              | 11.        |
| 4.                          | Emphysema/COPD         | 1,246                               | 14.                  | 4.                          | Motor vehicle crash    | 14,538                              | 17.        |
| 5.                          | Diabetes               | 993                                 | 9.                   | 5.                          | Liver disease          | 13,806                              | 7.         |
| 6.                          | Pneumonia/influenza    | 910                                 | 21.                  | 6.                          | Drug overdose          | 13,668                              | 16.        |
| 7.                          | Liver disease          | 787                                 | 5.                   | 7.                          | Lung cancer            | 10,545                              | 2.         |
| 8.                          | Prostate cancer        | 766                                 | 25.                  | 8.                          | Stroke                 | 8,238                               | 3.         |
| 9.                          | Alzheimer's disease    | 751                                 | 44.                  | 9.                          | Diabetes               | 7,451                               | 5.         |
| 10.                         | Colorectal cancer      | 663                                 | 11.                  | 10.                         | HIV                    | 6,137                               | 24.        |

| <b>Males</b>                |                        |                                     |                      | <b>Females</b>              |                        |                                     |            |
|-----------------------------|------------------------|-------------------------------------|----------------------|-----------------------------|------------------------|-------------------------------------|------------|
| 28,772 total deaths         |                        |                                     |                      | 27,766 total deaths         |                        |                                     |            |
| 278,268 years of life lost* |                        |                                     |                      | 152,658 years of life lost* |                        |                                     |            |
| Leading causes of death     |                        | Leading causes of premature** death |                      | Leading causes of death     |                        | Leading causes of premature** death |            |
| Rank                        | Cause of death         | No. of deaths                       | Premature death rank | Rank                        | Cause of death         | Years of life lost*                 | Death rank |
| 1.                          | Coronary heart disease | 5,984                               | 1.                   | 1.                          | Coronary heart disease | 14,904                              | 1.         |
| 2.                          | Stroke                 | 1,873                               | 4.                   | 2.                          | Breast cancer          | 12,955                              | 6.         |
| 3.                          | Alzheimer's disease    | 1,491                               | 41.                  | 3.                          | Lung cancer            | 7,555                               | 5.         |
| 4.                          | Emphysema/COPD         | 1,376                               | 15.                  | 4.                          | Stroke                 | 6,471                               | 2.         |
| 5.                          | Lung cancer            | 1,339                               | 3.                   | 5.                          | Liver disease          | 5,619                               | 14.        |
| 6.                          | Breast cancer          | 1,109                               | 2.                   | 6.                          | Motor vehicle crash    | 5,212                               | 21.        |
| 7.                          | Pneumonia/influenza    | 1,054                               | 22.                  | 7.                          | Drug overdose          | 4,984                               | 22.        |
| 8.                          | Diabetes               | 901                                 | 8.                   | 8.                          | Diabetes               | 4,770                               | 8.         |
| 9.                          | Colorectal cancer      | 622                                 | 10.                  | 9.                          | Suicide                | 4,716                               | 26.        |
| 10.                         | Hypertension           | 547                                 | 24.                  | 10.                         | Colorectal cancer      | 4,208                               | 9.         |

\*Excludes infants less than 1 year of age and persons of unknown age.

\*\*Death before age 75 years.

**Figure 3.** Ten leading causes of death and premature death, by race/ethnicity

| <b>White</b><br>28,738 total deaths<br>148,194 years of life lost* |                        |               |                      | <b>Hispanic</b><br>13,751 total deaths<br>164,932 years of life lost* |                        |                     |            |
|--|------------------------|---------------|----------------------|---|------------------------|---------------------|------------|
| Leading causes of death  |                        |               |                      | Leading causes of premature** death                                   |                        |                     |            |
| Rank   | Cause of death         | No. of deaths | Premature death rank | Rank  | Cause of death         | Years of life lost* | Death rank |
| 1.   | Coronary heart disease | 6,845         | 1.                   | 1.  | Coronary heart disease | 24,294              | 1.         |
| 2.   | Emphysema/COPD         | 1,743         | 8.                   | 2.  | Suicide                | 9,697               | 12.        |
| 3.   | Lung cancer            | 1,655         | 4.                   | 3.  | Drug overdose          | 9,485               | 18.        |
| 4.   | Stroke                 | 1,534         | 10.                  | 4.  | Lung cancer            | 8,761               | 3.         |
| 5.   | Alzheimer's disease    | 1,509         | 40.                  | 5.  | Liver disease          | 6,365               | 13.        |
| 6.   | Pneumonia/influenza    | 1,011         | 20.                  | 6.  | Motor vehicle crash    | 5,160               | 25.        |
| 7.   | Diabetes               | 667           | 11.                  | 7.  | Breast cancer          | 4,873               | 9.         |
| 8.   | Colorectal cancer      | 619           | 9.                   | 8.  | Emphysema/COPD         | 3,888               | 2.         |
| 9.   | Breast cancer          | 534           | 7.                   | 9.  | Colorectal cancer      | 3,766               | 8.         |
| 10.  | Pancreatic cancer      | 487           | 12.                  | 10.   | Stroke                 | 3,737               | 4.         |

| <b>White</b><br>28,738 total deaths<br>148,194 years of life lost* |                        |               |                      | <b>Hispanic</b><br>13,751 total deaths<br>164,932 years of life lost* |                        |                     |            |
|--|------------------------|---------------|----------------------|---|------------------------|---------------------|------------|
| Leading causes of death  |                        |               |                      | Leading causes of premature** death                                   |                        |                     |            |
| Rank   | Cause of death         | No. of deaths | Premature death rank | Rank  | Cause of death         | Years of life lost* | Death rank |
| 1.   | Coronary heart disease | 2,555         | 1.                   | 1.  | Coronary heart disease | 16,145              | 1.         |
| 2.   | Stroke                 | 780           | 7.                   | 2.  | Homicide               | 15,301              | 9.         |
| 3.   | Diabetes               | 690           | 8.                   | 3.  | Motor vehicle crash    | 10,795              | 12.        |
| 4.   | Liver disease          | 587           | 4.                   | 4.  | Liver disease          | 10,262              | 4.         |
| 5.   | Lung cancer            | 441           | 12.                  | 5.  | Suicide                | 7,943               | 18.        |
| 6.   | Pneumonia/influenza    | 399           | 22.                  | 6.  | Drug overdose          | 6,284               | 20.        |
| 7.   | Alzheimer's disease    | 376           | 51.                  | 7.  | Stroke                 | 5,453               | 2.         |
| 8.   | Emphysema/COPD         | 345           | 28.                  | 8.  | Diabetes               | 5,225               | 3.         |
| 9.   | Homicide               | 328           | 2.                   | 9.  | Leukemia               | 3,760               | 22.        |
| 10.  | Nephritis              | 306           | 18.                  | 10.   | Breast cancer          | 3,568               | 14.        |

**Black**  
7,438 total deaths  
77,763 years of life lost\*

| Leading causes of death |                        |               |                      | Leading causes of premature** death |                        |                     |            |
|-------------------------|------------------------|---------------|----------------------|-------------------------------------|------------------------|---------------------|------------|
| Rank                    | Cause of death         | No. of deaths | Premature death rank | Rank                                | Cause of death         | Years of life lost* | Death rank |
| 1.                      | Coronary heart disease | 1,721         | 1.                   | 1.                                  | Coronary heart disease | 12,080              | 1.         |
| 2.                      | Stroke                 | 446           | 4.                   | 2.                                  | Homicide               | 9,737               | 7.         |
| 3.                      | Lung cancer            | 433           | 3.                   | 3.                                  | Lung cancer            | 3,389               | 3.         |
| 4.                      | Diabetes               | 294           | 7.                   | 4.                                  | Stroke                 | 3,252               | 2.         |
| 5.                      | Emphysema/COPD         | 289           | 13.                  | 5.                                  | Motor vehicle crash    | 2,547               | 19.        |
| 6.                      | Pneumonia/influenza    | 247           | 18.                  | 6.                                  | Breast cancer          | 2,523               | 9.         |
| 7.                      | Homicide               | 219           | 2.                   | 7.                                  | Diabetes               | 2,509               | 4.         |
| 8.                      | Colorectal cancer      | 195           | 11.                  | 8.                                  | Drug overdose          | 2,475               | 16.        |
| 9.                      | Breast cancer          | 189           | 6.                   | 9.                                  | HIV                    | 1,980               | 17.        |
| 10.                     | Alzheimer's disease    | 186           | 48.                  | 10.                                 | Suicide                | 1,920               | 24.        |

**Asian/Pacific Islander**  
6,343 total deaths  
37,472 years of life lost\*

| Leading causes of death |                        |               |                      | Leading causes of premature** death |                        |                     |            |
|-------------------------|------------------------|---------------|----------------------|-------------------------------------|------------------------|---------------------|------------|
| Rank                    | Cause of death         | No. of deaths | Premature death rank | Rank                                | Cause of death         | Years of life lost* | Death rank |
| 1.                      | Coronary heart disease | 1,451         | 1.                   | 1.                                  | Coronary heart disease | 4,734               | 1.         |
| 2.                      | Stroke                 | 501           | 4.                   | 2.                                  | Suicide                | 2,657               | 15.        |
| 3.                      | Lung cancer            | 400           | 3.                   | 3.                                  | Lung cancer            | 2,415               | 3.         |
| 4.                      | Pneumonia/influenza    | 296           | 19.                  | 4.                                  | Stroke                 | 2,182               | 2.         |
| 5.                      | Diabetes               | 237           | 12.                  | 5.                                  | Breast cancer          | 1,966               | 10.        |
| 6.                      | Emphysema/COPD         | 229           | 34.                  | 6.                                  | Colorectal cancer      | 1,538               | 8.         |
| 7.                      | Liver cancer           | 187           | 7.                   | 7.                                  | Liver cancer           | 1,403               | 7.         |
| 8.                      | Colorectal cancer      | 173           | 6.                   | 8.                                  | Motor vehicle crash    | 1,196               | 18.        |
| 9.                      | Alzheimer's disease    | 167           | 46.                  | 9.                                  | Homicide               | 867                 | 32.        |
| 10.                     | Breast cancer          | 138           | 5.                   | 10.                                 | Leukemia               | 833                 | 17.        |

\*Excludes infants less than 1 year of age and persons of unknown age.

\*\*Death before age 75 years.

Figure 4. Comparison of the leading causes of death and premature death, by race/ethnicity

### Leading causes of death

| Race/ethnicity<br>Number of deaths<br>Age-adjusted death rate | #1 cause<br>Number of deaths<br>Age-adjusted death rate    | #2 cause<br>Number of deaths<br>Age-adjusted death rate | #3 cause<br>Number of deaths<br>Age-adjusted death rate | #4 cause<br>Number of deaths<br>Age-adjusted death rate | #5 cause<br>Number of deaths<br>Age-adjusted death rate |
|---|--|---|---|---|---|
| <b>White</b><br>28,738<br>667 per 100,000                     | <b>Coronary heart disease</b><br>6,845<br>151 per 100,000  | <b>Emphysema/COPD</b><br>1,743<br>40 per 100,000        | <b>Lung cancer</b><br>1,655<br>40 per 100,000           | <b>Stroke</b><br>1,534<br>34 per 100,000                | <b>Alzheimer's disease</b><br>1,509<br>31 per 100,000   |
| <b>Hispanic</b><br>13,751<br>529 per 100,000                  | <b>Coronary heart disease</b><br>2,555<br>111 per 100,000  | <b>Stroke</b><br>780<br>34 per 100,000                  | <b>Diabetes</b><br>690<br>29 per 100,000                | <b>Liver disease</b><br>587<br>18 per 100,000           | <b>Lung cancer</b><br>441<br>18 per 100,000             |
| <b>Black</b><br>7,438<br>891 per 100,000                      | <b>Coronary heart disease</b><br>1,721<br>208 per 100,000  | <b>Stroke</b><br>446<br>54 per 100,000                  | <b>Lung cancer</b><br>433<br>51 per 100,000             | <b>Diabetes</b><br>294<br>35 per 100,000                | <b>Emphysema/COPD</b><br>289<br>35 per 100,000          |
| <b>Asian/Pacific Islander</b><br>6,343<br>429 per 100,000     | <b>Coronary heart disease</b><br>1,451<br>98 per 100,000   | <b>Stroke</b><br>501<br>34 per 100,000                  | <b>Lung cancer</b><br>400<br>27 per 100,000             | <b>Pneumonia/influenza</b><br>296<br>21 per 100,000     | <b>Diabetes</b><br>237<br>16 per 100,000                |
| <b>Los Angeles County Total</b><br>56,538<br>615 per 100,000  | <b>Coronary heart disease</b><br>12,635<br>138 per 100,000 | <b>Stroke</b><br>3,278<br>36 per 100,000                | <b>Lung cancer</b><br>2,941<br>33 per 100,000           | <b>Emphysema/COPD</b><br>2,622<br>30 per 100,000        | <b>Alzheimer's disease</b><br>2,242<br>25 per 100,000   |

### Leading causes of premature death (before age 75 years)

| Race/ethnicity                  | #1 cause               | #2 cause | #3 cause            | #4 cause            | #5 cause            |
|---------------------------------|------------------------|----------|---------------------|---------------------|---------------------|
| <b>White</b>                    | Coronary heart disease | Suicide  | Drug overdose       | Lung cancer         | Liver disease       |
| <b>Hispanic</b>                 | Coronary heart disease | Homicide | Motor vehicle crash | Liver disease       | Suicide             |
| <b>Black</b>                    | Coronary heart disease | Homicide | Lung cancer         | Stroke              | Motor vehicle crash |
| <b>Asian/Pacific Islander</b>   | Coronary heart disease | Suicide  | Lung cancer         | Stroke              | Breast cancer       |
| <b>Los Angeles County Total</b> | Coronary heart disease | Homicide | Suicide             | Motor vehicle crash | Liver disease       |

Notes: Los Angeles County Total includes persons of other or unknown race/ethnicity.

Figure 5. Comparison of the leading causes of death and premature death for males, by race/ethnicity

**Males: Leading causes of death**

| Race/ethnicity<br>Number of deaths<br>Age-adjusted death rate | #1 cause<br>Number of deaths<br>Age-adjusted death rate | #2 cause<br>Number of deaths<br>Age-adjusted death rate | #3 cause<br>Number of deaths<br>Age-adjusted death rate | #4 cause<br>Number of deaths<br>Age-adjusted death rate | #5 cause<br>Number of deaths<br>Age-adjusted death rate |
|---|---|---|---|---|---|
| <b>White</b><br>14,184<br>783 per 100,000                     | Coronary heart disease<br>3,566<br>192 per 100,000      | Lung cancer<br>855<br>47 per 100,000                    | Emphysema/COPD<br>762<br>42 per 100,000                 | Stroke<br>629<br>35 per 100,000                         | Alzheimer's disease<br>510<br>28 per 100,000            |
| <b>Hispanic</b><br>7,448<br>644 per 100,000                   | Coronary heart disease<br>1,372<br>138 per 100,000      | Liver disease<br>423<br>29 per 100,000                  | Diabetes<br>356<br>34 per 100,000                       | Stroke<br>346<br>35 per 100,000                         | Homicide<br>288<br>11 per 100,000                       |
| <b>Black</b><br>3,704<br>1,087 per 100,000                    | Coronary heart disease<br>898<br>273 per 100,000        | Lung cancer<br>228<br>66 per 100,000                    | Homicide<br>186<br>45 per 100,000                       | Stroke<br>179<br>56 per 100,000                         | Emphysema/COPD<br>161<br>50 per 100,000                 |
| <b>Asian/Pacific Islander</b><br>3,277<br>532 per 100,000     | Coronary heart disease<br>776<br>128 per 100,000        | Lung cancer<br>249<br>39 per 100,000                    | Stroke<br>243<br>40 per 100,000                         | Pneumonia/influenza<br>155<br>27 per 100,000            | Emphysema/COPD<br>138<br>24 per 100,000                 |
| <b>All males</b><br>28,772<br>739 per 100,000                 | Coronary heart disease<br>6,651<br>175 per 100,000      | Lung cancer<br>1,602<br>41 per 100,000                  | Stroke<br>1,405<br>38 per 100,000                       | Emphysema/COPD<br>1,246<br>35 per 100,000               | Diabetes<br>993<br>26 per 100,000                       |

**Males: Leading causes of premature death (before age 75 years)**

| Race/ethnicity                | #1 cause               | #2 cause               | #3 cause            | #4 cause            | #5 cause      |
|-------------------------------|------------------------|------------------------|---------------------|---------------------|---------------|
| <b>White</b>                  | Coronary heart disease | Suicide                | Drug overdose       | Lung cancer         | Liver disease |
| <b>Hispanic</b>               | Homicide               | Coronary heart disease | Motor vehicle crash | Liver disease       | Suicide       |
| <b>Black</b>                  | Homicide               | Coronary heart disease | Motor vehicle crash | Lung cancer         | HIV           |
| <b>Asian/Pacific Islander</b> | Coronary heart disease | Suicide                | Lung cancer         | Stroke              | Liver cancer  |
| <b>All males</b>              | Coronary heart disease | Homicide               | Suicide             | Motor vehicle crash | Liver disease |

Notes: All males includes persons of other or unknown race/ethnicity.

**Figure 6.** Comparison of the leading causes of death and premature death for females, by race/ethnicity

### Females: Leading causes of death

| Race/ethnicity<br>Number of deaths<br>Age-adjusted death rate | #1 cause<br>Number of deaths<br>Age-adjusted death rate   | #2 cause<br>Number of deaths<br>Age-adjusted death rate | #3 cause<br>Number of deaths<br>Age-adjusted death rate | #4 cause<br>Number of deaths<br>Age-adjusted death rate | #5 cause<br>Number of deaths<br>Age-adjusted death rate |
|---|---|---|---|---|---|
| <b>White</b><br>14,554<br>568 per 100,000                     | <b>Coronary heart disease</b><br>3,279<br>116 per 100,000 | <b>Alzheimer's disease</b><br>999<br>32 per 100,000     | <b>Emphysema/COPD</b><br>981<br>38 per 100,000          | <b>Stroke</b><br>905<br>32 per 100,000                  | <b>Lung cancer</b><br>800<br>35 per 100,000             |
| <b>Hispanic</b><br>6,303<br>440 per 100,000                   | <b>Coronary heart disease</b><br>1,183<br>90 per 100,000  | <b>Stroke</b><br>434<br>32 per 100,000                  | <b>Diabetes</b><br>334<br>24 per 100,000                | <b>Breast cancer</b><br>247<br>15 per 100,000           | <b>Alzheimer's disease</b><br>243<br>20 per 100,000     |
| <b>Black</b><br>3,734<br>748 per 100,000                      | <b>Coronary heart disease</b><br>823<br>163 per 100,000   | <b>Stroke</b><br>267<br>53 per 100,000                  | <b>Lung cancer</b><br>205<br>41 per 100,000             | <b>Breast cancer</b><br>187<br>36 per 100,000           | <b>Pneumonia/influenza</b><br>156<br>31 per 100,000     |
| <b>Asian/Pacific Islander</b><br>3,066<br>354 per 100,000     | <b>Coronary heart disease</b><br>675<br>77 per 100,000    | <b>Stroke</b><br>258<br>30 per 100,000                  | <b>Lung cancer</b><br>151<br>18 per 100,000             | <b>Pneumonia/influenza</b><br>141<br>16 per 100,000     | <b>Breast cancer</b><br>137<br>15 per 100,000           |
| <b>All females</b><br>27,766<br>517 per 100,000               | <b>Coronary heart disease</b><br>5,984<br>108 per 100,000 | <b>Stroke</b><br>1,873<br>34 per 100,000                | <b>Alzheimer's disease</b><br>1,491<br>26 per 100,000   | <b>Emphysema/COPD</b><br>1,376<br>26 per 100,000        | <b>Lung cancer</b><br>1,339<br>26 per 100,000           |

### Females: Leading causes of premature death (before age 75 years)

| Race/ethnicity                | #1 cause               | #2 cause               | #3 cause            | #4 cause      | #5 cause      |
|-------------------------------|------------------------|------------------------|---------------------|---------------|---------------|
| <b>White</b>                  | Coronary heart disease | Breast cancer          | Lung cancer         | Drug overdose | Suicide       |
| <b>Hispanic</b>               | Coronary heart disease | Breast cancer          | Motor vehicle crash | Liver disease | Stroke        |
| <b>Black</b>                  | Coronary heart disease | Breast cancer          | Stroke              | Lung cancer   | Homicide      |
| <b>Asian/Pacific Islander</b> | Breast cancer          | Coronary heart disease | Stroke              | Lung cancer   | Suicide       |
| <b>All females</b>            | Coronary heart disease | Breast cancer          | Lung cancer         | Stroke        | Liver disease |

Notes: All females includes persons of other or unknown race/ethnicity.

Figure 7. Comparison of the leading causes of death, by age group

**Leading causes of death**

| Age group<br>Number of deaths<br>Age-specific death rate       | #1 cause<br>Number of deaths<br>Age-specific death rate     | #2 cause<br>Number of deaths<br>Age-specific death rate | #3 cause<br>Number of deaths<br>Age-specific death rate | #4 cause<br>Number of deaths<br>Age-specific death rate | #5 cause<br>Number of deaths<br>Age-specific death rate |
|--|---|---|---|---|---|
| <b>&lt;1 year old</b><br>617<br>480 per 100,000                | <b>Low birthweight/prematurity</b><br>103<br>80 per 100,000 | <b>SIDS*</b><br>60<br>47 per 100,000                    | <b>Heart defect</b><br>34<br>26 per 100,000             | <b>Pregnancy complication</b><br>33<br>26 per 100,000   | <b>Delivery complication</b><br>24<br>19 per 100,000    |
| <b>1-4 years old</b><br>106<br>20 per 100,000                  | <b>Birth defect</b><br>24<br>5 per 100,000                  | <b>Drowning</b><br>10<br>--                             | <b>Homicide</b><br>10<br>--                             | <b>Motor vehicle crash</b><br>7<br>--                   | <b>Falls</b><br>6<br>--                                 |
| <b>5-14 years old</b><br>160<br>12 per 100,000                 | <b>Leukemia</b><br>20<br>2 per 100,000                      | <b>Motor vehicle crash</b><br>19<br>--                  | <b>Birth defect</b><br>16<br>--                         | <b>Homicide</b><br>14<br>--                             | <b>Brain/CNS† cancer</b><br>12<br>--                    |
| <b>15-24 years old</b><br>780<br>52 per 100,000                | <b>Homicide</b><br>241<br>16 per 100,000                    | <b>Motor vehicle crash</b><br>116<br>8 per 100,000      | <b>Suicide</b><br>89<br>6 per 100,000                   | <b>Drug overdose</b><br>57<br>4 per 100,000             | <b>Leukemia</b><br>24<br>2 per 100,000                  |
| <b>25-44 years old</b><br>2,806<br>96 per 100,000              | <b>Suicide</b><br>272<br>9 per 100,000                      | <b>Homicide</b><br>269<br>9 per 100,000                 | <b>Drug overdose</b><br>217<br>7 per 100,000            | <b>Coronary heart disease</b><br>192<br>7 per 100,000   | <b>Motor vehicle crash</b><br>180<br>6 per 100,000      |
| <b>45-64 years old</b><br>11,406<br>478 per 100,000            | <b>Coronary heart disease</b><br>2,249<br>94 per 100,000    | <b>Lung cancer</b><br>700<br>29 per 100,000             | <b>Liver disease</b><br>655<br>27 per 100,000           | <b>Breast cancer</b><br>490<br>21 per 100,000           | <b>Stroke</b><br>478<br>20 per 100,000                  |
| <b>65-74 years old</b><br>8,765<br>1,541 per 100,000           | <b>Coronary heart disease</b><br>1,844<br>324 per 100,000   | <b>Lung cancer</b><br>812<br>143 per 100,000            | <b>Emphysema/COPD</b><br>492<br>87 per 100,000          | <b>Stroke</b><br>443<br>78 per 100,000                  | <b>Diabetes</b><br>404<br>71 per 100,000                |
| <b>75+ years old</b><br>31,889<br>6,411 per 100,000            | <b>Coronary heart disease</b><br>8,345<br>1,678 per 100,000 | <b>Stroke</b><br>2,262<br>455 per 100,000               | <b>Alzheimer's disease</b><br>2,132<br>429 per 100,000  | <b>Emphysema/COPD</b><br>1,883<br>379 per 100,000       | <b>Pneumonia/influenza</b><br>1,557<br>313 per 100,000  |
| <b>Los Angeles County Total</b><br>56,538<br>615 per 100,000** | <b>Coronary heart disease</b><br>12,635<br>138 per 100,000  | <b>Stroke</b><br>3,278<br>36 per 100,000                | <b>Lung cancer</b><br>2,941<br>33 per 100,000           | <b>Emphysema/COPD</b><br>2,622<br>30 per 100,000        | <b>Alzheimer's disease</b><br>2,242<br>25 per 100,000   |

Notes: Los Angeles County Total includes persons of unknown age.

\*Sudden Infant Death Syndrome.

†Central Nervous System.

\*\*Age-adjusted rate.

--Number of deaths is too small to calculate a reliable rate.

Figure 8. Leading causes of death for males, by age group and race/ethnicity

|              |                                    | Race/ethnicity<br>Deaths from all causes | #1 Cause<br>Number of deaths      | #2 Cause<br>Number of deaths | #3 Cause<br>Number of deaths |
|--------------|------------------------------------|--|-----------------------------------|------------------------------|------------------------------|
| <b>Males</b> | <b>0-14 years</b><br>506 deaths    | <b>White</b><br>77                       | Perinatal period condition<br>31  | Birth defect<br>15           | Brain/CNS* cancer<br><5      |
|              |                                    | <b>Hispanic</b><br>310                   | Perinatal period condition<br>110 | Birth defect<br>63           | Leukemia<br>12               |
|              |                                    | <b>Black</b><br>82                       | Perinatal period condition<br>34  | Birth defect<br>7            | Homicide<br><5               |
|              |                                    | <b>Asian/Pacific Islander</b><br>35      | Perinatal period condition<br>15  | Birth defect<br>5            | Leukemia<br><5               |
|              | <b>15-24 years</b><br>607 deaths   | <b>White</b><br>105                      | Drug overdose<br>29               | Motor vehicle crash<br>17    | Suicide<br>9                 |
|              |                                    | <b>Hispanic</b><br>346                   | Homicide<br>130                   | Motor vehicle crash<br>56    | Suicide<br>44                |
|              |                                    | <b>Black</b><br>121                      | Homicide<br>77                    | Motor vehicle crash<br>13    | Suicide<br>9                 |
|              |                                    | <b>Asian/Pacific Islander</b><br>32      | Homicide<br>6                     | Suicide<br>6                 | Motor vehicle crash<br><5    |
|              | <b>25-44 years</b><br>1,923 deaths | <b>White</b><br>518                      | Suicide<br>89                     | Drug overdose<br>71          | Coronary heart disease<br>42 |
|              |                                    | <b>Hispanic</b><br>969                   | Homicide<br>117                   | Suicide<br>90                | Motor vehicle crash<br>80    |
|              |                                    | <b>Black</b><br>297                      | Homicide<br>79                    | Coronary heart disease<br>29 | Motor vehicle crash<br>22    |
|              |                                    | <b>Asian/Pacific Islander</b><br>128     | Suicide<br>22                     | Coronary heart disease<br>15 | Motor vehicle crash<br>8     |
|              | <b>45-64 years</b><br>7,021 deaths | <b>White</b><br>3,010                    | Coronary heart disease<br>797     | Lung cancer<br>218           | Liver disease<br>167         |
|              |                                    | <b>Hispanic</b><br>2,106                 | Coronary heart disease<br>431     | Liver disease<br>233         | Diabetes<br>111              |
|              |                                    | <b>Black</b><br>1,208                    | Coronary heart disease<br>302     | Lung cancer<br>72            | Stroke<br>51                 |
|              |                                    | <b>Asian/Pacific Islander</b><br>647     | Coronary heart disease<br>131     | Lung cancer<br>63            | Liver cancer<br>50           |

|                                    |  |                                 |                       |                            |
|------------------------------------|--|---------------------------------|-----------------------|----------------------------|
| <b>65-74 years</b><br>4,936 deaths | <b>White</b><br>2,348                  | Coronary heart disease<br>554   | Lung cancer<br>236    | Emphysema/COPD<br>168      |
|                                    | <b>Hispanic</b><br>1,209               | Coronary heart disease<br>273   | Diabetes<br>92        | Liver disease<br>76        |
|                                    | <b>Black</b><br>750                    | Coronary heart disease<br>202   | Lung cancer<br>83     | Emphysema/COPD<br>48       |
|                                    | <b>Asian/Pacific Islander</b><br>593   | Coronary heart disease<br>130   | Lung cancer<br>76     | Stroke<br>40               |
| <b>75+ years</b><br>13,775 deaths  | <b>White</b><br>8,125                  | Coronary heart disease<br>2,172 | Emphysema/COPD<br>505 | Alzheimer's disease<br>473 |
|                                    | <b>Hispanic</b><br>2,508               | Coronary heart disease<br>604   | Stroke<br>162         | Diabetes<br>134            |
|                                    | <b>Black</b><br>1,246                  | Coronary heart disease<br>364   | Prostate cancer<br>80 | Stroke<br>77               |
|                                    | <b>Asian/Pacific Islander</b><br>1,842 | Coronary heart disease<br>500   | Stroke<br>150         | Pneumonia/influenza<br>126 |

Notes: In each age group, the number of deaths from all causes includes persons of other or unknown race/ethnicity.

\*Central Nervous System

Figure 9. Leading causes of death for females, by age group and race/ethnicity

|         |                             | Race/ethnicity<br>Deaths from all causes | #1 Cause<br>Number of deaths     | #2 Cause<br>Number of deaths    | #3 Cause<br>Number of deaths |
|---------|-----------------------------|--|----------------------------------|---------------------------------|------------------------------|
| Females | 0-14 years<br>377 deaths    | White<br>60                              | Perinatal period condition<br>23 | Birth defect<br>11              | Motor vehicle crash<br>5     |
|         |                             | Hispanic<br>228                          | Perinatal period condition<br>84 | Birth defect<br>48              | Motor vehicle crash<br>7     |
|         |                             | Black<br>60                              | Perinatal period condition<br>26 | Homicide<br>8                   | Birth defect<br>5            |
|         |                             | Asian/Pacific Islander<br>27             | Birth defect<br>7                | Perinatal period condition<br>7 | Pneumonia/influenza<br><5    |
|         | 15-24 years<br>173 deaths   | White<br>42                              | Drug overdose<br>8               | Motor vehicle crash<br>7        | Suicide<br>6                 |
|         |                             | Hispanic<br>85                           | Motor vehicle crash<br>14        | Homicide<br>11                  | Leukemia<br>8                |
|         |                             | Black<br>27                              | Homicide<br>8                    | Suicide<br><5                   | Motor vehicle crash<br><5    |
|         |                             | Asian/Pacific Islander<br>17             | Suicide<br><5                    | Motor vehicle crash<br><5       | Lymphoma<br><5               |
|         | 25-44 years<br>883 deaths   | White<br>253                             | Suicide<br>32                    | Drug overdose<br>26             | Breast cancer<br>19          |
|         |                             | Hispanic<br>352                          | Motor vehicle crash<br>23        | Breast cancer<br>22             | Homicide<br>19               |
|         |                             | Black<br>176                             | Coronary heart disease<br>18     | Breast cancer<br>15             | Drug overdose<br>11          |
|         |                             | Asian/Pacific Islander<br>96             | Breast cancer<br>11              | Suicide<br>9                    | Stroke<br>8                  |
|         | 45-64 years<br>4,385 deaths | White<br>1,715                           | Coronary heart disease<br>203    | Breast cancer<br>195            | Lung cancer<br>138           |
|         |                             | Hispanic<br>1,256                        | Coronary heart disease<br>165    | Breast cancer<br>126            | Liver disease<br>80          |
|         |                             | Black<br>945                             | Coronary heart disease<br>167    | Breast cancer<br>91             | Lung cancer<br>69            |
|         |                             | Asian/Pacific Islander<br>449            | Breast cancer<br>73              | Coronary heart disease<br>41    | Ovarian cancer<br>29         |

|                                    |  |  |                                   |                                   |
|------------------------------------|--|--|-----------------------------------|-----------------------------------|
| <b>65-74 years</b><br>3,829 deaths | <b>White</b><br>1,719                  | <b>Coronary heart disease</b><br>302   | <b>Lung cancer</b><br>203         | <b>Emphysema/COPD</b><br>155      |
|                                    | <b>Hispanic</b><br>1,006               | <b>Coronary heart disease</b><br>164   | <b>Diabetes</b><br>84             | <b>Stroke</b><br>54               |
|                                    | <b>Black</b><br>662                    | <b>Coronary heart disease</b><br>132   | <b>Lung cancer</b><br>61          | <b>Stroke</b><br>45               |
|                                    | <b>Asian/Pacific Islander</b><br>418   | <b>Coronary heart disease</b><br>70    | <b>Lung cancer</b><br>35          | <b>Stroke</b><br>34               |
| <b>75+ years</b><br>18,114 deaths  | <b>White</b><br>10,763                 | <b>Coronary heart disease</b><br>2,765 | <b>Alzheimer's disease</b><br>967 | <b>Stroke</b><br>772              |
|                                    | <b>Hispanic</b><br>3,376               | <b>Coronary heart disease</b><br>843   | <b>Stroke</b><br>298              | <b>Alzheimer's disease</b><br>233 |
|                                    | <b>Black</b><br>1,864                  | <b>Coronary heart disease</b><br>506   | <b>Stroke</b><br>145              | <b>Alzheimer's disease</b><br>123 |
|                                    | <b>Asian/Pacific Islander</b><br>2,059 | <b>Coronary heart disease</b><br>559   | <b>Stroke</b><br>191              | <b>Pneumonia/influenza</b><br>127 |

Notes: In each age group, the number of deaths from all causes includes persons of other or unknown race/ethnicity.

Figure 10. Leading causes of death and premature death, by service planning area (SPA) of residence

| Antelope Valley (SPA 1)   |                        |               |                      |                                     | San Fernando (SPA 2)      |                     |            |                         |                        |               |                      |                                     |                        |                     |            |
|---------------------------|------------------------|---------------|----------------------|-------------------------------------|---------------------------|---------------------|------------|-------------------------|------------------------|---------------|----------------------|-------------------------------------|------------------------|---------------------|------------|
| 2,214 deaths              |                        |               |                      |                                     | 12,032 deaths             |                     |            |                         |                        |               |                      |                                     |                        |                     |            |
| 22,132 years of life lost |                        |               |                      |                                     | 79,668 years of life lost |                     |            |                         |                        |               |                      |                                     |                        |                     |            |
| Leading causes of death   |                        |               |                      | Leading causes of premature** death |                           |                     |            | Leading causes of death |                        |               |                      | Leading causes of premature** death |                        |                     |            |
| Rank                      | Cause of death         | No. of deaths | Premature death rank | Rank                                | Cause of death            | Years of life lost* | Death rank | Rank                    | Cause of death         | No. of deaths | Premature death rank | Rank                                | Cause of death         | Years of life lost* | Death rank |
| 1.                        | Coronary heart disease | 499           | 1.                   | 1.                                  | Coronary heart disease    | 3,291               | 1.         | 1.                      | Coronary heart disease | 2,852         | 1.                   | 1.                                  | Coronary heart disease | 11,344              | 1.         |
| 2.                        | Emphysema/COPD         | 172           | 11.                  | 2.                                  | Suicide                   | 1,456               | 8.         | 2.                      | Stroke                 | 661           | 9.                   | 2.                                  | Suicide                | 4,580               | 14.        |
| 3.                        | Lung cancer            | 123           | 6.                   | 3.                                  | Motor vehicle crash       | 1,347               | 14.        | 3.                      | Lung cancer            | 625           | 5.                   | 3.                                  | Drug overdose          | 3,881               | 20.        |
| 4.                        | Stroke                 | 114           | 9.                   | 4.                                  | Drug overdose             | 1,144               | 12.        | 4.                      | Alzheimer's disease    | 606           | 40.                  | 4.                                  | Motor vehicle crash    | 3,806               | 19.        |
| 5.                        | Alzheimer's disease    | 86            | 48.                  | 5.                                  | Homicide                  | 950                 | 20.        | 5.                      | Emphysema/COPD         | 539           | 17.                  | 5.                                  | Lung cancer            | 3,713               | 3.         |

| San Gabriel (SPA 3)       |                        |               |                      |                                     | Metro (SPA 4)             |                     |            |                         |                        |               |                      |                                     |                        |                     |            |
|---------------------------|------------------------|---------------|----------------------|-------------------------------------|---------------------------|---------------------|------------|-------------------------|------------------------|---------------|----------------------|-------------------------------------|------------------------|---------------------|------------|
| 10,457 deaths             |                        |               |                      |                                     | 5,982 deaths              |                     |            |                         |                        |               |                      |                                     |                        |                     |            |
| 67,643 years of life lost |                        |               |                      |                                     | 48,027 years of life lost |                     |            |                         |                        |               |                      |                                     |                        |                     |            |
| Leading causes of death   |                        |               |                      | Leading causes of premature** death |                           |                     |            | Leading causes of death |                        |               |                      | Leading causes of premature** death |                        |                     |            |
| Rank                      | Cause of death         | No. of deaths | Premature death rank | Rank                                | Cause of death            | Years of life lost* | Death rank | Rank                    | Cause of death         | No. of deaths | Premature death rank | Rank                                | Cause of death         | Years of life lost* | Death rank |
| 1.                        | Coronary heart disease | 2,270         | 1.                   | 1.                                  | Coronary heart disease    | 8,467               | 1.         | 1.                      | Coronary heart disease | 1,495         | 1.                   | 1.                                  | Coronary heart disease | 6,662               | 1.         |
| 2.                        | Stroke                 | 650           | 8.                   | 2.                                  | Suicide                   | 3,730               | 15.        | 2.                      | Stroke                 | 311           | 8.                   | 2.                                  | Suicide                | 3,184               | 10.        |
| 3.                        | Lung cancer            | 566           | 3.                   | 3.                                  | Lung cancer               | 3,214               | 3.         | 3.                      | Lung cancer            | 302           | 7.                   | 3.                                  | Homicide               | 3,064               | 18.        |
| 4.                        | Emphysema/COPD         | 534           | 14.                  | 4.                                  | Motor vehicle crash       | 3,108               | 21.        | 4.                      | Diabetes               | 230           | 10.                  | 4.                                  | Liver disease          | 2,703               | 8.         |
| 5.                        | Alzheimer's disease    | 422           | 49.                  | 5.                                  | Homicide                  | 3,041               | 25.        | 5.                      | Pneumonia/influenza    | 229           | 17.                  | 5.                                  | Drug overdose          | 2,666               | 14.        |

### West (SPA 5)

3,943 deaths  
19,395 years of life lost

| Leading causes of death |                        |               |                      | Leading causes of premature** death |                        |                     |            |
|-------------------------|------------------------|---------------|----------------------|-------------------------------------|------------------------|---------------------|------------|
| Rank                    | Cause of death         | No. of deaths | Premature death rank | Rank                                | Cause of death         | Years of life lost* | Death rank |
| 1.                      | Coronary heart disease | 817           | 1.                   | 1.                                  | Coronary heart disease | 2,527               | 1.         |
| 2.                      | Stroke                 | 253           | 10.                  | 2.                                  | Drug overdose          | 1,419               | 18.        |
| 3.                      | Lung cancer            | 226           | 3.                   | 3.                                  | Lung cancer            | 1,322               | 3.         |
| 4.                      | Alzheimer's disease    | 210           | 41.                  | 4.                                  | Suicide                | 1,260               | 13.        |
| 5.                      | Pneumonia/influenza    | 158           | 23.                  | 5.                                  | Breast cancer          | 751                 | 10.        |

### South (SPA 6)

5,234 deaths  
58,699 years of life lost

| Leading causes of death |                        |               |                      | Leading causes of premature** death |                        |                     |            |
|-------------------------|------------------------|---------------|----------------------|-------------------------------------|------------------------|---------------------|------------|
| Rank                    | Cause of death         | No. of deaths | Premature death rank | Rank                                | Cause of death         | Years of life lost* | Death rank |
| 1.                      | Coronary heart disease | 1,112         | 2.                   | 1.                                  | Homicide               | 8,603               | 6.         |
| 2.                      | Stroke                 | 307           | 5.                   | 2.                                  | Coronary heart disease | 7,027               | 1.         |
| 3.                      | Lung cancer            | 268           | 6.                   | 3.                                  | Motor vehicle crash    | 2,754               | 17.        |
| 4.                      | Diabetes               | 218           | 7.                   | 4.                                  | Liver disease          | 2,559               | 8.         |
| 5.                      | Emphysema/COPD         | 202           | 15.                  | 5.                                  | Stroke                 | 2,178               | 2.         |

### East (SPA 7)

6,914 deaths  
55,750 years of life lost

| Leading causes of death |                        |               |                      | Leading causes of premature** death |                        |                     |            |
|-------------------------|------------------------|---------------|----------------------|-------------------------------------|------------------------|---------------------|------------|
| Rank                    | Cause of death         | No. of deaths | Premature death rank | Rank                                | Cause of death         | Years of life lost* | Death rank |
| 1.                      | Coronary heart disease | 1,463         | 1.                   | 1.                                  | Coronary heart disease | 6,661               | 1.         |
| 2.                      | Stroke                 | 426           | 6.                   | 2.                                  | Homicide               | 3,978               | 16.        |
| 3.                      | Emphysema/COPD         | 339           | 17.                  | 3.                                  | Liver disease          | 3,417               | 8.         |
| 4.                      | Diabetes               | 302           | 8.                   | 4.                                  | Motor vehicle crash    | 3,019               | 16.        |
| 5.                      | Lung cancer            | 299           | 7.                   | 5.                                  | Suicide                | 2,210               | 19.        |

### South Bay (SPA 8)

9,402 deaths  
73,230 years of life lost

| Leading causes of death |                        |               |                      | Leading causes of premature** death |                        |                     |            |
|-------------------------|------------------------|---------------|----------------------|-------------------------------------|------------------------|---------------------|------------|
| Rank                    | Cause of death         | No. of deaths | Premature death rank | Rank                                | Cause of death         | Years of life lost* | Death rank |
| 1.                      | Coronary heart disease | 2,064         | 1.                   | 1.                                  | Coronary heart disease | 10,637              | 1.         |
| 2.                      | Stroke                 | 551           | 7.                   | 2.                                  | Homicide               | 5,249               | 15.        |
| 3.                      | Lung cancer            | 529           | 6.                   | 3.                                  | Suicide                | 3,820               | 13.        |
| 4.                      | Emphysema/COPD         | 496           | 12.                  | 4.                                  | Drug overdose          | 3,179               | 18.        |
| 5.                      | Alzheimer's disease    | 339           | 42.                  | 5.                                  | Liver disease          | 3,152               | 9.         |

\*Excludes infants less than 1 year of age and persons of unknown age.

\*\*Death before age 75 years.

**Figure 11.** Comparison of the leading causes of death and premature death, by service planning area (SPA) of residence

### Leading causes of death

| Service Planning Area<br>Number of deaths<br>Age-adjusted death rate | #1 cause<br>Number of deaths<br>Age-adjusted death rate | #2 cause<br>Number of deaths<br>Age-adjusted death rate | #3 cause<br>Number of deaths<br>Age-adjusted death rate | #4 cause<br>Number of deaths<br>Age-adjusted death rate | #5 cause<br>Number of deaths<br>Age-adjusted death rate |
|--|---|---|---|---|---|
| <b>SPA 1: Antelope Valley</b><br>2,214<br>799 per 100,000            | Coronary heart disease<br>499<br>188 per 100,000        | Emphysema/COPD<br>172<br>70 per 100,000                 | Lung cancer<br>123<br>44 per 100,000                    | Stroke<br>114<br>45 per 100,000                         | Alzheimer's disease<br>86<br>39 per 100,000             |
| <b>SPA 2: San Fernando</b><br>12,032<br>577 per 100,000              | Coronary heart disease<br>2,852<br>137 per 100,000      | Stroke<br>661<br>32 per 100,000                         | Lung cancer<br>625<br>31 per 100,000                    | Alzheimer's disease<br>606<br>29 per 100,000            | Emphysema/COPD<br>539<br>27 per 100,000                 |
| <b>SPA 3: San Gabriel</b><br>10,457<br>580 per 100,000               | Coronary heart disease<br>2,270<br>124 per 100,000      | Stroke<br>650<br>36 per 100,000                         | Lung cancer<br>566<br>32 per 100,000                    | Emphysema/COPD<br>534<br>30 per 100,000                 | Alzheimer's disease<br>422<br>23 per 100,000            |
| <b>SPA 4: Metro</b><br>5,982<br>585 per 100,000                      | Coronary heart disease<br>1,495<br>148 per 100,000      | Stroke<br>311<br>31 per 100,000                         | Lung cancer<br>302<br>31 per 100,000                    | Diabetes<br>230<br>23 per 100,000                       | Pneumonia/influenza<br>229<br>23 per 100,000            |
| <b>SPA 5: West</b><br>3,943<br>497 per 100,000                       | Coronary heart disease<br>817<br>98 per 100,000         | Stroke<br>253<br>30 per 100,000                         | Lung cancer<br>226<br>31 per 100,000                    | Alzheimer's disease<br>210<br>24 per 100,000            | Pneumonia/influenza<br>158<br>19 per 100,000            |
| <b>SPA 6: South</b><br>5,234<br>762 per 100,000                      | Coronary heart disease<br>1,112<br>173 per 100,000      | Stroke<br>307<br>48 per 100,000                         | Lung cancer<br>268<br>41 per 100,000                    | Diabetes<br>218<br>33 per 100,000                       | Emphysema/COPD<br>202<br>33 per 100,000                 |
| <b>SPA 7: East</b><br>6,914<br>622 per 100,000                       | Coronary heart disease<br>1,463<br>134 per 100,000      | Stroke<br>426<br>39 per 100,000                         | Emphysema/COPD<br>339<br>32 per 100,000                 | Diabetes<br>302<br>28 per 100,000                       | Lung cancer<br>299<br>28 per 100,000                    |
| <b>SPA 8: South Bay</b><br>9,402<br>655 per 100,000                  | Coronary heart disease<br>2,064<br>144 per 100,000      | Stroke<br>551<br>39 per 100,000                         | Lung cancer<br>529<br>38 per 100,000                    | Emphysema/COPD<br>496<br>36 per 100,000                 | Alzheimer's disease<br>339<br>24 per 100,000            |
| <b>Los Angeles County Total</b><br>56,538<br>615 per 100,000         | Coronary heart disease<br>12,635<br>138 per 100,000     | Stroke<br>3,278<br>36 per 100,000                       | Lung cancer<br>2,941<br>33 per 100,000                  | Emphysema/COPD<br>2,622<br>30 per 100,000               | Alzheimer's disease<br>2,242<br>25 per 100,000          |

Notes: Los Angeles County Total includes persons of unknown residence.

## Leading causes of premature death (before age 75 years)

| Service Planning Area    | #1 cause               | #2 cause               | #3 cause            | #4 cause            | #5 cause      |
|--------------------------|------------------------|------------------------|---------------------|---------------------|---------------|
| SPA 1: Antelope Valley   | Coronary heart disease | Suicide                | Motor vehicle crash | Drug overdose       | Homicide      |
| SPA 2: San Fernando      | Coronary heart disease | Suicide                | Drug overdose       | Motor vehicle crash | Lung cancer   |
| SPA 3: San Gabriel       | Coronary heart disease | Suicide                | Lung cancer         | Motor vehicle crash | Homicide      |
| SPA 4: Metro             | Coronary heart disease | Suicide                | Homicide            | Liver disease       | Drug overdose |
| SPA 5: West              | Coronary heart disease | Drug overdose          | Lung cancer         | Suicide             | Breast cancer |
| SPA 6: South             | Homicide               | Coronary heart disease | Motor vehicle crash | Liver disease       | Stroke        |
| SPA 7: East              | Coronary heart disease | Homicide               | Liver disease       | Motor vehicle crash | Suicide       |
| SPA 8: South Bay         | Coronary heart disease | Homicide               | Suicide             | Drug overdose       | Liver disease |
| Los Angeles County Total | Coronary heart disease | Homicide               | Suicide             | Motor vehicle crash | Liver disease |

Notes: Los Angeles County Total includes persons of unknown residence.

**Figure 12.** Comparison of the leading causes of premature death, by service planning area (SPA) of residence and gender

**Males: Leading causes of premature death (before age 75 years)**

| Service Planning Area  | #1 cause               | #2 cause               | #3 cause            | #4 cause            | #5 cause      |
|------------------------|------------------------|------------------------|---------------------|---------------------|---------------|
| SPA 1: Antelope Valley | Coronary heart disease | Motor vehicle crash    | Suicide             | Drug overdose       | Liver disease |
| SPA 2: San Fernando    | Coronary heart disease | Suicide                | Drug overdose       | Motor vehicle crash | Homicide      |
| SPA 3: San Gabriel     | Coronary heart disease | Suicide                | Homicide            | Motor vehicle crash | Lung cancer   |
| SPA 4: Metro           | Coronary heart disease | Homicide               | Suicide             | Drug overdose       | Liver disease |
| SPA 5: West            | Coronary heart disease | Drug overdose          | Suicide             | Lung cancer         | Liver disease |
| SPA 6: South           | Homicide               | Coronary heart disease | Motor vehicle crash | Liver disease       | Suicide       |
| SPA 7: East            | Coronary heart disease | Homicide               | Liver disease       | Motor vehicle crash | Suicide       |
| SPA 8: South Bay       | Coronary heart disease | Homicide               | Suicide             | Drug overdose       | Liver disease |
| All males              | Coronary heart disease | Homicide               | Suicide             | Motor vehicle crash | Liver disease |

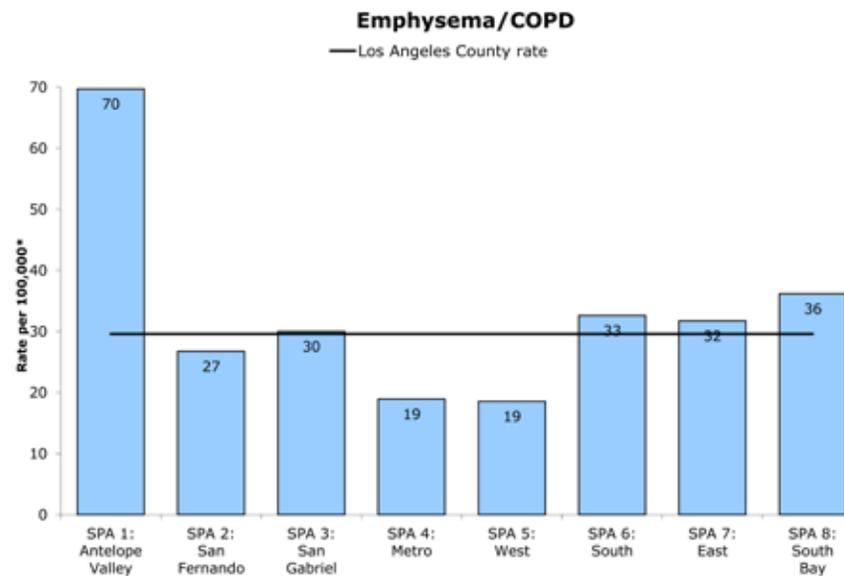
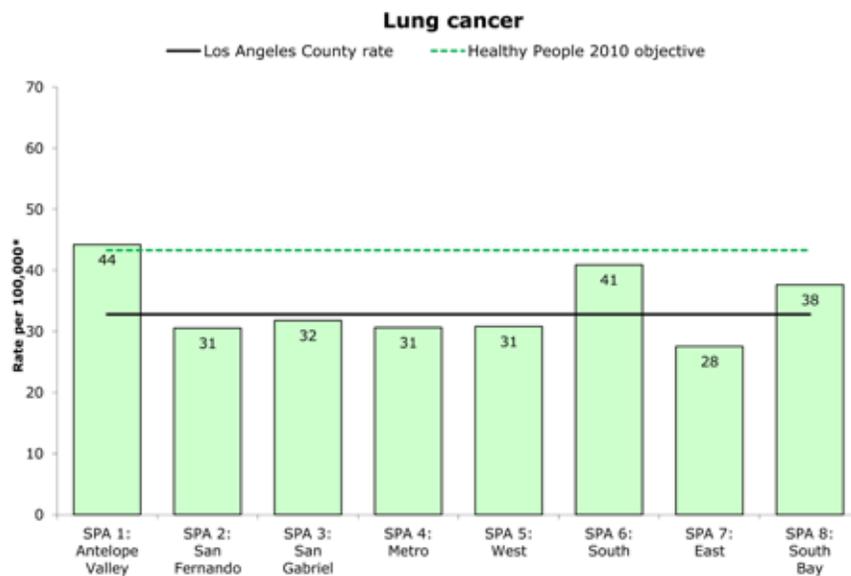
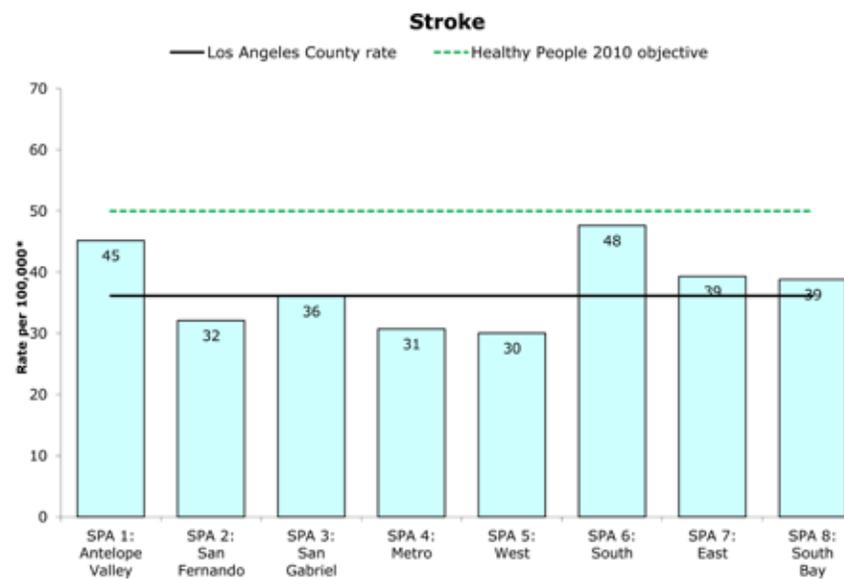
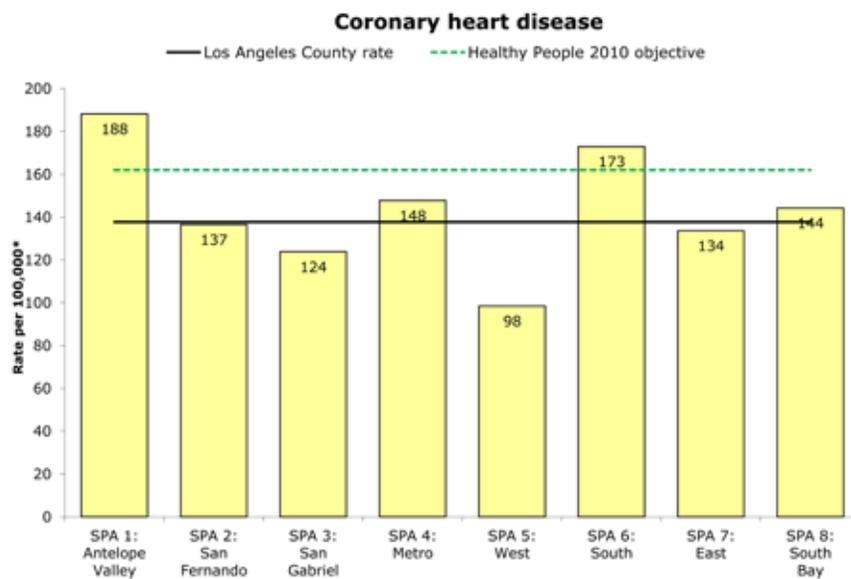
Notes: All males includes persons of unknown residence.

## Females: Leading causes of premature death (before age 75 years)

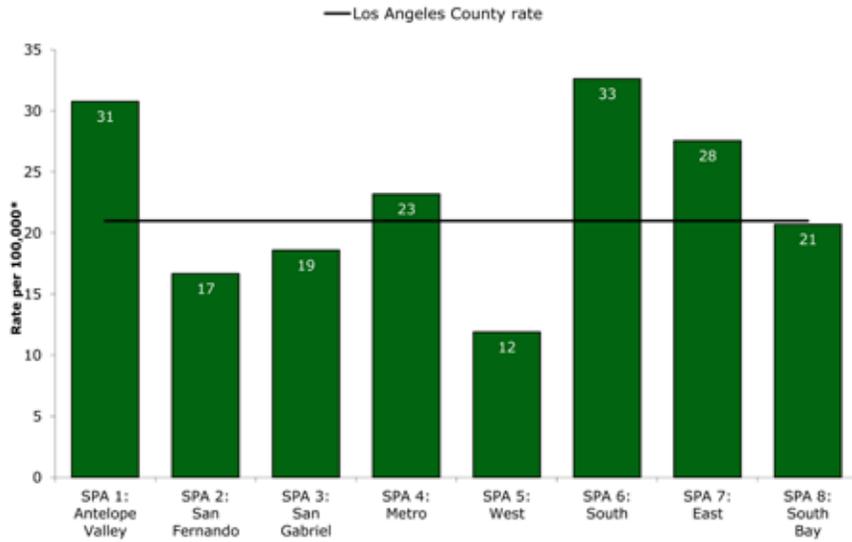
| Service Planning Area  | #1 cause               | #2 cause               | #3 cause      | #4 cause      | #5 cause            |
|------------------------|------------------------|------------------------|---------------|---------------|---------------------|
| SPA 1: Antelope Valley | Coronary heart disease | Breast cancer          | Suicide       | Drug overdose | Lung cancer         |
| SPA 2: San Fernando    | Breast cancer          | Coronary heart disease | Lung cancer   | Liver disease | Motor vehicle crash |
| SPA 3: San Gabriel     | Breast cancer          | Coronary heart disease | Lung cancer   | Suicide       | Stroke              |
| SPA 4: Metro           | Coronary heart disease | Motor vehicle crash    | Breast cancer | Stroke        | Lung cancer         |
| SPA 5: West            | Breast cancer          | Coronary heart disease | Lung cancer   | Suicide       | Drug overdose       |
| SPA 6: South           | Coronary heart disease | Breast cancer          | Stroke        | Lung cancer   | Homicide            |
| SPA 7: East            | Coronary heart disease | Breast cancer          | Liver disease | Stroke        | Lung cancer         |
| SPA 8: South Bay       | Coronary heart disease | Breast cancer          | Lung cancer   | Stroke        | Drug overdose       |
| All females            | Coronary heart disease | Breast cancer          | Lung cancer   | Stroke        | Liver disease       |

Notes: All females includes persons of unknown residence.

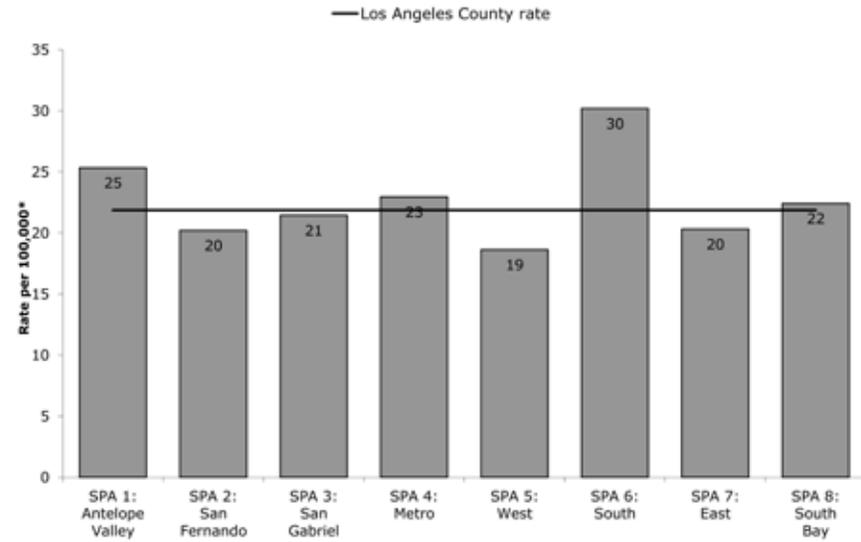
Figure 13. Death rates for selected causes of death, by service planning area (SPA) of residence



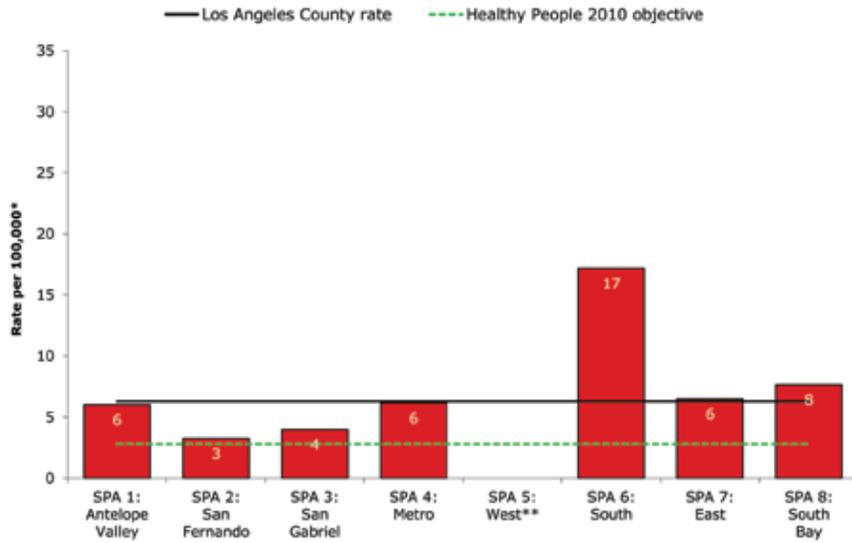
### Diabetes



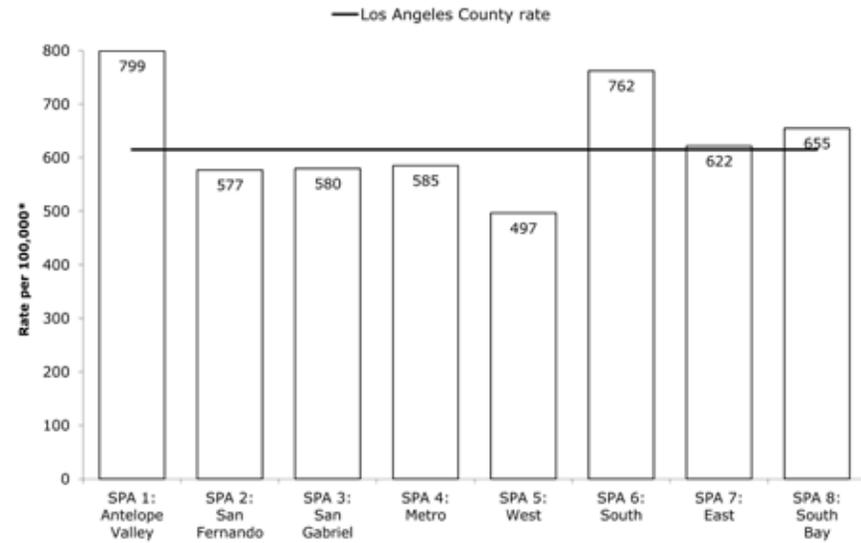
### Pneumonia/Influenza



### Homicide



### All causes of death



\*Age-adjusted.

\*\*Number of deaths is too small to calculate a reliable rate.

Figure 14. Comparison of the leading causes of death, by health district of residence

### Leading causes of death

| Health District<br>Number of deaths<br>Age-adjusted death rate | #1 cause<br>Number of deaths  | #2 cause<br>Number of deaths | #3 cause<br>Number of deaths | #4 cause<br>Number of deaths | #5 cause<br>Number of deaths |
|--|-------------------------------|------------------------------|------------------------------|------------------------------|------------------------------|
| <b>Alhambra</b><br>2,271<br>509 per 100,000                    | Coronary heart disease<br>471 | Stroke<br>173                | Lung cancer<br>130           | Pneumonia/influenza<br>107   | Emphysema/COPD<br>103        |
| <b>Antelope Valley</b><br>2,214<br>799 per 100,000             | Coronary heart disease<br>499 | Emphysema/COPD<br>172        | Lung cancer<br>123           | Stroke<br>114                | Alzheimer's disease<br>86    |
| <b>Bellflower</b><br>2,046<br>637 per 100,000                  | Coronary heart disease<br>418 | Emphysema/COPD<br>138        | Stroke<br>124                | Lung cancer<br>113           | Alzheimer's disease<br>100   |
| <b>Central</b><br>1,721<br>572 per 100,000                     | Coronary heart disease<br>463 | Stroke<br>97                 | Emphysema/COPD<br>74         | Lung cancer<br>69            | Diabetes<br>65               |
| <b>Compton</b><br>1,312<br>745 per 100,000                     | Coronary heart disease<br>245 | Stroke<br>77                 | Lung cancer<br>69            | Diabetes<br>57               | Emphysema/COPD<br>57         |
| <b>East LA</b><br>1,115<br>617 per 100,000                     | Coronary heart disease<br>260 | Stroke<br>72                 | Diabetes<br>60               | Alzheimer's disease<br>56    | Pneumonia/influenza<br>51    |
| <b>East Valley</b><br>2,295<br>614 per 100,000                 | Coronary heart disease<br>537 | Stroke<br>121                | Alzheimer's disease<br>105   | Lung cancer<br>98            | Emphysema/COPD<br>98         |
| <b>El Monte</b><br>2,088<br>584 per 100,000                    | Coronary heart disease<br>408 | Stroke<br>131                | Lung cancer<br>116           | Emphysema/COPD<br>97         | Diabetes<br>90               |
| <b>Foothill</b><br>1,987<br>601 per 100,000                    | Coronary heart disease<br>462 | Emphysema/COPD<br>123        | Lung cancer<br>113           | Stroke<br>111                | Alzheimer's disease<br>94    |
| <b>Glendale</b><br>2,361<br>570 per 100,000                    | Coronary heart disease<br>547 | Stroke<br>150                | Alzheimer's disease<br>134   | Lung cancer<br>120           | Emphysema/COPD<br>114        |
| <b>Harbor</b><br>1,317<br>581 per 100,000                      | Coronary heart disease<br>280 | Stroke<br>91                 | Lung cancer<br>73            | Alzheimer's disease<br>54    | Emphysema/COPD<br>52         |
| <b>Hollywood-Wilshire</b><br>2,666<br>577 per 100,000          | Coronary heart disease<br>688 | Lung cancer<br>153           | Stroke<br>130                | Pneumonia/influenza<br>118   | Alzheimer's disease<br>89    |
| <b>Inglewood</b><br>2,313<br>710 per 100,000                   | Coronary heart disease<br>518 | Stroke<br>139                | Lung cancer<br>128           | Emphysema/COPD<br>99         | Pneumonia/influenza<br>90    |

|  |                                  |                       |                       |                            |                              |
|--|----------------------------------|-----------------------|-----------------------|----------------------------|------------------------------|
| <b>Long Beach</b><br>2,838<br>725 per 100,000                | Coronary heart disease<br>663    | Emphysema/COPD<br>178 | Stroke<br>166         | Lung cancer<br>151         | Alzheimer's disease<br>105   |
| <b>Northeast</b><br>1,595<br>612 per 100,000                 | Coronary heart disease<br>344    | Diabetes<br>87        | Stroke<br>84          | Lung cancer<br>80          | Pneumonia/influenza<br>63    |
| <b>Pasadena</b><br>923<br>564 per 100,000                    | Coronary heart disease<br>235    | Stroke<br>51          | Emphysema/COPD<br>45  | Alzheimer's disease<br>40  | Pneumonia/influenza<br>38    |
| <b>Pomona</b><br>3,188<br>625 per 100,000                    | Coronary heart disease<br>694    | Stroke<br>184         | Lung cancer<br>174    | Emphysema/COPD<br>166      | Alzheimer's disease<br>147   |
| <b>San Antonio</b><br>1,744<br>617 per 100,000               | Coronary heart disease<br>380    | Stroke<br>109         | Diabetes<br>92        | Emphysema/COPD<br>71       | Lung cancer<br>60            |
| <b>San Fernando</b><br>2,376<br>576 per 100,000              | Coronary heart disease<br>546    | Lung cancer<br>134    | Stroke<br>131         | Alzheimer's disease<br>126 | Emphysema/COPD<br>95         |
| <b>South</b><br>917<br>861 per 100,000                       | Coronary heart disease<br>188    | Lung cancer<br>50     | Homicide<br>50        | Stroke<br>49               | Diabetes<br>35               |
| <b>Southeast</b><br>543<br>668 per 100,000                   | Coronary heart disease<br>99     | Stroke<br>39          | Homicide<br>29        | Lung cancer<br>26          | Liver disease<br>21          |
| <b>Southwest</b><br>2,462<br>764 per 100,000                 | Coronary heart disease<br>580    | Stroke<br>142         | Lung cancer<br>123    | Diabetes<br>112            | Emphysema/COPD<br>98         |
| <b>Torrance</b><br>2,934<br>595 per 100,000                  | Coronary heart disease<br>603    | Lung cancer<br>177    | Emphysema/COPD<br>167 | Stroke<br>155              | Alzheimer's disease<br>125   |
| <b>West</b><br>3,943<br>497 per 100,000                      | Coronary heart disease<br>817    | Stroke<br>253         | Lung cancer<br>226    | Alzheimer's disease<br>210 | Pneumonia/influenza<br>158   |
| <b>West Valley</b><br>5,000<br>565 per 100,000               | Coronary heart disease<br>1,222  | Lung cancer<br>273    | Stroke<br>259         | Alzheimer's disease<br>241 | Emphysema/COPD<br>232        |
| <b>Whittier</b><br>2,009<br>613 per 100,000                  | Coronary heart disease<br>405    | Stroke<br>121         | Emphysema/COPD<br>100 | Lung cancer<br>99          | Alzheimer's disease<br>87    |
| <b>Los Angeles County Total</b><br>56,538<br>615 per 100,000 | Coronary heart disease<br>12,635 | Stroke<br>3,278       | Lung cancer<br>2,941  | Emphysema/COPD<br>2,622    | Alzheimer's disease<br>2,242 |

Notes: Los Angeles County Total includes persons of unknown residence.

**Figure 15.** Comparison of the leading causes of premature death, by health district of residence

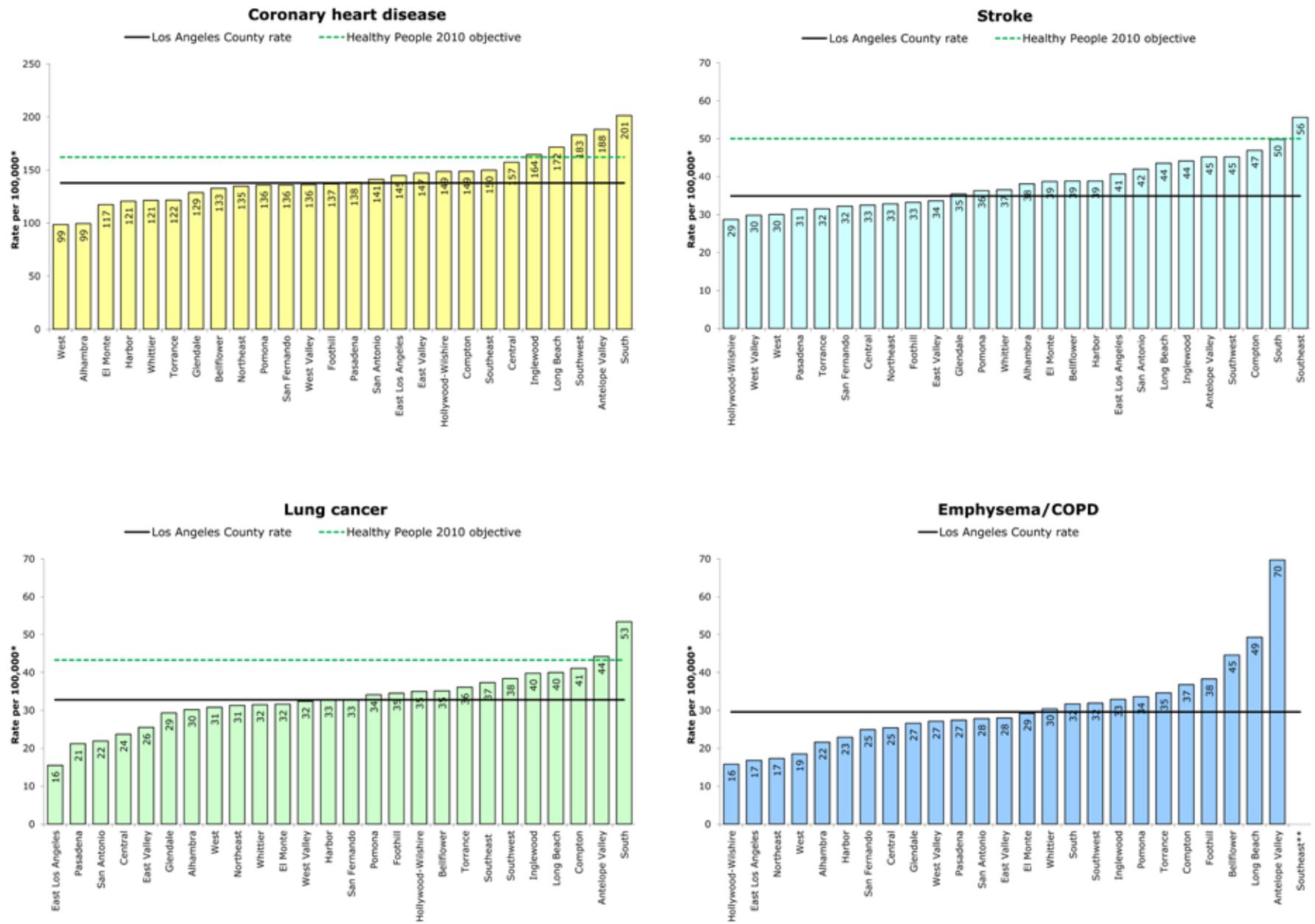
**Leading causes of premature death (before age 75 years)**

| Health District    | #1 cause               | #2 cause               | #3 cause            | #4 cause          | #5 cause      |
|--------------------|------------------------|------------------------|---------------------|-------------------|---------------|
| Alhambra           | Coronary heart disease | Suicide                | Lung cancer         | Colorectal cancer | Liver disease |
| Antelope Valley    | Coronary heart disease | Suicide                | Motor vehicle crash | Drug overdose     | Homicide      |
| Bellflower         | Coronary heart disease | Liver disease          | Stroke              | Homicide          | Drug overdose |
| Central            | Coronary heart disease | Homicide               | Drug overdose       | Suicide           | HIV           |
| Compton            | Homicide               | Coronary heart disease | Motor vehicle crash | Liver disease     | Stroke        |
| East Los Angeles   | Coronary heart disease | Homicide               | Liver disease       | Diabetes          | Suicide       |
| East Valley        | Coronary heart disease | Homicide               | Motor vehicle crash | Suicide           | Drug overdose |
| El Monte           | Coronary heart disease | Motor vehicle crash    | Homicide            | Suicide           | Lung cancer   |
| Foothill           | Coronary heart disease | Suicide                | Lung cancer         | Liver disease     | Breast cancer |
| Glendale           | Coronary heart disease | Lung cancer            | Liver disease       | Breast cancer     | Drug overdose |
| Harbor             | Coronary heart disease | Drug overdose          | Homicide            | Suicide           | Breast cancer |
| Hollywood/Wilshire | Coronary heart disease | Suicide                | Drug overdose       | Liver disease     | Lung cancer   |
| Inglewood          | Coronary heart disease | Homicide               | Lung cancer         | Stroke            | Liver disease |

|                                 |                        |                        |                     |                     |                     |
|---------------------------------|------------------------|------------------------|---------------------|---------------------|---------------------|
| <b>Long Beach</b>               | Coronary heart disease | Suicide                | Homicide            | Liver disease       | Motor vehicle crash |
| <b>Northeast</b>                | Coronary heart disease | Homicide               | Liver disease       | Motor vehicle crash | Drug overdose       |
| <b>Pasadena</b>                 | Coronary heart disease | Motor vehicle crash    | Suicide             | Breast cancer       | Drug overdose       |
| <b>Pomona</b>                   | Coronary heart disease | Homicide               | Lung cancer         | Suicide             | Motor vehicle crash |
| <b>San Antonio</b>              | Coronary heart disease | Homicide               | Motor vehicle crash | Liver disease       | Suicide             |
| <b>San Fernando</b>             | Coronary heart disease | Motor vehicle crash    | Drug overdose       | Suicide             | Lung cancer         |
| <b>South</b>                    | Homicide               | Coronary heart disease | Liver disease       | Motor vehicle crash | Stroke              |
| <b>Southeast</b>                | Homicide               | Coronary heart disease | Motor vehicle crash | Suicide             | Stroke              |
| <b>Southwest</b>                | Coronary heart disease | Homicide               | Diabetes            | Liver disease       | Lung cancer         |
| <b>Torrance</b>                 | Coronary heart disease | Suicide                | Liver disease       | Drug overdose       | Homicide            |
| <b>West</b>                     | Coronary heart disease | Drug overdose          | Lung cancer         | Suicide             | Breast cancer       |
| <b>West Valley</b>              | Coronary heart disease | Suicide                | Lung cancer         | Drug overdose       | Motor vehicle crash |
| <b>Whittier</b>                 | Coronary heart disease | Motor vehicle crash    | Liver disease       | Homicide            | Lung cancer         |
| <b>Los Angeles County Total</b> | Coronary heart disease | Homicide               | Suicide             | Motor vehicle crash | Liver disease       |

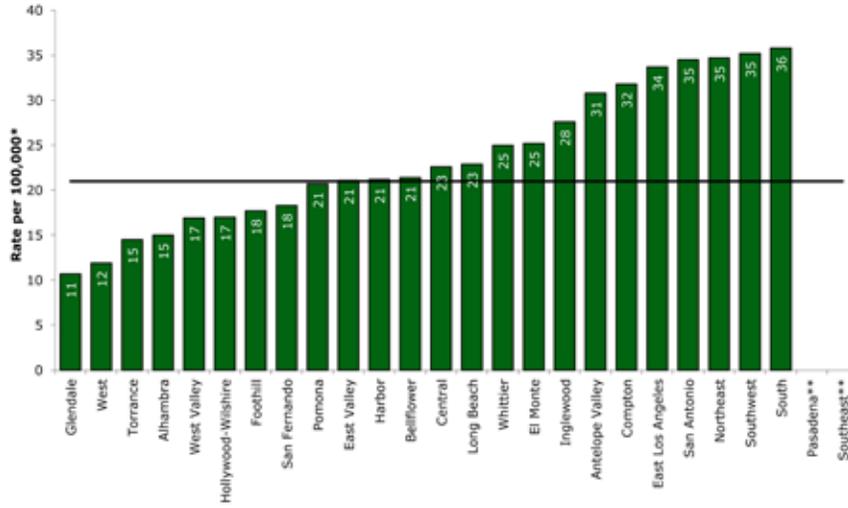
Notes: Los Angeles County Total includes persons of unknown residence.

Figure 16. Death rates for selected causes of death, by health district of residence



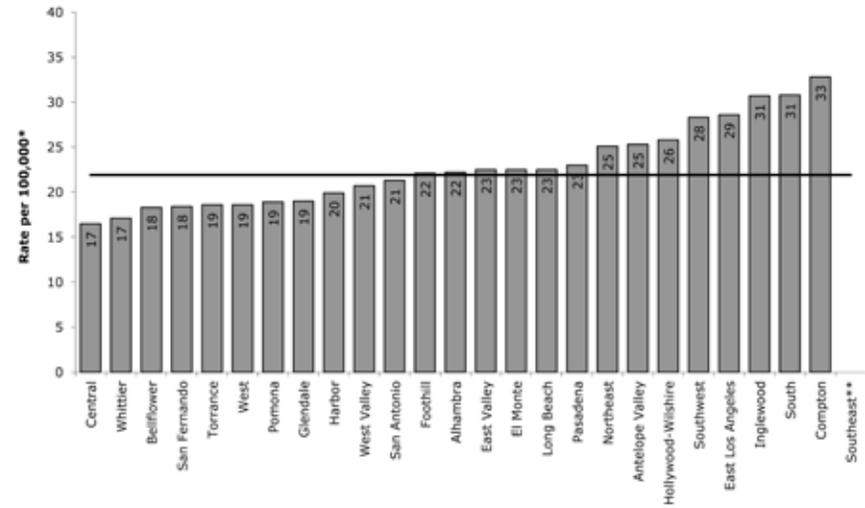
### Diabetes

— Los Angeles County rate



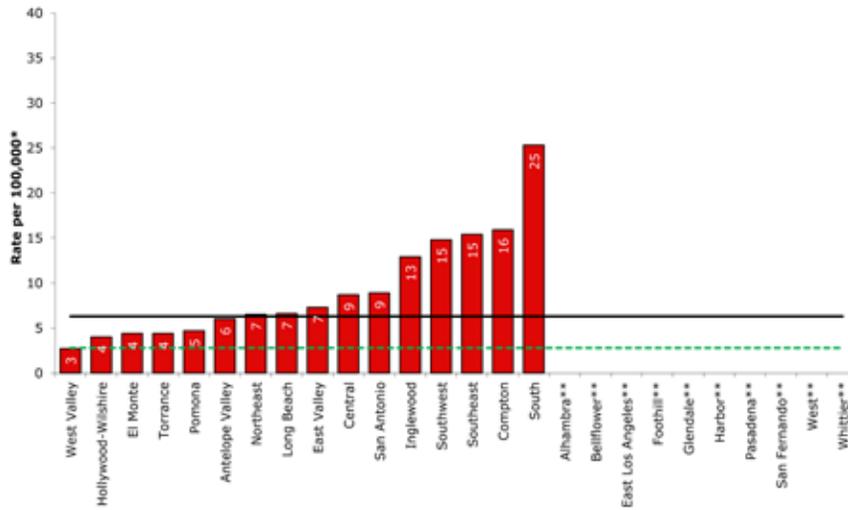
### Pneumonia/influenza

— Los Angeles County rate



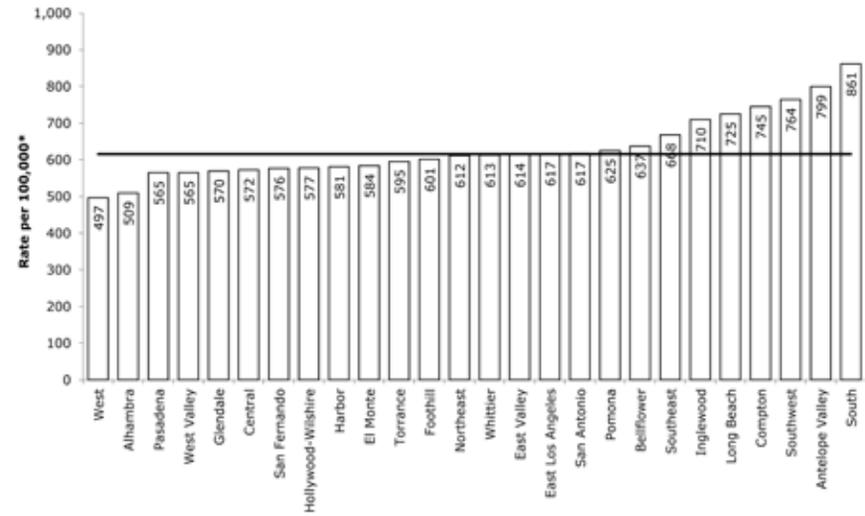
### Homicide

— Los Angeles County rate    - - - Healthy People 2010 objective



### All causes of death

— Los Angeles County rate



\*Age-adjusted.

\*\*Number of deaths is too small to calculate a reliable rate.

Figure T1. Comparison of the leading causes of death, by year

## Leading causes of death

| Year | #1 cause<br>No. of deaths        | #2 cause<br>No. of deaths | #3 cause<br>No. of deaths | #4 cause<br>No. of deaths | #5 cause<br>No. of deaths        | #6 cause<br>No. of deaths        | #7 cause<br>No. of deaths    | #8 cause<br>No. of deaths    | #9 cause<br>No. of deaths | #10 cause<br>No. of deaths |
|------|----------------------------------|---------------------------|---------------------------|---------------------------|----------------------------------|----------------------------------|------------------------------|------------------------------|---------------------------|----------------------------|
| 2010 | Coronary heart disease<br>12,635 | Stroke<br>3,278           | Lung cancer<br>2,941      | Emphysema/COPD<br>2,622   | Alzheimer's disease<br>2,242     | Pneumonia/<br>influenza<br>1,964 | Diabetes<br>1,894            | Colorectal cancer<br>1,285   | Liver disease<br>1,171    | Breast cancer<br>1,116     |
| 2009 | Coronary heart disease<br>12,725 | Stroke<br>3,301           | Lung cancer<br>2,958      | Emphysema/COPD<br>2,904   | Alzheimer's disease<br>2,125     | Pneumonia/<br>influenza<br>2,097 | Diabetes<br>1,964            | Colorectal cancer<br>1,388   | Liver disease<br>1,246    | Breast cancer<br>1,173     |
| 2008 | Coronary heart disease<br>13,428 | Stroke<br>3,280           | Lung cancer<br>2,910      | Emphysema/COPD<br>2,889   | Diabetes<br>2,190                | Pneumonia/<br>influenza<br>2,171 | Alzheimer's disease<br>2,121 | Colorectal cancer<br>1,365   | Liver disease<br>1,134    | Breast cancer<br>1,079     |
| 2007 | Coronary heart disease<br>13,890 | Stroke<br>3,323           | Lung cancer<br>2,950      | Emphysema/COPD<br>2,625   | Pneumonia/<br>influenza<br>2,184 | Diabetes<br>2,127                | Alzheimer's disease<br>1,780 | Colorectal cancer<br>1,323   | Breast cancer<br>1,139    | Liver disease<br>1,133     |
| 2006 | Coronary heart disease<br>14,842 | Stroke<br>3,662           | Lung cancer<br>3,021      | Emphysema/COPD<br>2,665   | Pneumonia/<br>influenza<br>2,283 | Diabetes<br>2,188                | Alzheimer's disease<br>1,551 | Colorectal cancer<br>1,362   | Liver disease<br>1,102    | Breast cancer<br>1,071     |
| 2005 | Coronary heart disease<br>15,154 | Stroke<br>3,775           | Lung cancer<br>3,036      | Emphysema/COPD<br>2,770   | Pneumonia/<br>influenza<br>2,333 | Diabetes<br>2,305                | Alzheimer's disease<br>1,546 | Colorectal cancer<br>1,409   | Breast cancer<br>1,174    | Homicide<br>1,066          |
| 2004 | Coronary heart disease<br>15,296 | Stroke<br>4,121           | Lung cancer<br>3,034      | Emphysema/COPD<br>2,641   | Pneumonia/<br>influenza<br>2,272 | Diabetes<br>2,201                | Colorectal cancer<br>1,414   | Alzheimer's disease<br>1,340 | Breast cancer<br>1,166    | Homicide<br>1,069          |
| 2003 | Coronary heart disease<br>16,320 | Stroke<br>4,249           | Lung cancer<br>3,150      | Emphysema/COPD<br>2,796   | Pneumonia/<br>influenza<br>2,419 | Diabetes<br>2,178                | Colorectal cancer<br>1,450   | Alzheimer's disease<br>1,285 | Breast cancer<br>1,084    | Homicide<br>1,066          |
| 2002 | Coronary heart disease<br>16,293 | Stroke<br>4,169           | Lung cancer<br>3,081      | Emphysema/COPD<br>2,604   | Pneumonia/<br>influenza<br>2,494 | Diabetes<br>2,122                | Colorectal cancer<br>1,315   | Homicide<br>1,148            | Liver disease<br>1,085    | Breast cancer<br>1,064     |
| 2001 | Coronary heart disease<br>16,828 | Stroke<br>4,259           | Lung cancer<br>3,232      | Emphysema/COPD<br>2,723   | Pneumonia/<br>influenza<br>2,421 | Diabetes<br>1,890                | Colorectal cancer<br>1,423   | Homicide<br>1,099            | Breast cancer<br>1,096    | Liver disease<br>1,010     |

Figure T2. Comparison of the leading causes of premature death, by year

Leading causes of premature death (before age 75 years)

| Year | #1 cause               | #2 cause | #3 cause            | #4 cause            | #5 cause      | #6 cause      | #7 cause      | #8 cause      | #9 cause      | #10 cause     |
|------|------------------------|----------|---------------------|---------------------|---------------|---------------|---------------|---------------|---------------|---------------|
| 2010 | Coronary heart disease | Homicide | Suicide             | Motor vehicle crash | Liver disease | Drug overdose | Lung cancer   | Stroke        | Breast cancer | Diabetes      |
| 2009 | Coronary heart disease | Homicide | Motor vehicle crash | Liver disease       | Suicide       | Drug overdose | Lung cancer   | Stroke        | Diabetes      | Breast cancer |
| 2008 | Coronary heart disease | Homicide | Motor vehicle crash | Suicide             | Liver disease | Drug overdose | Lung cancer   | Diabetes      | Stroke        | Breast cancer |
| 2007 | Coronary heart disease | Homicide | Motor vehicle crash | Drug overdose       | Liver disease | Suicide       | Lung cancer   | Stroke        | Diabetes      | Breast cancer |
| 2006 | Coronary heart disease | Homicide | Motor vehicle crash | Liver disease       | Suicide       | Lung cancer   | Stroke        | Drug overdose | Diabetes      | Breast cancer |
| 2005 | Coronary heart disease | Homicide | Motor vehicle crash | Suicide             | Lung cancer   | Liver disease | Diabetes      | Stroke        | Drug overdose | Breast cancer |
| 2004 | Coronary heart disease | Homicide | Motor vehicle crash | Suicide             | Lung cancer   | Liver disease | Drug overdose | Stroke        | Diabetes      | HIV           |
| 2003 | Coronary heart disease | Homicide | Motor vehicle crash | Suicide             | Lung cancer   | Drug overdose | Liver disease | Stroke        | Diabetes      | HIV           |
| 2002 | Coronary heart disease | Homicide | Motor vehicle crash | Lung cancer         | Suicide       | Liver disease | Drug overdose | Stroke        | HIV           | Diabetes      |
| 2001 | Coronary heart disease | Homicide | Motor vehicle crash | Suicide             | Lung cancer   | Liver disease | HIV           | Stroke        | Drug overdose | Diabetes      |

# Alzheimer's Disease

45th cause of premature death  
5th cause of death

**ALZHEIMER'S DISEASE** has been the fifth-leading cause of death since 2009, moving up from the seventh-leading cause of death in 2008. In 2010, it was the third-leading cause of death for women, while it was the ninth-leading cause of death for men. The highest death rate, 32 deaths per 100,000 population, was among white women. Overall, the death rate from Alzheimer's disease increased 105% in the past 10 years, reflecting the aging of the population and increased awareness of the disease.

### In simple terms . . .

Alzheimer's disease is an irreversible, progressive brain disease that slowly destroys memory and thinking skills and, eventually, the ability to carry out the simplest tasks of daily living.

In most people with Alzheimer's disease, symptoms first appear after age 60. Alzheimer's disease is the most common cause of dementia in older people. There are medications that may temporarily lessen some of the symptoms, but there is no cure. Scientists are exploring possible connections between Alzheimer's disease and high cholesterol, high blood pressure, physical inactivity, and serious head injury.

### Risk factors

Age, family history, genetics

### Community opportunities for intervention

- Promote awareness and educate the public about what is normal aging
- Develop community support networks for caregivers
- Assist persons with early Alzheimer's disease to plan for their future financial and medical needs

### Individual opportunities for prevention

- Work with your health care provider to maintain healthy blood pressure, cholesterol, and blood sugar levels
- Stay socially active by engaging in community groups, joining classes, or volunteering
- Eat a healthy diet that is rich in fruits, vegetables, and whole grains
- Make time to be physically active every day
- Learn new things and keep your mind active by reading, doing puzzles, or dancing (which requires anticipating and memorizing dance steps)
- Visit your doctor early if you are experiencing symptoms of memory loss or a decline in thinking ability

## LOS ANGELES COUNTY

Deaths 2,242  
Death Rate 25 deaths per 100,000 population

Healthy People 2010 Objective None

ICD-9 codes (1979-1998) 331.0

ICD-10 codes (1999-2010) G30

References **Alzheimer's Association**  
www.alz.org  
**"Alzheimer's Disease: An Emerging Public Health Concern"**  
[http://publichealth.lacounty.gov/ha/reports/LAHealthBrief\\_2007/Alzheimer's\\_Disease.pdf](http://publichealth.lacounty.gov/ha/reports/LAHealthBrief_2007/Alzheimer's_Disease.pdf)

**Alzheimer's Disease Education and Referral Center**  
www.nia.nih.gov/alzheimers

Referral **Alzheimer's Association Helpline**  
1-800-272-3900

Figure T3. Trends in Alzheimer's disease mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>905</b>    | <b>12</b>   | <b>973</b>    | <b>12</b>   | <b>1,285</b>  | <b>16</b>   | <b>1,340</b>  | <b>16</b>   | <b>1,546</b>  | <b>18</b>   | <b>1,551</b>  | <b>18</b>   | <b>1,780</b>  | <b>19</b>   | <b>2,121</b>  | <b>22</b>   | <b>2,125</b>  | <b>21</b>   | <b>2,242</b>  | <b>25</b>   |
| <b>Males</b>                  | <b>309</b>    | <b>11</b>   | <b>318</b>    | <b>11</b>   | <b>405</b>    | <b>14</b>   | <b>399</b>    | <b>13</b>   | <b>450</b>    | <b>14</b>   | <b>477</b>    | <b>15</b>   | <b>586</b>    | <b>17</b>   | <b>676</b>    | <b>19</b>   | <b>694</b>    | <b>19</b>   | <b>751</b>    | <b>22</b>   |
| <b>Females</b>                | <b>596</b>    | <b>12</b>   | <b>655</b>    | <b>13</b>   | <b>880</b>    | <b>17</b>   | <b>941</b>    | <b>17</b>   | <b>1,096</b>  | <b>20</b>   | <b>1,074</b>  | <b>19</b>   | <b>1,194</b>  | <b>20</b>   | <b>1,445</b>  | <b>23</b>   | <b>1,431</b>  | <b>22</b>   | <b>1,491</b>  | <b>26</b>   |
| <b>White</b>                  | <b>719</b>    | <b>15</b>   | <b>755</b>    | <b>15</b>   | <b>957</b>    | <b>19</b>   | <b>975</b>    | <b>19</b>   | <b>1,132</b>  | <b>22</b>   | <b>1,105</b>  | <b>22</b>   | <b>1,297</b>  | <b>25</b>   | <b>1,487</b>  | <b>27</b>   | <b>1,480</b>  | <b>26</b>   | <b>1,509</b>  | <b>31</b>   |
| <b>Hispanic</b>               | <b>73</b>     | <b>6</b>    | <b>93</b>     | <b>7</b>    | <b>161</b>    | <b>11</b>   | <b>143</b>    | <b>9</b>    | <b>168</b>    | <b>10</b>   | <b>217</b>    | <b>12</b>   | <b>239</b>    | <b>12</b>   | <b>310</b>    | <b>15</b>   | <b>349</b>    | <b>16</b>   | <b>376</b>    | <b>20</b>   |
| <b>Black</b>                  | <b>90</b>     | <b>14</b>   | <b>97</b>     | <b>14</b>   | <b>119</b>    | <b>17</b>   | <b>155</b>    | <b>21</b>   | <b>176</b>    | <b>24</b>   | <b>151</b>    | <b>21</b>   | <b>159</b>    | <b>21</b>   | <b>204</b>    | <b>25</b>   | <b>184</b>    | <b>22</b>   | <b>186</b>    | <b>25</b>   |
| <b>Asian/Pacific Islander</b> | <b>22</b>     | <b>3</b>    | <b>25</b>     | <b>3</b>    | <b>42</b>     | <b>4</b>    | <b>65</b>     | <b>6</b>    | <b>69</b>     | <b>6</b>    | <b>76</b>     | <b>6</b>    | <b>80</b>     | <b>6</b>    | <b>116</b>    | <b>8</b>    | <b>108</b>    | <b>7</b>    | <b>167</b>    | <b>12</b>   |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>238</b>    | <b>14</b>   | <b>246</b>    | <b>14</b>   | <b>295</b>    | <b>16</b>   | <b>289</b>    | <b>16</b>   | <b>319</b>    | <b>17</b>   | <b>336</b>    | <b>19</b>   | <b>417</b>    | <b>22</b>   | <b>478</b>    | <b>24</b>   | <b>497</b>    | <b>24</b>   | <b>510</b>    | <b>28</b>   |
| <b>Hispanic</b>               | <b>30</b>     | <b>7</b>    | <b>37</b>     | <b>7</b>    | <b>46</b>     | <b>9</b>    | <b>46</b>     | <b>8</b>    | <b>53</b>     | <b>8</b>    | <b>71</b>     | <b>11</b>   | <b>71</b>     | <b>10</b>   | <b>91</b>     | <b>12</b>   | <b>108</b>    | <b>14</b>   | <b>133</b>    | <b>19</b>   |
| <b>Black</b>                  | <b>34</b>     | <b>14</b>   | <b>28</b>     | <b>12</b>   | <b>37</b>     | <b>15</b>   | <b>40</b>     | <b>17</b>   | <b>55</b>     | <b>22</b>   | <b>45</b>     | <b>19</b>   | <b>63</b>     | <b>24</b>   | <b>58</b>     | <b>21</b>   | <b>51</b>     | <b>19</b>   | <b>55</b>     | <b>22</b>   |
| <b>Asian/Pacific Islander</b> | <b>7</b>      | <b>--</b>   | <b>6</b>      | <b>--</b>   | <b>23</b>     | <b>6</b>    | <b>24</b>     | <b>5</b>    | <b>23</b>     | <b>5</b>    | <b>25</b>     | <b>5</b>    | <b>33</b>     | <b>6</b>    | <b>47</b>     | <b>8</b>    | <b>36</b>     | <b>6</b>    | <b>52</b>     | <b>9</b>    |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>481</b>    | <b>16</b>   | <b>509</b>    | <b>16</b>   | <b>662</b>    | <b>21</b>   | <b>686</b>    | <b>21</b>   | <b>813</b>    | <b>25</b>   | <b>769</b>    | <b>24</b>   | <b>880</b>    | <b>27</b>   | <b>1,009</b>  | <b>29</b>   | <b>983</b>    | <b>28</b>   | <b>999</b>    | <b>32</b>   |
| <b>Hispanic</b>               | <b>43</b>     | <b>5</b>    | <b>56</b>     | <b>6</b>    | <b>115</b>    | <b>12</b>   | <b>97</b>     | <b>10</b>   | <b>115</b>    | <b>10</b>   | <b>146</b>    | <b>12</b>   | <b>168</b>    | <b>13</b>   | <b>219</b>    | <b>16</b>   | <b>241</b>    | <b>17</b>   | <b>243</b>    | <b>20</b>   |
| <b>Black</b>                  | <b>56</b>     | <b>13</b>   | <b>69</b>     | <b>15</b>   | <b>82</b>     | <b>17</b>   | <b>115</b>    | <b>24</b>   | <b>121</b>    | <b>24</b>   | <b>106</b>    | <b>21</b>   | <b>96</b>     | <b>19</b>   | <b>146</b>    | <b>27</b>   | <b>133</b>    | <b>24</b>   | <b>131</b>    | <b>26</b>   |
| <b>Asian/Pacific Islander</b> | <b>15</b>     | <b>--</b>   | <b>19</b>     | <b>--</b>   | <b>19</b>     | <b>--</b>   | <b>41</b>     | <b>6</b>    | <b>46</b>     | <b>7</b>    | <b>51</b>     | <b>7</b>    | <b>47</b>     | <b>6</b>    | <b>69</b>     | <b>8</b>    | <b>72</b>     | <b>8</b>    | <b>115</b>    | <b>13</b>   |
| <b>SPA 1: Antelope Valley</b> | <b>26</b>     | <b>15</b>   | <b>39</b>     | <b>21</b>   | <b>43</b>     | <b>24</b>   | <b>43</b>     | <b>24</b>   | <b>60</b>     | <b>31</b>   | <b>50</b>     | <b>25</b>   | <b>70</b>     | <b>32</b>   | <b>74</b>     | <b>32</b>   | <b>72</b>     | <b>31</b>   | <b>86</b>     | <b>39</b>   |
| <b>SPA 2: San Fernando</b>    | <b>206</b>    | <b>12</b>   | <b>255</b>    | <b>15</b>   | <b>325</b>    | <b>18</b>   | <b>343</b>    | <b>19</b>   | <b>409</b>    | <b>22</b>   | <b>407</b>    | <b>22</b>   | <b>490</b>    | <b>25</b>   | <b>595</b>    | <b>28</b>   | <b>568</b>    | <b>26</b>   | <b>606</b>    | <b>29</b>   |
| <b>SPA 3: San Gabriel</b>     | <b>177</b>    | <b>12</b>   | <b>210</b>    | <b>14</b>   | <b>273</b>    | <b>17</b>   | <b>268</b>    | <b>16</b>   | <b>307</b>    | <b>18</b>   | <b>313</b>    | <b>18</b>   | <b>384</b>    | <b>21</b>   | <b>381</b>    | <b>20</b>   | <b>399</b>    | <b>20</b>   | <b>422</b>    | <b>23</b>   |
| <b>SPA 4: Metro</b>           | <b>101</b>    | <b>10</b>   | <b>102</b>    | <b>10</b>   | <b>119</b>    | <b>11</b>   | <b>120</b>    | <b>11</b>   | <b>137</b>    | <b>12</b>   | <b>142</b>    | <b>13</b>   | <b>131</b>    | <b>11</b>   | <b>189</b>    | <b>15</b>   | <b>169</b>    | <b>13</b>   | <b>190</b>    | <b>19</b>   |
| <b>SPA 5: West</b>            | <b>75</b>     | <b>10</b>   | <b>77</b>     | <b>10</b>   | <b>115</b>    | <b>15</b>   | <b>133</b>    | <b>16</b>   | <b>161</b>    | <b>20</b>   | <b>116</b>    | <b>15</b>   | <b>167</b>    | <b>21</b>   | <b>198</b>    | <b>23</b>   | <b>216</b>    | <b>24</b>   | <b>210</b>    | <b>24</b>   |
| <b>SPA 6: South</b>           | <b>63</b>     | <b>12</b>   | <b>60</b>     | <b>11</b>   | <b>75</b>     | <b>13</b>   | <b>108</b>    | <b>18</b>   | <b>101</b>    | <b>16</b>   | <b>99</b>     | <b>16</b>   | <b>89</b>     | <b>14</b>   | <b>128</b>    | <b>19</b>   | <b>128</b>    | <b>18</b>   | <b>96</b>     | <b>17</b>   |
| <b>SPA 7: East</b>            | <b>93</b>     | <b>10</b>   | <b>93</b>     | <b>10</b>   | <b>135</b>    | <b>13</b>   | <b>144</b>    | <b>13</b>   | <b>148</b>    | <b>13</b>   | <b>194</b>    | <b>17</b>   | <b>170</b>    | <b>14</b>   | <b>240</b>    | <b>20</b>   | <b>262</b>    | <b>21</b>   | <b>293</b>    | <b>27</b>   |
| <b>SPA 8: South Bay</b>       | <b>158</b>    | <b>14</b>   | <b>132</b>    | <b>11</b>   | <b>196</b>    | <b>16</b>   | <b>175</b>    | <b>14</b>   | <b>222</b>    | <b>17</b>   | <b>221</b>    | <b>17</b>   | <b>272</b>    | <b>19</b>   | <b>309</b>    | <b>21</b>   | <b>311</b>    | <b>20</b>   | <b>339</b>    | <b>24</b>   |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

--Number of deaths is too small to calculate a reliable rate.

# Breast Cancer (Female)

2nd cause of premature death (females)  
6th cause of death (females)

**BREAST CANCER** was the leading cause of premature death for Asian/Pacific Islander women, and the second-leading cause of premature death for white, black, and Hispanic women. The median age at death was 60 years for Hispanic women, 61 for Asians/Pacific Islanders, 62 for blacks, and 69 for whites. The death rate among black women, 36 deaths per 100,000 females, was substantially higher than the overall County rate.

### In simple terms . . .

Cancer is a term for diseases in which cells in your body grow out of control. Cancer cells can invade nearby tissue and spread to other parts of the body through the blood and lymph systems. Breast cancer starts in the cells of the breast. Men can get breast cancer, but it is uncommon.

### Risk factors (for women)

Age, family or personal history of breast cancer, having a BRCA 1/2 gene mutation, history of radiation treatment to the chest area, early menstruation (before age 12), late menopause (after age 55), never giving birth, excessive alcohol consumption, long-term use of combined hormone replacement therapy, being overweight, lack of physical activity

### Community opportunities for prevention

- Promote the availability of breast cancer screening and follow-up
- Provide education on the importance of receiving breast cancer screening on-schedule
- Promote physical activity by providing access to safe places like parks and schools to walk, play, and exercise

### Individual opportunities for prevention

- Follow recommended guidelines for breast cancer screening\* and follow-up.
- Know your family history of breast cancer
- Limit alcohol consumption
- Maintain a healthy weight
- Eat a healthy diet that is rich in fruits, vegetables, and whole grains
- Make time to be physically active every day with your children, partner, pet, friends, or on your own
- Talk to your doctor about the risks and benefits of hormone replacement therapy

\*Available at <http://www.uspreventiveservicestaskforce.org/uspstf/uspbrca.htm>

## LOS ANGELES COUNTY

Deaths 1,109  
Death Rate 21.1 deaths per 100,000 females

Healthy People 2010 Objective 3-3 21.3 deaths per 100,000 females

ICD-9 codes (1979-1998) 174-175

ICD-10 codes (1999-2010) C50

- References
- American Cancer Society**  
[www.cancer.org](http://www.cancer.org)
  - National Cancer Institute, Surveillance, Epidemiology and End Results (SEER) Program**  
[www.seer.cancer.gov/registries/los\\_angeles.html](http://www.seer.cancer.gov/registries/los_angeles.html)
  - Centers for Disease Control and Prevention**  
[www.cdc.gov/cancer/breast](http://www.cdc.gov/cancer/breast)
  - Guide to Community Preventive Services**  
[www.thecommunityguide.org](http://www.thecommunityguide.org)

- Referral
- CA Department of Public Health, Cancer Detection Programs Every Woman Counts**  
1-800-511-2300
  - Los Angeles County Department of Public Health, Office of Women's Health Hotline**  
1-800-793-8090

**Figure T4.** Trends in breast cancer (female) mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>1,088</b>  | <b>24</b>   | <b>1,052</b>  | <b>23</b>   | <b>1,074</b>  | <b>22</b>   | <b>1,157</b>  | <b>24</b>   | <b>1,168</b>  | <b>23</b>   | <b>1,063</b>  | <b>21</b>   | <b>1,127</b>  | <b>22</b>   | <b>1,071</b>  | <b>20</b>   | <b>1,166</b>  | <b>21</b>   | <b>1,109</b>  | <b>21</b>   |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>621</b>    | <b>28</b>   | <b>612</b>    | <b>27</b>   | <b>570</b>    | <b>25</b>   | <b>613</b>    | <b>27</b>   | <b>631</b>    | <b>27</b>   | <b>557</b>    | <b>25</b>   | <b>571</b>    | <b>24</b>   | <b>560</b>    | <b>23</b>   | <b>593</b>    | <b>25</b>   | <b>532</b>    | <b>24</b>   |
| <b>Hispanic</b>               | <b>213</b>    | <b>17</b>   | <b>176</b>    | <b>14</b>   | <b>242</b>    | <b>17</b>   | <b>222</b>    | <b>15</b>   | <b>223</b>    | <b>15</b>   | <b>237</b>    | <b>15</b>   | <b>249</b>    | <b>15</b>   | <b>221</b>    | <b>14</b>   | <b>262</b>    | <b>16</b>   | <b>247</b>    | <b>15</b>   |
| <b>Black</b>                  | <b>159</b>    | <b>34</b>   | <b>150</b>    | <b>31</b>   | <b>158</b>    | <b>32</b>   | <b>199</b>    | <b>40</b>   | <b>181</b>    | <b>36</b>   | <b>164</b>    | <b>32</b>   | <b>194</b>    | <b>37</b>   | <b>180</b>    | <b>34</b>   | <b>187</b>    | <b>35</b>   | <b>187</b>    | <b>36</b>   |
| <b>Asian/Pacific Islander</b> | <b>91</b>     | <b>14</b>   | <b>112</b>    | <b>16</b>   | <b>102</b>    | <b>14</b>   | <b>120</b>    | <b>16</b>   | <b>132</b>    | <b>17</b>   | <b>101</b>    | <b>12</b>   | <b>112</b>    | <b>13</b>   | <b>108</b>    | <b>12</b>   | <b>120</b>    | <b>14</b>   | <b>137</b>    | <b>15</b>   |
| <b>SPA 1: Antelope Valley</b> | <b>30</b>     | <b>25</b>   | <b>36</b>     | <b>29</b>   | <b>41</b>     | <b>30</b>   | <b>30</b>     | <b>23</b>   | <b>51</b>     | <b>36</b>   | <b>40</b>     | <b>27</b>   | <b>39</b>     | <b>26</b>   | <b>38</b>     | <b>25</b>   | <b>34</b>     | <b>22</b>   | <b>42</b>     | <b>26</b>   |
| <b>SPA 2: San Fernando</b>    | <b>253</b>    | <b>26</b>   | <b>242</b>    | <b>24</b>   | <b>238</b>    | <b>23</b>   | <b>241</b>    | <b>22</b>   | <b>261</b>    | <b>24</b>   | <b>264</b>    | <b>23</b>   | <b>249</b>    | <b>22</b>   | <b>240</b>    | <b>20</b>   | <b>235</b>    | <b>19</b>   | <b>251</b>    | <b>21</b>   |
| <b>SPA 3: San Gabriel</b>     | <b>213</b>    | <b>24</b>   | <b>203</b>    | <b>22</b>   | <b>185</b>    | <b>20</b>   | <b>209</b>    | <b>22</b>   | <b>204</b>    | <b>21</b>   | <b>192</b>    | <b>19</b>   | <b>202</b>    | <b>20</b>   | <b>187</b>    | <b>18</b>   | <b>233</b>    | <b>22</b>   | <b>230</b>    | <b>22</b>   |
| <b>SPA 4: Metro</b>           | <b>97</b>     | <b>19</b>   | <b>117</b>    | <b>22</b>   | <b>104</b>    | <b>19</b>   | <b>130</b>    | <b>22</b>   | <b>117</b>    | <b>20</b>   | <b>104</b>    | <b>17</b>   | <b>120</b>    | <b>19</b>   | <b>108</b>    | <b>17</b>   | <b>92</b>     | <b>15</b>   | <b>86</b>     | <b>15</b>   |
| <b>SPA 5: West</b>            | <b>79</b>     | <b>22</b>   | <b>101</b>    | <b>27</b>   | <b>88</b>     | <b>23</b>   | <b>97</b>     | <b>26</b>   | <b>99</b>     | <b>25</b>   | <b>85</b>     | <b>22</b>   | <b>84</b>     | <b>20</b>   | <b>98</b>     | <b>23</b>   | <b>96</b>     | <b>22</b>   | <b>83</b>     | <b>20</b>   |
| <b>SPA 6: South</b>           | <b>83</b>     | <b>23</b>   | <b>89</b>     | <b>24</b>   | <b>97</b>     | <b>26</b>   | <b>113</b>    | <b>28</b>   | <b>113</b>    | <b>29</b>   | <b>110</b>    | <b>27</b>   | <b>100</b>    | <b>24</b>   | <b>104</b>    | <b>25</b>   | <b>121</b>    | <b>28</b>   | <b>120</b>    | <b>29</b>   |
| <b>SPA 7: East</b>            | <b>132</b>    | <b>24</b>   | <b>105</b>    | <b>18</b>   | <b>144</b>    | <b>24</b>   | <b>130</b>    | <b>21</b>   | <b>130</b>    | <b>21</b>   | <b>122</b>    | <b>19</b>   | <b>142</b>    | <b>22</b>   | <b>117</b>    | <b>17</b>   | <b>153</b>    | <b>23</b>   | <b>118</b>    | <b>18</b>   |
| <b>SPA 8: South Bay</b>       | <b>193</b>    | <b>27</b>   | <b>159</b>    | <b>22</b>   | <b>171</b>    | <b>23</b>   | <b>201</b>    | <b>26</b>   | <b>192</b>    | <b>24</b>   | <b>143</b>    | <b>18</b>   | <b>185</b>    | <b>22</b>   | <b>176</b>    | <b>21</b>   | <b>202</b>    | <b>23</b>   | <b>178</b>    | <b>21</b>   |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

# Colorectal Cancer

**11th** cause of premature death  
**8th** cause of death

**COLORECTAL CANCER** has been the eighth-leading cause of death overall since 2005. In 2010, it was the 11th-leading cause of premature death overall, but it was the sixth-leading cause of premature death for Asians/Pacific Islanders. The overall colorectal cancer death rate was 14 deaths per 100,000 population. The highest death rate, 28 deaths per 100,000 population, was among black men.

## In simple terms . . .

Cancer is a term for diseases in which cells in your body grow out of control. Cancer cells can invade nearby tissue and spread to other parts of the body through the blood and lymph systems. Colorectal cancer starts in the cells of the colon or rectum.

## Risk factors

Age, family history of colorectal cancer or colorectal polyps, inflammatory bowel disease (e.g., ulcerative colitis or Crohn's disease), inherited genetic syndromes related to colorectal cancer, (e.g., familial adenomatous polyposis (FAP) or hereditary non-polyposis colorectal cancer (Lynch syndrome)), excessive alcohol consumption, tobacco use, being overweight, lack of physical activity

## Community opportunities for prevention

- Promote the availability of colorectal cancer screening and follow-up
- Provide education on the importance of receiving colorectal cancer screening on-schedule
- Promote physical activity by providing access to safe places like parks and schools to walk, play, and exercise

## Individual opportunities for prevention

- Follow recommended guidelines for colorectal cancer screening\* that can detect colon cancer early, and remove precancerous colorectal polyps and early cancer growths
- Know your family history of colorectal cancer
- Limit alcohol consumption
- Maintain a healthy weight
- Eat a healthy diet that is rich in fruits, vegetables, and whole grains
- Make time to be physically active every day with your children, partner, pet, friends, or on your own

\*Available at [www.uspreventiveservicestaskforce.org/uspstf/uspscolo.htm](http://www.uspreventiveservicestaskforce.org/uspstf/uspscolo.htm)

## LOS ANGELES COUNTY

Deaths 1,285  
Death Rate 14.0 deaths per 100,000 population

Healthy People 2010 Objective 3-5 13.7 deaths per 100,000 population

ICD-9 codes (1979-1998) 153-154

ICD-10 codes (1999-2010) C18-C21

References **American Cancer Society**  
[www.cancer.org](http://www.cancer.org)  
**National Cancer Institute**  
[www.cancer.gov](http://www.cancer.gov)  
**National Cancer Institute, Surveillance, Epidemiology and End Results (SEER) Program**  
[www.seer.cancer.gov/registries/los\\_angeles.html](http://www.seer.cancer.gov/registries/los_angeles.html)  
**Guide to Community Preventive Services**  
[www.thecommunityguide.org](http://www.thecommunityguide.org)

Referral **American Cancer Society Helpline**  
1-800-227-2345

Figure T5. Trends in colorectal cancer mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>1,423</b>  | <b>18</b>   | <b>1,315</b>  | <b>16</b>   | <b>1,450</b>  | <b>17</b>   | <b>1,414</b>  | <b>17</b>   | <b>1,409</b>  | <b>16</b>   | <b>1,362</b>  | <b>15</b>   | <b>1,323</b>  | <b>14</b>   | <b>1,365</b>  | <b>14</b>   | <b>1,388</b>  | <b>14</b>   | <b>1,285</b>  | <b>14</b>   |
| <b>Males</b>                  | <b>722</b>    | <b>22</b>   | <b>655</b>    | <b>19</b>   | <b>710</b>    | <b>20</b>   | <b>674</b>    | <b>19</b>   | <b>708</b>    | <b>19</b>   | <b>686</b>    | <b>18</b>   | <b>686</b>    | <b>18</b>   | <b>703</b>    | <b>17</b>   | <b>710</b>    | <b>17</b>   | <b>663</b>    | <b>17</b>   |
| <b>Females</b>                | <b>701</b>    | <b>15</b>   | <b>660</b>    | <b>14</b>   | <b>740</b>    | <b>15</b>   | <b>740</b>    | <b>15</b>   | <b>701</b>    | <b>14</b>   | <b>676</b>    | <b>13</b>   | <b>637</b>    | <b>12</b>   | <b>662</b>    | <b>12</b>   | <b>678</b>    | <b>12</b>   | <b>622</b>    | <b>12</b>   |
| <b>White</b>                  | <b>812</b>    | <b>19</b>   | <b>763</b>    | <b>18</b>   | <b>824</b>    | <b>19</b>   | <b>767</b>    | <b>18</b>   | <b>737</b>    | <b>17</b>   | <b>689</b>    | <b>16</b>   | <b>689</b>    | <b>15</b>   | <b>660</b>    | <b>14</b>   | <b>696</b>    | <b>15</b>   | <b>619</b>    | <b>15</b>   |
| <b>Hispanic</b>               | <b>217</b>    | <b>12</b>   | <b>206</b>    | <b>11</b>   | <b>241</b>    | <b>12</b>   | <b>230</b>    | <b>11</b>   | <b>270</b>    | <b>12</b>   | <b>275</b>    | <b>12</b>   | <b>264</b>    | <b>11</b>   | <b>306</b>    | <b>12</b>   | <b>286</b>    | <b>11</b>   | <b>296</b>    | <b>11</b>   |
| <b>Black</b>                  | <b>227</b>    | <b>30</b>   | <b>192</b>    | <b>25</b>   | <b>211</b>    | <b>26</b>   | <b>237</b>    | <b>29</b>   | <b>213</b>    | <b>26</b>   | <b>223</b>    | <b>27</b>   | <b>181</b>    | <b>22</b>   | <b>196</b>    | <b>22</b>   | <b>209</b>    | <b>24</b>   | <b>195</b>    | <b>23</b>   |
| <b>Asian/Pacific Islander</b> | <b>164</b>    | <b>16</b>   | <b>148</b>    | <b>13</b>   | <b>170</b>    | <b>14</b>   | <b>177</b>    | <b>15</b>   | <b>184</b>    | <b>14</b>   | <b>171</b>    | <b>13</b>   | <b>184</b>    | <b>13</b>   | <b>197</b>    | <b>13</b>   | <b>195</b>    | <b>13</b>   | <b>173</b>    | <b>11</b>   |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>409</b>    | <b>23</b>   | <b>368</b>    | <b>20</b>   | <b>401</b>    | <b>22</b>   | <b>358</b>    | <b>20</b>   | <b>365</b>    | <b>20</b>   | <b>350</b>    | <b>19</b>   | <b>352</b>    | <b>19</b>   | <b>325</b>    | <b>17</b>   | <b>345</b>    | <b>17</b>   | <b>317</b>    | <b>17</b>   |
| <b>Hispanic</b>               | <b>116</b>    | <b>16</b>   | <b>111</b>    | <b>14</b>   | <b>127</b>    | <b>14</b>   | <b>116</b>    | <b>15</b>   | <b>154</b>    | <b>17</b>   | <b>134</b>    | <b>14</b>   | <b>146</b>    | <b>14</b>   | <b>167</b>    | <b>15</b>   | <b>169</b>    | <b>16</b>   | <b>157</b>    | <b>14</b>   |
| <b>Black</b>                  | <b>107</b>    | <b>37</b>   | <b>94</b>     | <b>30</b>   | <b>90</b>     | <b>28</b>   | <b>111</b>    | <b>34</b>   | <b>102</b>    | <b>29</b>   | <b>110</b>    | <b>33</b>   | <b>88</b>     | <b>27</b>   | <b>96</b>     | <b>27</b>   | <b>95</b>     | <b>26</b>   | <b>97</b>     | <b>28</b>   |
| <b>Asian/Pacific Islander</b> | <b>88</b>     | <b>19</b>   | <b>79</b>     | <b>17</b>   | <b>90</b>     | <b>17</b>   | <b>87</b>     | <b>16</b>   | <b>82</b>     | <b>14</b>   | <b>89</b>     | <b>15</b>   | <b>98</b>     | <b>16</b>   | <b>111</b>    | <b>17</b>   | <b>101</b>    | <b>15</b>   | <b>91</b>     | <b>14</b>   |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>403</b>    | <b>16</b>   | <b>395</b>    | <b>15</b>   | <b>423</b>    | <b>16</b>   | <b>409</b>    | <b>16</b>   | <b>372</b>    | <b>14</b>   | <b>339</b>    | <b>13</b>   | <b>337</b>    | <b>13</b>   | <b>335</b>    | <b>13</b>   | <b>351</b>    | <b>13</b>   | <b>302</b>    | <b>13</b>   |
| <b>Hispanic</b>               | <b>101</b>    | <b>10</b>   | <b>95</b>     | <b>9</b>    | <b>114</b>    | <b>10</b>   | <b>114</b>    | <b>9</b>    | <b>116</b>    | <b>9</b>    | <b>141</b>    | <b>10</b>   | <b>118</b>    | <b>8</b>    | <b>139</b>    | <b>9</b>    | <b>117</b>    | <b>8</b>    | <b>139</b>    | <b>9</b>    |
| <b>Black</b>                  | <b>120</b>    | <b>27</b>   | <b>98</b>     | <b>21</b>   | <b>121</b>    | <b>25</b>   | <b>126</b>    | <b>26</b>   | <b>111</b>    | <b>23</b>   | <b>113</b>    | <b>23</b>   | <b>93</b>     | <b>18</b>   | <b>100</b>    | <b>19</b>   | <b>114</b>    | <b>22</b>   | <b>98</b>     | <b>20</b>   |
| <b>Asian/Pacific Islander</b> | <b>76</b>     | <b>13</b>   | <b>69</b>     | <b>11</b>   | <b>80</b>     | <b>12</b>   | <b>90</b>     | <b>13</b>   | <b>102</b>    | <b>14</b>   | <b>82</b>     | <b>11</b>   | <b>86</b>     | <b>11</b>   | <b>86</b>     | <b>10</b>   | <b>94</b>     | <b>11</b>   | <b>82</b>     | <b>9</b>    |
| <b>SPA 1: Antelope Valley</b> | <b>45</b>     | <b>22</b>   | <b>43</b>     | <b>21</b>   | <b>60</b>     | <b>27</b>   | <b>59</b>     | <b>26</b>   | <b>56</b>     | <b>24</b>   | <b>30</b>     | <b>13</b>   | <b>35</b>     | <b>14</b>   | <b>36</b>     | <b>14</b>   | <b>52</b>     | <b>20</b>   | <b>49</b>     | <b>17</b>   |
| <b>SPA 2: San Fernando</b>    | <b>304</b>    | <b>18</b>   | <b>286</b>    | <b>16</b>   | <b>292</b>    | <b>16</b>   | <b>322</b>    | <b>17</b>   | <b>327</b>    | <b>17</b>   | <b>306</b>    | <b>16</b>   | <b>306</b>    | <b>16</b>   | <b>301</b>    | <b>14</b>   | <b>294</b>    | <b>13</b>   | <b>281</b>    | <b>14</b>   |
| <b>SPA 3: San Gabriel</b>     | <b>266</b>    | <b>18</b>   | <b>255</b>    | <b>16</b>   | <b>278</b>    | <b>17</b>   | <b>248</b>    | <b>15</b>   | <b>286</b>    | <b>17</b>   | <b>267</b>    | <b>15</b>   | <b>239</b>    | <b>13</b>   | <b>251</b>    | <b>13</b>   | <b>263</b>    | <b>14</b>   | <b>250</b>    | <b>14</b>   |
| <b>SPA 4: Metro</b>           | <b>176</b>    | <b>19</b>   | <b>149</b>    | <b>15</b>   | <b>163</b>    | <b>16</b>   | <b>146</b>    | <b>14</b>   | <b>148</b>    | <b>14</b>   | <b>151</b>    | <b>14</b>   | <b>149</b>    | <b>13</b>   | <b>154</b>    | <b>13</b>   | <b>149</b>    | <b>13</b>   | <b>133</b>    | <b>13</b>   |
| <b>SPA 5: West</b>            | <b>115</b>    | <b>17</b>   | <b>95</b>     | <b>14</b>   | <b>110</b>    | <b>16</b>   | <b>89</b>     | <b>13</b>   | <b>103</b>    | <b>14</b>   | <b>89</b>     | <b>12</b>   | <b>108</b>    | <b>15</b>   | <b>98</b>     | <b>13</b>   | <b>102</b>    | <b>13</b>   | <b>92</b>     | <b>12</b>   |
| <b>SPA 6: South</b>           | <b>133</b>    | <b>23</b>   | <b>133</b>    | <b>22</b>   | <b>137</b>    | <b>22</b>   | <b>149</b>    | <b>23</b>   | <b>134</b>    | <b>20</b>   | <b>143</b>    | <b>21</b>   | <b>112</b>    | <b>16</b>   | <b>128</b>    | <b>18</b>   | <b>140</b>    | <b>20</b>   | <b>117</b>    | <b>17</b>   |
| <b>SPA 7: East</b>            | <b>157</b>    | <b>16</b>   | <b>149</b>    | <b>15</b>   | <b>159</b>    | <b>15</b>   | <b>159</b>    | <b>15</b>   | <b>148</b>    | <b>13</b>   | <b>161</b>    | <b>14</b>   | <b>160</b>    | <b>14</b>   | <b>163</b>    | <b>14</b>   | <b>152</b>    | <b>13</b>   | <b>149</b>    | <b>13</b>   |
| <b>SPA 8: South Bay</b>       | <b>219</b>    | <b>18</b>   | <b>202</b>    | <b>16</b>   | <b>241</b>    | <b>19</b>   | <b>230</b>    | <b>17</b>   | <b>204</b>    | <b>15</b>   | <b>213</b>    | <b>15</b>   | <b>208</b>    | <b>14</b>   | <b>229</b>    | <b>15</b>   | <b>235</b>    | <b>15</b>   | <b>213</b>    | <b>15</b>   |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

# Coronary Heart Disease

1st cause of premature death

1st cause of death

**DURING THE LAST 10 YEARS**, *though the death rate from coronary heart disease decreased 37%, it remained the overall leading cause of death and premature death. In 2010, the highest death rate, 273 deaths per 100,000 population, was among black men, while the lowest death rate, 77 deaths per 100,000 population, was among Asian/Pacific Islander women. The overall death rate from coronary heart disease has been below the Healthy People 2010 goal since 2007.*

## In simple terms . . .

Coronary heart disease is a condition where a substance called plaque builds up in the arteries that supply blood to the heart (called coronary arteries). This plaque, which is made up of cholesterol deposits, can build up and cause arteries to narrow over time.

This artery narrowing can cause chest pain or discomfort (angina) when the heart muscle doesn't get enough blood, or can result in a heart attack, which occurs when plaque completely blocks an artery carrying blood to the heart. This can happen when a plaque deposit breaks off and clogs a coronary artery.

## Risk factors

Age, male gender, family history of early heart disease, previous heart attack or angina, tobacco use, high cholesterol, high blood pressure, excessive alcohol consumption, diabetes, being overweight, lack of physical activity

## Community opportunities for prevention

- Promote physical activity by providing access to safe places like parks and schools to walk, play, and exercise
- Restrict smoking in public places and worksites
- Provide access to smoking cessation programs

## Individual opportunities for prevention

- Know your family history of heart disease
- If you smoke, get help to quit (1-800-NO-BUTTS)
- Work with your health care provider to maintain good control of diabetes, cholesterol, blood pressure, and vitamin D level
- Maintain a healthy weight
- Eat a healthy diet that is rich in fruits, vegetables, whole grains, nuts, fiber, and omega-3
- Make time to be physically active every day with your children, partner, pet, friends, or on your own

## LOS ANGELES COUNTY

|            |                                   |
|------------|-----------------------------------|
| Deaths     | 12,635                            |
| Death Rate | 138 deaths per 100,000 population |

|                                    |                                   |
|------------------------------------|-----------------------------------|
| Healthy People 2010 Objective 12-1 | 162 deaths per 100,000 population |
|------------------------------------|-----------------------------------|

|                         |                     |
|-------------------------|---------------------|
| ICD-9 codes (1979-1998) | 402, 410-414, 429.2 |
|-------------------------|---------------------|

|                          |              |
|--------------------------|--------------|
| ICD-10 codes (1999-2010) | I11, I20-I25 |
|--------------------------|--------------|

|            |   |
|------------|---|
| References | <b>American Heart Association</b><br><a href="http://www.americanheart.org">www.americanheart.org</a> |
|------------|---|

**Centers for Disease Control and Prevention**  
[www.cdc.gov/heartdisease](http://www.cdc.gov/heartdisease)

**The Million Hearts Initiative**  
[www.millionhearts.hhs.gov](http://www.millionhearts.hhs.gov)

|          |  |
|----------|--|
| Referral | <b>Los Angeles County Division of the American Heart Association</b><br>213-291-7000 |
|----------|--|

**Figure T6.** Trends in coronary heart disease mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>16,828</b> | <b>220</b>  | <b>16,293</b> | <b>204</b>  | <b>16,320</b> | <b>197</b>  | <b>15,296</b> | <b>180</b>  | <b>15,154</b> | <b>174</b>  | <b>14,842</b> | <b>168</b>  | <b>13,890</b> | <b>150</b>  | <b>13,428</b> | <b>139</b>  | <b>12,725</b> | <b>129</b>  | <b>12,635</b> | <b>138</b>  |
| <b>Males</b>                  | <b>8,343</b>  | <b>272</b>  | <b>8,029</b>  | <b>250</b>  | <b>8,131</b>  | <b>243</b>  | <b>7,662</b>  | <b>222</b>  | <b>7,613</b>  | <b>215</b>  | <b>7,541</b>  | <b>210</b>  | <b>7,082</b>  | <b>188</b>  | <b>7,001</b>  | <b>178</b>  | <b>6,638</b>  | <b>163</b>  | <b>6,651</b>  | <b>175</b>  |
| <b>Females</b>                | <b>8,485</b>  | <b>179</b>  | <b>8,264</b>  | <b>168</b>  | <b>8,189</b>  | <b>161</b>  | <b>7,634</b>  | <b>146</b>  | <b>7,541</b>  | <b>141</b>  | <b>7,301</b>  | <b>135</b>  | <b>6,808</b>  | <b>120</b>  | <b>6,427</b>  | <b>109</b>  | <b>6,087</b>  | <b>101</b>  | <b>5,984</b>  | <b>108</b>  |
| <b>White</b>                  | <b>10,592</b> | <b>238</b>  | <b>10,016</b> | <b>219</b>  | <b>10,003</b> | <b>216</b>  | <b>9,236</b>  | <b>197</b>  | <b>8,953</b>  | <b>190</b>  | <b>8,653</b>  | <b>185</b>  | <b>7,994</b>  | <b>167</b>  | <b>7,596</b>  | <b>154</b>  | <b>6,980</b>  | <b>138</b>  | <b>6,845</b>  | <b>151</b>  |
| <b>Hispanic</b>               | <b>2,571</b>  | <b>170</b>  | <b>2,600</b>  | <b>160</b>  | <b>2,632</b>  | <b>151</b>  | <b>2,626</b>  | <b>141</b>  | <b>2,766</b>  | <b>139</b>  | <b>2,675</b>  | <b>129</b>  | <b>2,475</b>  | <b>109</b>  | <b>2,536</b>  | <b>108</b>  | <b>2,428</b>  | <b>99</b>   | <b>2,555</b>  | <b>111</b>  |
| <b>Black</b>                  | <b>2,308</b>  | <b>316</b>  | <b>2,262</b>  | <b>301</b>  | <b>2,269</b>  | <b>292</b>  | <b>2,085</b>  | <b>264</b>  | <b>2,045</b>  | <b>254</b>  | <b>2,053</b>  | <b>255</b>  | <b>1,936</b>  | <b>231</b>  | <b>1,804</b>  | <b>209</b>  | <b>1,878</b>  | <b>211</b>  | <b>1,721</b>  | <b>208</b>  |
| <b>Asian/Pacific Islander</b> | <b>1,319</b>  | <b>141</b>  | <b>1,365</b>  | <b>136</b>  | <b>1,352</b>  | <b>125</b>  | <b>1,292</b>  | <b>113</b>  | <b>1,344</b>  | <b>111</b>  | <b>1,409</b>  | <b>112</b>  | <b>1,452</b>  | <b>106</b>  | <b>1,437</b>  | <b>99</b>   | <b>1,387</b>  | <b>92</b>   | <b>1,451</b>  | <b>98</b>   |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>5,162</b>  | <b>298</b>  | <b>4,878</b>  | <b>273</b>  | <b>4,880</b>  | <b>267</b>  | <b>4,505</b>  | <b>243</b>  | <b>4,362</b>  | <b>234</b>  | <b>4,299</b>  | <b>232</b>  | <b>4,030</b>  | <b>212</b>  | <b>3,905</b>  | <b>197</b>  | <b>3,598</b>  | <b>177</b>  | <b>3,566</b>  | <b>192</b>  |
| <b>Hispanic</b>               | <b>1,338</b>  | <b>214</b>  | <b>1,323</b>  | <b>195</b>  | <b>1,382</b>  | <b>188</b>  | <b>1,415</b>  | <b>180</b>  | <b>1,465</b>  | <b>176</b>  | <b>1,414</b>  | <b>162</b>  | <b>1,319</b>  | <b>136</b>  | <b>1,349</b>  | <b>135</b>  | <b>1,333</b>  | <b>128</b>  | <b>1,372</b>  | <b>138</b>  |
| <b>Black</b>                  | <b>1,124</b>  | <b>395</b>  | <b>1,084</b>  | <b>368</b>  | <b>1,093</b>  | <b>355</b>  | <b>1,012</b>  | <b>325</b>  | <b>1,044</b>  | <b>324</b>  | <b>1,053</b>  | <b>333</b>  | <b>950</b>    | <b>284</b>  | <b>940</b>    | <b>274</b>  | <b>957</b>    | <b>266</b>  | <b>898</b>    | <b>273</b>  |
| <b>Asian/Pacific Islander</b> | <b>701</b>    | <b>172</b>  | <b>714</b>    | <b>162</b>  | <b>739</b>    | <b>156</b>  | <b>696</b>    | <b>141</b>  | <b>717</b>    | <b>138</b>  | <b>748</b>    | <b>138</b>  | <b>761</b>    | <b>131</b>  | <b>770</b>    | <b>126</b>  | <b>718</b>    | <b>113</b>  | <b>776</b>    | <b>128</b>  |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>5,430</b>  | <b>189</b>  | <b>5,138</b>  | <b>175</b>  | <b>5,123</b>  | <b>173</b>  | <b>4,731</b>  | <b>158</b>  | <b>4,591</b>  | <b>153</b>  | <b>4,354</b>  | <b>146</b>  | <b>3,964</b>  | <b>131</b>  | <b>3,691</b>  | <b>118</b>  | <b>3,382</b>  | <b>106</b>  | <b>3,279</b>  | <b>116</b>  |
| <b>Hispanic</b>               | <b>1,233</b>  | <b>139</b>  | <b>1,277</b>  | <b>134</b>  | <b>1,250</b>  | <b>123</b>  | <b>1,211</b>  | <b>112</b>  | <b>1,301</b>  | <b>113</b>  | <b>1,261</b>  | <b>104</b>  | <b>1,156</b>  | <b>88</b>   | <b>1,187</b>  | <b>87</b>   | <b>1,095</b>  | <b>78</b>   | <b>1,183</b>  | <b>90</b>   |
| <b>Black</b>                  | <b>1,184</b>  | <b>262</b>  | <b>1,178</b>  | <b>254</b>  | <b>1,176</b>  | <b>244</b>  | <b>1,073</b>  | <b>220</b>  | <b>1,001</b>  | <b>202</b>  | <b>1,000</b>  | <b>200</b>  | <b>986</b>    | <b>192</b>  | <b>864</b>    | <b>163</b>  | <b>921</b>    | <b>169</b>  | <b>823</b>    | <b>163</b>  |
| <b>Asian/Pacific Islander</b> | <b>618</b>    | <b>118</b>  | <b>651</b>    | <b>114</b>  | <b>613</b>    | <b>101</b>  | <b>596</b>    | <b>92</b>   | <b>627</b>    | <b>91</b>   | <b>661</b>    | <b>91</b>   | <b>691</b>    | <b>86</b>   | <b>667</b>    | <b>78</b>   | <b>669</b>    | <b>75</b>   | <b>675</b>    | <b>77</b>   |
| <b>SPA 1: Antelope Valley</b> | <b>471</b>    | <b>245</b>  | <b>500</b>    | <b>246</b>  | <b>496</b>    | <b>237</b>  | <b>488</b>    | <b>232</b>  | <b>467</b>    | <b>215</b>  | <b>463</b>    | <b>205</b>  | <b>468</b>    | <b>193</b>  | <b>459</b>    | <b>177</b>  | <b>476</b>    | <b>183</b>  | <b>499</b>    | <b>188</b>  |
| <b>SPA 2: San Fernando</b>    | <b>3,577</b>  | <b>213</b>  | <b>3,550</b>  | <b>204</b>  | <b>3,520</b>  | <b>196</b>  | <b>3,419</b>  | <b>187</b>  | <b>3,377</b>  | <b>180</b>  | <b>3,262</b>  | <b>172</b>  | <b>3,071</b>  | <b>155</b>  | <b>3,081</b>  | <b>147</b>  | <b>2,828</b>  | <b>130</b>  | <b>2,852</b>  | <b>137</b>  |
| <b>SPA 3: San Gabriel</b>     | <b>3,175</b>  | <b>213</b>  | <b>2,972</b>  | <b>191</b>  | <b>2,949</b>  | <b>181</b>  | <b>2,704</b>  | <b>161</b>  | <b>2,781</b>  | <b>162</b>  | <b>2,666</b>  | <b>153</b>  | <b>2,541</b>  | <b>138</b>  | <b>2,486</b>  | <b>130</b>  | <b>2,304</b>  | <b>118</b>  | <b>2,270</b>  | <b>124</b>  |
| <b>SPA 4: Metro</b>           | <b>1,890</b>  | <b>202</b>  | <b>1,855</b>  | <b>189</b>  | <b>1,826</b>  | <b>180</b>  | <b>1,662</b>  | <b>160</b>  | <b>1,724</b>  | <b>161</b>  | <b>1,673</b>  | <b>153</b>  | <b>1,478</b>  | <b>130</b>  | <b>1,469</b>  | <b>124</b>  | <b>1,414</b>  | <b>119</b>  | <b>1,495</b>  | <b>148</b>  |
| <b>SPA 5: West</b>            | <b>1,135</b>  | <b>131</b>  | <b>1,056</b>  | <b>145</b>  | <b>1,089</b>  | <b>147</b>  | <b>1,036</b>  | <b>137</b>  | <b>980</b>    | <b>128</b>  | <b>1,004</b>  | <b>133</b>  | <b>912</b>    | <b>118</b>  | <b>882</b>    | <b>108</b>  | <b>854</b>    | <b>101</b>  | <b>817</b>    | <b>98</b>   |
| <b>SPA 6: South</b>           | <b>1,644</b>  | <b>289</b>  | <b>1,606</b>  | <b>271</b>  | <b>1,562</b>  | <b>257</b>  | <b>1,443</b>  | <b>230</b>  | <b>1,404</b>  | <b>218</b>  | <b>1,422</b>  | <b>218</b>  | <b>1,295</b>  | <b>191</b>  | <b>1,222</b>  | <b>176</b>  | <b>1,271</b>  | <b>178</b>  | <b>1,112</b>  | <b>173</b>  |
| <b>SPA 7: East</b>            | <b>2,053</b>  | <b>222</b>  | <b>1,976</b>  | <b>203</b>  | <b>1,949</b>  | <b>189</b>  | <b>1,847</b>  | <b>172</b>  | <b>1,854</b>  | <b>169</b>  | <b>1,836</b>  | <b>164</b>  | <b>1,660</b>  | <b>142</b>  | <b>1,588</b>  | <b>133</b>  | <b>1,488</b>  | <b>122</b>  | <b>1,463</b>  | <b>134</b>  |
| <b>SPA 8: South Bay</b>       | <b>2,754</b>  | <b>233</b>  | <b>2,704</b>  | <b>221</b>  | <b>2,758</b>  | <b>217</b>  | <b>2,529</b>  | <b>193</b>  | <b>2,493</b>  | <b>185</b>  | <b>2,360</b>  | <b>173</b>  | <b>2,332</b>  | <b>162</b>  | <b>2,143</b>  | <b>143</b>  | <b>2,029</b>  | <b>131</b>  | <b>2,064</b>  | <b>144</b>  |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

**DIABETES** was the seventh-leading cause of death overall, but it was the third-leading cause of death for Hispanics and the fourth-leading cause of death for blacks. The highest death rate, 43 deaths per 100,000 population, was among black men, while the lowest death rate, 13 deaths per 100,000 population, was among white and Asian/Pacific Islander women. The diabetes death rates were higher in the South and Antelope Valley Service Planning Areas than in other areas of the County.

### In simple terms . . .

Diabetes is a disease in which the body does not produce, properly use, or is partially resistant to the effects of insulin.

Insulin is a hormone that moves sugar from the blood into the cells, where the sugar can be stored or converted into energy.

Uncontrolled diabetes leads to high levels of sugar in the blood, which can damage the eyes, kidneys, nerves, heart, and blood vessels, and reduce the body's ability to fight infections.

### Risk factors

Being overweight, lack of physical activity, age, race/ethnicity, family history of diabetes, history of gestational diabetes

### Community opportunities for prevention

- Educate the public about diabetes and pre-diabetes through community health education campaigns
- Promote community self-care management programs to prevent diabetes complications
- Promote physical activity by providing access to safe places like parks and schools to walk, play, and exercise

- Offer incentives for employers to provide, and employees to participate in, workplace wellness programs
- Improve access to nutritious foods, and make it easier for the public to find and choose healthier foods

### Individual opportunities for prevention

- Follow recommended screening and treatment guidelines\*, and work with your health care provider to maintain good diabetes control
- Maintain a healthy weight
- Follow a healthy meal plan that includes fruits, vegetables, lean cuts of meat, and whole grains
- Make time to be physically active every day with your children, partner, pet, friends, or on your own
- Work with your health care provider to control blood pressure, and manage cholesterol and depression
- If you smoke, get help to quit (1-800-NO-BUTTS)
- For new mothers, exclusive breastfeeding for at least 3 months can help promote weight loss and may reduce the risk of diabetes

## LOS ANGELES COUNTY

Deaths 1,894  
 Death Rate 21 deaths per 100,000 population

Healthy People 2010 Objective 5-5 Not comparable

ICD-9 codes (1979-1998) 250

ICD-10 codes (1999-2010) E10-E14

References **American Diabetes Association**  
[www.diabetes.org](http://www.diabetes.org)  
**National Diabetes Education Program**  
[www.ndep.nih.gov](http://www.ndep.nih.gov)  
**"Trends in Diabetes: Time for Action"**  
[www.publichealth.lacounty.gov/ha/reports/LAHealthBrief\\_2011/Diabetes/Diabetes\\_2012\\_FinalS.pdf](http://www.publichealth.lacounty.gov/ha/reports/LAHealthBrief_2011/Diabetes/Diabetes_2012_FinalS.pdf)

Referral **American Diabetes Association Information Line**  
 1-800-DIABETES

\*Available at [www.uspreventiveservicestaskforce.org/uspstf/uspdiab.htm](http://www.uspreventiveservicestaskforce.org/uspstf/uspdiab.htm)

Figure T7. Trends in diabetes mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>1,890</b>  | <b>24</b>   | <b>2,122</b>  | <b>26</b>   | <b>2,178</b>  | <b>26</b>   | <b>2,201</b>  | <b>26</b>   | <b>2,305</b>  | <b>26</b>   | <b>2,188</b>  | <b>25</b>   | <b>2,127</b>  | <b>23</b>   | <b>2,190</b>  | <b>23</b>   | <b>1,964</b>  | <b>20</b>   | <b>1,894</b>  | <b>21</b>   |
| <b>Males</b>                  | <b>886</b>    | <b>27</b>   | <b>996</b>    | <b>29</b>   | <b>1,053</b>  | <b>30</b>   | <b>1,063</b>  | <b>30</b>   | <b>1,140</b>  | <b>31</b>   | <b>1,099</b>  | <b>29</b>   | <b>1,040</b>  | <b>27</b>   | <b>1,084</b>  | <b>27</b>   | <b>1,024</b>  | <b>25</b>   | <b>993</b>    | <b>26</b>   |
| <b>Females</b>                | <b>1,004</b>  | <b>22</b>   | <b>1,126</b>  | <b>24</b>   | <b>1,125</b>  | <b>23</b>   | <b>1,138</b>  | <b>23</b>   | <b>1,165</b>  | <b>23</b>   | <b>1,089</b>  | <b>21</b>   | <b>1,087</b>  | <b>20</b>   | <b>1,106</b>  | <b>20</b>   | <b>940</b>    | <b>17</b>   | <b>901</b>    | <b>17</b>   |
| <b>White</b>                  | <b>775</b>    | <b>19</b>   | <b>840</b>    | <b>20</b>   | <b>835</b>    | <b>19</b>   | <b>863</b>    | <b>20</b>   | <b>897</b>    | <b>20</b>   | <b>806</b>    | <b>19</b>   | <b>751</b>    | <b>17</b>   | <b>801</b>    | <b>17</b>   | <b>672</b>    | <b>14</b>   | <b>667</b>    | <b>16</b>   |
| <b>Hispanic</b>               | <b>639</b>    | <b>38</b>   | <b>678</b>    | <b>38</b>   | <b>719</b>    | <b>37</b>   | <b>741</b>    | <b>36</b>   | <b>773</b>    | <b>36</b>   | <b>774</b>    | <b>34</b>   | <b>754</b>    | <b>31</b>   | <b>764</b>    | <b>30</b>   | <b>694</b>    | <b>27</b>   | <b>690</b>    | <b>29</b>   |
| <b>Black</b>                  | <b>308</b>    | <b>41</b>   | <b>374</b>    | <b>48</b>   | <b>378</b>    | <b>48</b>   | <b>339</b>    | <b>42</b>   | <b>389</b>    | <b>47</b>   | <b>367</b>    | <b>44</b>   | <b>357</b>    | <b>42</b>   | <b>359</b>    | <b>41</b>   | <b>340</b>    | <b>38</b>   | <b>294</b>    | <b>35</b>   |
| <b>Asian/Pacific Islander</b> | <b>164</b>    | <b>16</b>   | <b>212</b>    | <b>20</b>   | <b>233</b>    | <b>21</b>   | <b>251</b>    | <b>22</b>   | <b>236</b>    | <b>19</b>   | <b>230</b>    | <b>18</b>   | <b>257</b>    | <b>19</b>   | <b>257</b>    | <b>18</b>   | <b>248</b>    | <b>17</b>   | <b>237</b>    | <b>16</b>   |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>380</b>    | <b>21</b>   | <b>400</b>    | <b>22</b>   | <b>424</b>    | <b>23</b>   | <b>446</b>    | <b>24</b>   | <b>455</b>    | <b>25</b>   | <b>412</b>    | <b>22</b>   | <b>385</b>    | <b>21</b>   | <b>429</b>    | <b>22</b>   | <b>364</b>    | <b>18</b>   | <b>365</b>    | <b>20</b>   |
| <b>Hispanic</b>               | <b>279</b>    | <b>39</b>   | <b>319</b>    | <b>42</b>   | <b>339</b>    | <b>42</b>   | <b>347</b>    | <b>40</b>   | <b>390</b>    | <b>42</b>   | <b>371</b>    | <b>39</b>   | <b>378</b>    | <b>35</b>   | <b>371</b>    | <b>34</b>   | <b>361</b>    | <b>33</b>   | <b>356</b>    | <b>34</b>   |
| <b>Black</b>                  | <b>144</b>    | <b>45</b>   | <b>164</b>    | <b>52</b>   | <b>158</b>    | <b>49</b>   | <b>158</b>    | <b>48</b>   | <b>181</b>    | <b>55</b>   | <b>178</b>    | <b>54</b>   | <b>147</b>    | <b>43</b>   | <b>157</b>    | <b>44</b>   | <b>161</b>    | <b>44</b>   | <b>144</b>    | <b>43</b>   |
| <b>Asian/Pacific Islander</b> | <b>83</b>     | <b>18</b>   | <b>107</b>    | <b>23</b>   | <b>124</b>    | <b>25</b>   | <b>109</b>    | <b>22</b>   | <b>109</b>    | <b>20</b>   | <b>132</b>    | <b>23</b>   | <b>127</b>    | <b>22</b>   | <b>126</b>    | <b>20</b>   | <b>131</b>    | <b>21</b>   | <b>124</b>    | <b>20</b>   |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>395</b>    | <b>16</b>   | <b>440</b>    | <b>17</b>   | <b>411</b>    | <b>16</b>   | <b>417</b>    | <b>16</b>   | <b>442</b>    | <b>18</b>   | <b>394</b>    | <b>16</b>   | <b>366</b>    | <b>14</b>   | <b>372</b>    | <b>14</b>   | <b>308</b>    | <b>11</b>   | <b>302</b>    | <b>13</b>   |
| <b>Hispanic</b>               | <b>360</b>    | <b>36</b>   | <b>359</b>    | <b>34</b>   | <b>380</b>    | <b>33</b>   | <b>394</b>    | <b>34</b>   | <b>383</b>    | <b>31</b>   | <b>403</b>    | <b>31</b>   | <b>376</b>    | <b>27</b>   | <b>393</b>    | <b>27</b>   | <b>333</b>    | <b>22</b>   | <b>334</b>    | <b>24</b>   |
| <b>Black</b>                  | <b>164</b>    | <b>37</b>   | <b>210</b>    | <b>45</b>   | <b>220</b>    | <b>46</b>   | <b>181</b>    | <b>37</b>   | <b>208</b>    | <b>42</b>   | <b>189</b>    | <b>38</b>   | <b>210</b>    | <b>41</b>   | <b>202</b>    | <b>39</b>   | <b>179</b>    | <b>33</b>   | <b>150</b>    | <b>30</b>   |
| <b>Asian/Pacific Islander</b> | <b>81</b>     | <b>14</b>   | <b>105</b>    | <b>17</b>   | <b>109</b>    | <b>18</b>   | <b>142</b>    | <b>21</b>   | <b>127</b>    | <b>18</b>   | <b>98</b>     | <b>13</b>   | <b>130</b>    | <b>16</b>   | <b>131</b>    | <b>15</b>   | <b>117</b>    | <b>13</b>   | <b>113</b>    | <b>13</b>   |
| <b>SPA 1: Antelope Valley</b> | <b>54</b>     | <b>26</b>   | <b>71</b>     | <b>33</b>   | <b>69</b>     | <b>29</b>   | <b>73</b>     | <b>35</b>   | <b>78</b>     | <b>32</b>   | <b>106</b>    | <b>44</b>   | <b>81</b>     | <b>31</b>   | <b>106</b>    | <b>39</b>   | <b>113</b>    | <b>41</b>   | <b>85</b>     | <b>31</b>   |
| <b>SPA 2: San Fernando</b>    | <b>330</b>    | <b>19</b>   | <b>335</b>    | <b>19</b>   | <b>395</b>    | <b>22</b>   | <b>396</b>    | <b>22</b>   | <b>411</b>    | <b>22</b>   | <b>377</b>    | <b>20</b>   | <b>349</b>    | <b>18</b>   | <b>408</b>    | <b>20</b>   | <b>337</b>    | <b>16</b>   | <b>343</b>    | <b>17</b>   |
| <b>SPA 3: San Gabriel</b>     | <b>306</b>    | <b>20</b>   | <b>395</b>    | <b>25</b>   | <b>361</b>    | <b>22</b>   | <b>423</b>    | <b>25</b>   | <b>438</b>    | <b>26</b>   | <b>389</b>    | <b>22</b>   | <b>387</b>    | <b>22</b>   | <b>405</b>    | <b>22</b>   | <b>375</b>    | <b>20</b>   | <b>330</b>    | <b>19</b>   |
| <b>SPA 4: Metro</b>           | <b>269</b>    | <b>29</b>   | <b>276</b>    | <b>29</b>   | <b>271</b>    | <b>27</b>   | <b>257</b>    | <b>25</b>   | <b>277</b>    | <b>26</b>   | <b>245</b>    | <b>23</b>   | <b>281</b>    | <b>26</b>   | <b>241</b>    | <b>21</b>   | <b>212</b>    | <b>18</b>   | <b>230</b>    | <b>23</b>   |
| <b>SPA 5: West</b>            | <b>76</b>     | <b>11</b>   | <b>101</b>    | <b>15</b>   | <b>113</b>    | <b>16</b>   | <b>115</b>    | <b>16</b>   | <b>103</b>    | <b>14</b>   | <b>91</b>     | <b>13</b>   | <b>95</b>     | <b>13</b>   | <b>100</b>    | <b>13</b>   | <b>75</b>     | <b>9</b>    | <b>90</b>     | <b>12</b>   |
| <b>SPA 6: South</b>           | <b>237</b>    | <b>40</b>   | <b>286</b>    | <b>47</b>   | <b>289</b>    | <b>46</b>   | <b>258</b>    | <b>40</b>   | <b>294</b>    | <b>45</b>   | <b>256</b>    | <b>38</b>   | <b>275</b>    | <b>40</b>   | <b>262</b>    | <b>37</b>   | <b>247</b>    | <b>34</b>   | <b>218</b>    | <b>33</b>   |
| <b>SPA 7: East</b>            | <b>337</b>    | <b>35</b>   | <b>350</b>    | <b>35</b>   | <b>336</b>    | <b>32</b>   | <b>356</b>    | <b>33</b>   | <b>381</b>    | <b>35</b>   | <b>366</b>    | <b>33</b>   | <b>310</b>    | <b>27</b>   | <b>352</b>    | <b>30</b>   | <b>323</b>    | <b>27</b>   | <b>302</b>    | <b>28</b>   |
| <b>SPA 8: South Bay</b>       | <b>274</b>    | <b>22</b>   | <b>303</b>    | <b>24</b>   | <b>337</b>    | <b>26</b>   | <b>310</b>    | <b>23</b>   | <b>320</b>    | <b>23</b>   | <b>343</b>    | <b>25</b>   | <b>339</b>    | <b>23</b>   | <b>309</b>    | <b>21</b>   | <b>282</b>    | <b>18</b>   | <b>293</b>    | <b>21</b>   |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

# Drug Overdose (Unintentional)

**DRUG OVERDOSE** has been one of the 10 leading causes of premature death for each of the past 10 years. In 2010, it was the sixth-leading cause of premature death overall, but the third-leading cause of premature death among whites. The highest death rate, 13 deaths per 100,000 population, was among white and black men. Drug overdose was the leading cause of death for 15- to 24-year-old white men.

## In simple terms . . .

In this report, drug overdose refers to any death from an unintentional overdose of illegal drugs, prescription or over-the-counter (OTC) medications, or alcohol.

Drug overdose does not include any drug, medicine, or alcohol taken with homicidal or suicidal intent.

## Risk factors

Easy access to alcohol and other drugs (AOD); having a parent/caregiver who abuses substances, suffers from mental illness, or engages in criminal behavior; lack of a significant relationship with a caring adult; gang involvement; self-medication for psychological or physical conditions; drug dependence from prolonged use for chronic pain

## Community opportunities for prevention

- Increase enforcement of laws/policies to reduce AOD availability and consumption (e.g., retailer education)
- Educate youth in school and community settings about AOD to raise awareness and develop refusal skills
- Promote access to mental health and substance abuse services

- Promote community activities that encourage positive choices to reduce acceptance and change norms around AOD use
- Use social media and work with local experts to raise awareness and perception of harm of AOD use including medication misuse

## Individual opportunities for prevention

- Keep track of prescription and OTC medications at home, and dispose of all medications properly
- Spend time to talk to your children about drugs and to teach them how to refuse drugs
- Seek help for substance abuse (drug or alcohol) from a healthcare provider, or call the Substance Abuse Prevention and Control Helpline: 1-800-564-6600

6th cause of premature death  
19th cause of death

## LOS ANGELES COUNTY

Deaths 611  
Death Rate 6 deaths per 100,000 population

Healthy People  
2010 Objective 26-03 Not comparable

ICD-9 codes  
(1979-1998) E850-E858, E860

ICD-10 codes  
(1999-2010) X40-X45

References **National Institute on Drug Abuse**  
[www.drugabuse.gov](http://www.drugabuse.gov)  
**Center for Substance Abuse Prevention**  
[www.samhsa.gov/prevention](http://www.samhsa.gov/prevention)  
**"Prescription Drug Abuse in Los Angeles County"**  
<http://publichealth.lacounty.gov/sapc/resources/PrescriptionWEB3.pdf>

Referral **Los Angeles County Department of Public Health, Substance Abuse Prevention and Control Helpline**  
1-800-564-6600

**Figure T8.** Trends in drug overdose mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>484</b>    | <b>5</b>    | <b>611</b>    | <b>6</b>    | <b>620</b>    | <b>6</b>    | <b>556</b>    | <b>6</b>    | <b>528</b>    | <b>5</b>    | <b>557</b>    | <b>5</b>    | <b>691</b>    | <b>7</b>    | <b>625</b>    | <b>6</b>    | <b>685</b>    | <b>6</b>    | <b>611</b>    | <b>6</b>    |
| <b>Males</b>                  | <b>353</b>    | <b>8</b>    | <b>444</b>    | <b>9</b>    | <b>437</b>    | <b>9</b>    | <b>388</b>    | <b>8</b>    | <b>377</b>    | <b>7</b>    | <b>372</b>    | <b>7</b>    | <b>501</b>    | <b>10</b>   | <b>431</b>    | <b>8</b>    | <b>471</b>    | <b>9</b>    | <b>435</b>    | <b>9</b>    |
| <b>Females</b>                | <b>131</b>    | <b>3</b>    | <b>167</b>    | <b>3</b>    | <b>183</b>    | <b>4</b>    | <b>168</b>    | <b>3</b>    | <b>151</b>    | <b>3</b>    | <b>185</b>    | <b>4</b>    | <b>190</b>    | <b>4</b>    | <b>194</b>    | <b>4</b>    | <b>214</b>    | <b>4</b>    | <b>176</b>    | <b>3</b>    |
| <b>White</b>                  | <b>243</b>    | <b>7</b>    | <b>301</b>    | <b>9</b>    | <b>326</b>    | <b>10</b>   | <b>308</b>    | <b>9</b>    | <b>266</b>    | <b>8</b>    | <b>288</b>    | <b>9</b>    | <b>351</b>    | <b>10</b>   | <b>326</b>    | <b>10</b>   | <b>356</b>    | <b>10</b>   | <b>314</b>    | <b>10</b>   |
| <b>Hispanic</b>               | <b>141</b>    | <b>4</b>    | <b>170</b>    | <b>5</b>    | <b>178</b>    | <b>5</b>    | <b>155</b>    | <b>4</b>    | <b>137</b>    | <b>3</b>    | <b>172</b>    | <b>4</b>    | <b>232</b>    | <b>5</b>    | <b>195</b>    | <b>4</b>    | <b>219</b>    | <b>5</b>    | <b>194</b>    | <b>4</b>    |
| <b>Black</b>                  | <b>96</b>     | <b>11</b>   | <b>131</b>    | <b>14</b>   | <b>102</b>    | <b>11</b>   | <b>80</b>     | <b>8</b>    | <b>113</b>    | <b>12</b>   | <b>81</b>     | <b>8</b>    | <b>92</b>     | <b>9</b>    | <b>87</b>     | <b>9</b>    | <b>93</b>     | <b>9</b>    | <b>90</b>     | <b>10</b>   |
| <b>Asian/Pacific Islander</b> | <b>4</b>      | --          | <b>8</b>      | --          | <b>11</b>     | --          | <b>6</b>      | --          | <b>5</b>      | --          | <b>10</b>     | --          | <b>13</b>     | --          | <b>13</b>     | --          | <b>13</b>     | --          | <b>9</b>      | --          |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>168</b>    | <b>10</b>   | <b>199</b>    | <b>12</b>   | <b>206</b>    | <b>12</b>   | <b>204</b>    | <b>12</b>   | <b>180</b>    | <b>11</b>   | <b>181</b>    | <b>11</b>   | <b>229</b>    | <b>13</b>   | <b>204</b>    | <b>12</b>   | <b>229</b>    | <b>13</b>   | <b>209</b>    | <b>13</b>   |
| <b>Hispanic</b>               | <b>118</b>    | <b>7</b>    | <b>146</b>    | <b>8</b>    | <b>151</b>    | <b>8</b>    | <b>128</b>    | <b>6</b>    | <b>114</b>    | <b>5</b>    | <b>134</b>    | <b>6</b>    | <b>200</b>    | <b>9</b>    | <b>164</b>    | <b>8</b>    | <b>181</b>    | <b>8</b>    | <b>163</b>    | <b>8</b>    |
| <b>Black</b>                  | <b>63</b>     | <b>16</b>   | <b>93</b>     | <b>22</b>   | <b>70</b>     | <b>17</b>   | <b>47</b>     | <b>11</b>   | <b>73</b>     | <b>17</b>   | <b>46</b>     | <b>10</b>   | <b>61</b>     | <b>14</b>   | <b>53</b>     | <b>12</b>   | <b>53</b>     | <b>12</b>   | <b>56</b>     | <b>13</b>   |
| <b>Asian/Pacific Islander</b> | <b>4</b>      | --          | <b>5</b>      | --          | <b>7</b>      | --          | <b>4</b>      | --          | <b>5</b>      | --          | <b>6</b>      | --          | <b>9</b>      | --          | <b>7</b>      | --          | <b>6</b>      | --          | <b>3</b>      | --          |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>75</b>     | <b>4</b>    | <b>102</b>    | <b>6</b>    | <b>120</b>    | <b>7</b>    | <b>104</b>    | <b>6</b>    | <b>86</b>     | <b>5</b>    | <b>107</b>    | <b>6</b>    | <b>122</b>    | <b>7</b>    | <b>122</b>    | <b>7</b>    | <b>127</b>    | <b>7</b>    | <b>105</b>    | <b>7</b>    |
| <b>Hispanic</b>               | <b>23</b>     | <b>1</b>    | <b>24</b>     | <b>1</b>    | <b>27</b>     | <b>1</b>    | <b>27</b>     | <b>1</b>    | <b>23</b>     | <b>1</b>    | <b>38</b>     | <b>2</b>    | <b>32</b>     | <b>2</b>    | <b>31</b>     | <b>1</b>    | <b>38</b>     | <b>2</b>    | <b>31</b>     | <b>1</b>    |
| <b>Black</b>                  | <b>33</b>     | <b>7</b>    | <b>38</b>     | <b>7</b>    | <b>32</b>     | <b>6</b>    | <b>33</b>     | <b>6</b>    | <b>40</b>     | <b>8</b>    | <b>35</b>     | <b>7</b>    | <b>31</b>     | <b>6</b>    | <b>34</b>     | <b>6</b>    | <b>40</b>     | <b>8</b>    | <b>34</b>     | <b>7</b>    |
| <b>Asian/Pacific Islander</b> | <b>0</b>      | --          | <b>3</b>      | --          | <b>4</b>      | --          | <b>2</b>      | --          | <b>0</b>      | <b>0</b>    | <b>4</b>      | --          | <b>4</b>      | --          | <b>6</b>      | --          | <b>7</b>      | --          | <b>6</b>      | --          |
| <b>SPA 1: Antelope Valley</b> | <b>17</b>     | --          | <b>27</b>     | <b>8</b>    | <b>30</b>     | <b>9</b>    | <b>31</b>     | <b>10</b>   | <b>19</b>     | --          | <b>31</b>     | <b>9</b>    | <b>33</b>     | <b>9</b>    | <b>24</b>     | <b>7</b>    | <b>27</b>     | <b>8</b>    | <b>38</b>     | <b>10</b>   |
| <b>SPA 2: San Fernando</b>    | <b>80</b>     | <b>4</b>    | <b>126</b>    | <b>6</b>    | <b>97</b>     | <b>4</b>    | <b>101</b>    | <b>5</b>    | <b>114</b>    | <b>5</b>    | <b>104</b>    | <b>5</b>    | <b>113</b>    | <b>5</b>    | <b>133</b>    | <b>6</b>    | <b>146</b>    | <b>6</b>    | <b>122</b>    | <b>5</b>    |
| <b>SPA 3: San Gabriel</b>     | <b>64</b>     | <b>4</b>    | <b>75</b>     | <b>4</b>    | <b>63</b>     | <b>4</b>    | <b>65</b>     | <b>4</b>    | <b>64</b>     | <b>4</b>    | <b>75</b>     | <b>4</b>    | <b>89</b>     | <b>5</b>    | <b>70</b>     | <b>4</b>    | <b>91</b>     | <b>5</b>    | <b>70</b>     | <b>4</b>    |
| <b>SPA 4: Metro</b>           | <b>66</b>     | <b>6</b>    | <b>75</b>     | <b>6</b>    | <b>107</b>    | <b>9</b>    | <b>84</b>     | <b>7</b>    | <b>67</b>     | <b>5</b>    | <b>73</b>     | <b>6</b>    | <b>97</b>     | <b>7</b>    | <b>91</b>     | <b>7</b>    | <b>89</b>     | <b>7</b>    | <b>89</b>     | <b>7</b>    |
| <b>SPA 5: West</b>            | <b>32</b>     | <b>5</b>    | <b>49</b>     | <b>7</b>    | <b>54</b>     | <b>8</b>    | <b>41</b>     | <b>6</b>    | <b>29</b>     | <b>4</b>    | <b>33</b>     | <b>5</b>    | <b>47</b>     | <b>7</b>    | <b>46</b>     | <b>6</b>    | <b>41</b>     | <b>6</b>    | <b>42</b>     | <b>6</b>    |
| <b>SPA 6: South</b>           | <b>43</b>     | <b>6</b>    | <b>68</b>     | <b>9</b>    | <b>56</b>     | <b>7</b>    | <b>45</b>     | <b>5</b>    | <b>68</b>     | <b>8</b>    | <b>49</b>     | <b>6</b>    | <b>70</b>     | <b>8</b>    | <b>63</b>     | <b>7</b>    | <b>69</b>     | <b>8</b>    | <b>57</b>     | <b>6</b>    |
| <b>SPA 7: East</b>            | <b>70</b>     | <b>6</b>    | <b>55</b>     | <b>5</b>    | <b>68</b>     | <b>6</b>    | <b>60</b>     | <b>5</b>    | <b>51</b>     | <b>4</b>    | <b>75</b>     | <b>6</b>    | <b>77</b>     | <b>6</b>    | <b>62</b>     | <b>5</b>    | <b>70</b>     | <b>5</b>    | <b>56</b>     | <b>5</b>    |
| <b>SPA 8: South Bay</b>       | <b>76</b>     | <b>5</b>    | <b>100</b>    | <b>7</b>    | <b>101</b>    | <b>6</b>    | <b>90</b>     | <b>6</b>    | <b>79</b>     | <b>5</b>    | <b>81</b>     | <b>5</b>    | <b>105</b>    | <b>6</b>    | <b>110</b>    | <b>7</b>    | <b>108</b>    | <b>7</b>    | <b>102</b>    | <b>6</b>    |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

--Number of deaths is too small to calculate a reliable rate.

# Emphysema/COPD

15th cause of premature death  
4th cause of death

*EMPHYSEMA/COPD has been the fourth-leading cause of death for each of the last 10 years. In 2010, the median age at death from emphysema was 81 years. The highest death rate, 50 deaths per 100,000 population, was among black men. The death rate in the Antelope Valley Service Planning Area, 70 deaths per 100,000 population, was more than double the rate in the County overall.*

### In simple terms . . .

Chronic obstructive pulmonary disease (COPD) refers to conditions that interfere with the flow of air in and out of the lungs, making it difficult to breathe. Emphysema is the most common type of COPD and is a condition where the air sacs (alveoli) in the lungs have been destroyed and cannot completely deflate, making them unable to take in oxygen from fresh air.

### Risk factors

Tobacco smoking, breathing in the smoke of others (secondhand smoke), asthma, exposure to certain air pollutants

### Community opportunities for prevention

- Restrict smoking in public places and worksites to decrease exposure to indoor and outdoor secondhand smoke
- Provide access to smoking cessation programs
- Reduce youth access to tobacco products through policies and their enforcement
- Increase the tobacco tax

### Individual opportunities for prevention

- If you smoke, get help to quit (1-800-NO-BUTTS)
- If you don't smoke, don't start
- Avoid being near people who are smoking

## LOS ANGELES COUNTY

**Deaths** 2,622  
**Death Rate** 29.6 deaths per 100,000 population  
75.7 deaths per 100,000 adults aged 45 years and over

**Healthy People 2010 Objective 24-10** 62.3 deaths per 100,000 adults aged 45 years and over.  
The Healthy People 2010 objective includes some causes of chronic bronchitis not included in this report which would increase the number of deaths in Los Angeles by 1%.

**ICD-9 codes (1979-1998)** 492, 496

**ICD-10 codes (1999-2010)** J43-J44

**References** **American Lung Association**  
[www.lungusa.org](http://www.lungusa.org)

**National Heart, Lung, and Blood Institute**  
[www.nhlbi.nih.gov](http://www.nhlbi.nih.gov)

**It's Quitting Time L.A.**  
[www.laquits.com](http://www.laquits.com)

**"Adult Smoking on the Decline, but Disparities Remain"**  
[www.publichealth.lacounty.gov/ha/reports/LAHealthBrief\\_2011/Smoking/Smoking2012\\_finalS.pdf](http://www.publichealth.lacounty.gov/ha/reports/LAHealthBrief_2011/Smoking/Smoking2012_finalS.pdf)

**Referral** **American Lung Association Helpline**  
1-800-LUNG-USA1  
**California Smokers' Helpline**  
1-800-NO-BUTTS

**Figure T9.** Trends in emphysema/COPD mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>2,723</b>  | <b>36</b>   | <b>2,604</b>  | <b>33</b>   | <b>2,796</b>  | <b>34</b>   | <b>2,641</b>  | <b>32</b>   | <b>2,770</b>  | <b>33</b>   | <b>2,665</b>  | <b>31</b>   | <b>2,625</b>  | <b>29</b>   | <b>2,889</b>  | <b>31</b>   | <b>2,904</b>  | <b>30</b>   | <b>2,622</b>  | <b>30</b>   |
| <b>Males</b>                  | <b>1,301</b>  | <b>43</b>   | <b>1,246</b>  | <b>40</b>   | <b>1,377</b>  | <b>43</b>   | <b>1,278</b>  | <b>39</b>   | <b>1,348</b>  | <b>39</b>   | <b>1,275</b>  | <b>37</b>   | <b>1,286</b>  | <b>36</b>   | <b>1,398</b>  | <b>37</b>   | <b>1,420</b>  | <b>37</b>   | <b>1,246</b>  | <b>35</b>   |
| <b>Females</b>                | <b>1,422</b>  | <b>31</b>   | <b>1,358</b>  | <b>29</b>   | <b>1,419</b>  | <b>29</b>   | <b>1,363</b>  | <b>27</b>   | <b>1,422</b>  | <b>28</b>   | <b>1,390</b>  | <b>27</b>   | <b>1,339</b>  | <b>25</b>   | <b>1,491</b>  | <b>27</b>   | <b>1,484</b>  | <b>26</b>   | <b>1,376</b>  | <b>26</b>   |
| <b>White</b>                  | <b>1,992</b>  | <b>46</b>   | <b>1,887</b>  | <b>43</b>   | <b>1,989</b>  | <b>45</b>   | <b>1,835</b>  | <b>41</b>   | <b>1,840</b>  | <b>41</b>   | <b>1,771</b>  | <b>39</b>   | <b>1,801</b>  | <b>39</b>   | <b>1,955</b>  | <b>41</b>   | <b>1,895</b>  | <b>39</b>   | <b>1,743</b>  | <b>40</b>   |
| <b>Hispanic</b>               | <b>261</b>    | <b>18</b>   | <b>249</b>    | <b>16</b>   | <b>311</b>    | <b>19</b>   | <b>305</b>    | <b>18</b>   | <b>344</b>    | <b>18</b>   | <b>346</b>    | <b>18</b>   | <b>299</b>    | <b>14</b>   | <b>343</b>    | <b>15</b>   | <b>392</b>    | <b>18</b>   | <b>345</b>    | <b>17</b>   |
| <b>Black</b>                  | <b>281</b>    | <b>38</b>   | <b>293</b>    | <b>40</b>   | <b>287</b>    | <b>38</b>   | <b>297</b>    | <b>39</b>   | <b>331</b>    | <b>52</b>   | <b>329</b>    | <b>41</b>   | <b>265</b>    | <b>32</b>   | <b>318</b>    | <b>37</b>   | <b>337</b>    | <b>39</b>   | <b>289</b>    | <b>35</b>   |
| <b>Asian/Pacific Islander</b> | <b>184</b>    | <b>20</b>   | <b>164</b>    | <b>17</b>   | <b>198</b>    | <b>19</b>   | <b>192</b>    | <b>18</b>   | <b>238</b>    | <b>20</b>   | <b>213</b>    | <b>17</b>   | <b>247</b>    | <b>19</b>   | <b>258</b>    | <b>18</b>   | <b>267</b>    | <b>18</b>   | <b>229</b>    | <b>16</b>   |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>887</b>    | <b>51</b>   | <b>855</b>    | <b>48</b>   | <b>896</b>    | <b>49</b>   | <b>830</b>    | <b>45</b>   | <b>823</b>    | <b>45</b>   | <b>793</b>    | <b>44</b>   | <b>823</b>    | <b>44</b>   | <b>894</b>    | <b>46</b>   | <b>887</b>    | <b>45</b>   | <b>762</b>    | <b>42</b>   |
| <b>Hispanic</b>               | <b>125</b>    | <b>24</b>   | <b>126</b>    | <b>22</b>   | <b>175</b>    | <b>28</b>   | <b>162</b>    | <b>25</b>   | <b>177</b>    | <b>25</b>   | <b>167</b>    | <b>23</b>   | <b>155</b>    | <b>19</b>   | <b>175</b>    | <b>20</b>   | <b>194</b>    | <b>23</b>   | <b>172</b>    | <b>21</b>   |
| <b>Black</b>                  | <b>153</b>    | <b>54</b>   | <b>149</b>    | <b>55</b>   | <b>169</b>    | <b>58</b>   | <b>154</b>    | <b>52</b>   | <b>184</b>    | <b>60</b>   | <b>170</b>    | <b>56</b>   | <b>144</b>    | <b>46</b>   | <b>157</b>    | <b>48</b>   | <b>176</b>    | <b>54</b>   | <b>161</b>    | <b>50</b>   |
| <b>Asian/Pacific Islander</b> | <b>133</b>    | <b>35</b>   | <b>111</b>    | <b>27</b>   | <b>131</b>    | <b>30</b>   | <b>125</b>    | <b>28</b>   | <b>154</b>    | <b>32</b>   | <b>141</b>    | <b>28</b>   | <b>155</b>    | <b>29</b>   | <b>162</b>    | <b>28</b>   | <b>158</b>    | <b>27</b>   | <b>138</b>    | <b>24</b>   |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>1,105</b>  | <b>43</b>   | <b>1,032</b>  | <b>39</b>   | <b>1,093</b>  | <b>41</b>   | <b>1,005</b>  | <b>38</b>   | <b>1,017</b>  | <b>37</b>   | <b>978</b>    | <b>37</b>   | <b>978</b>    | <b>36</b>   | <b>1,061</b>  | <b>38</b>   | <b>1,008</b>  | <b>35</b>   | <b>981</b>    | <b>38</b>   |
| <b>Hispanic</b>               | <b>136</b>    | <b>15</b>   | <b>123</b>    | <b>13</b>   | <b>136</b>    | <b>14</b>   | <b>143</b>    | <b>13</b>   | <b>167</b>    | <b>15</b>   | <b>179</b>    | <b>15</b>   | <b>144</b>    | <b>11</b>   | <b>168</b>    | <b>12</b>   | <b>198</b>    | <b>15</b>   | <b>173</b>    | <b>14</b>   |
| <b>Black</b>                  | <b>128</b>    | <b>28</b>   | <b>144</b>    | <b>31</b>   | <b>118</b>    | <b>25</b>   | <b>143</b>    | <b>31</b>   | <b>147</b>    | <b>30</b>   | <b>159</b>    | <b>33</b>   | <b>121</b>    | <b>24</b>   | <b>161</b>    | <b>31</b>   | <b>161</b>    | <b>30</b>   | <b>128</b>    | <b>26</b>   |
| <b>Asian/Pacific Islander</b> | <b>51</b>     | <b>10</b>   | <b>53</b>     | <b>9</b>    | <b>67</b>     | <b>11</b>   | <b>67</b>     | <b>10</b>   | <b>84</b>     | <b>12</b>   | <b>72</b>     | <b>10</b>   | <b>92</b>     | <b>11</b>   | <b>96</b>     | <b>11</b>   | <b>109</b>    | <b>12</b>   | <b>91</b>     | <b>10</b>   |
| <b>SPA 1: Antelope Valley</b> | <b>138</b>    | <b>70</b>   | <b>125</b>    | <b>63</b>   | <b>140</b>    | <b>69</b>   | <b>120</b>    | <b>58</b>   | <b>159</b>    | <b>74</b>   | <b>150</b>    | <b>67</b>   | <b>148</b>    | <b>63</b>   | <b>184</b>    | <b>75</b>   | <b>202</b>    | <b>79</b>   | <b>172</b>    | <b>70</b>   |
| <b>SPA 2: San Fernando</b>    | <b>529</b>    | <b>32</b>   | <b>519</b>    | <b>30</b>   | <b>575</b>    | <b>33</b>   | <b>513</b>    | <b>29</b>   | <b>563</b>    | <b>31</b>   | <b>578</b>    | <b>32</b>   | <b>562</b>    | <b>30</b>   | <b>527</b>    | <b>26</b>   | <b>572</b>    | <b>27</b>   | <b>539</b>    | <b>27</b>   |
| <b>SPA 3: San Gabriel</b>     | <b>484</b>    | <b>33</b>   | <b>494</b>    | <b>32</b>   | <b>529</b>    | <b>33</b>   | <b>515</b>    | <b>31</b>   | <b>537</b>    | <b>32</b>   | <b>536</b>    | <b>31</b>   | <b>504</b>    | <b>28</b>   | <b>614</b>    | <b>33</b>   | <b>631</b>    | <b>33</b>   | <b>534</b>    | <b>30</b>   |
| <b>SPA 4: Metro</b>           | <b>259</b>    | <b>28</b>   | <b>236</b>    | <b>24</b>   | <b>246</b>    | <b>24</b>   | <b>234</b>    | <b>23</b>   | <b>270</b>    | <b>26</b>   | <b>247</b>    | <b>23</b>   | <b>236</b>    | <b>21</b>   | <b>260</b>    | <b>22</b>   | <b>251</b>    | <b>21</b>   | <b>189</b>    | <b>19</b>   |
| <b>SPA 5: West</b>            | <b>179</b>    | <b>26</b>   | <b>191</b>    | <b>27</b>   | <b>178</b>    | <b>25</b>   | <b>166</b>    | <b>22</b>   | <b>158</b>    | <b>22</b>   | <b>139</b>    | <b>19</b>   | <b>140</b>    | <b>18</b>   | <b>195</b>    | <b>24</b>   | <b>182</b>    | <b>22</b>   | <b>146</b>    | <b>19</b>   |
| <b>SPA 6: South</b>           | <b>201</b>    | <b>35</b>   | <b>212</b>    | <b>36</b>   | <b>195</b>    | <b>32</b>   | <b>205</b>    | <b>34</b>   | <b>219</b>    | <b>34</b>   | <b>197</b>    | <b>30</b>   | <b>185</b>    | <b>28</b>   | <b>214</b>    | <b>31</b>   | <b>216</b>    | <b>31</b>   | <b>202</b>    | <b>33</b>   |
| <b>SPA 7: East</b>            | <b>356</b>    | <b>38</b>   | <b>335</b>    | <b>35</b>   | <b>402</b>    | <b>39</b>   | <b>372</b>    | <b>35</b>   | <b>316</b>    | <b>29</b>   | <b>330</b>    | <b>30</b>   | <b>366</b>    | <b>32</b>   | <b>381</b>    | <b>33</b>   | <b>359</b>    | <b>31</b>   | <b>339</b>    | <b>32</b>   |
| <b>SPA 8: South Bay</b>       | <b>558</b>    | <b>48</b>   | <b>489</b>    | <b>40</b>   | <b>521</b>    | <b>42</b>   | <b>497</b>    | <b>38</b>   | <b>542</b>    | <b>41</b>   | <b>479</b>    | <b>36</b>   | <b>475</b>    | <b>34</b>   | <b>501</b>    | <b>35</b>   | <b>488</b>    | <b>32</b>   | <b>496</b>    | <b>36</b>   |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

# Homicide

2nd cause of premature death  
17th cause of death

**HOMICIDE** has been the second-leading cause of premature death every year for the past 10 years. In 2010, it was the leading cause of premature death in Compton, South, and Southeast Health Districts. It was the leading cause of death for black and Hispanic men aged 15 to 44. The homicide rate for black men, 45 deaths per 100,000 population, was more than seven times higher than for the County overall. Among men, 82% of homicides were committed with a firearm.

## In simple terms . . .

Homicide is the killing of one person by another, including acts of terrorism. The majority of homicides do not involve self-defense. Homicide may be committed with a weapon such as a gun or knife, or may result from means including strangulation, drowning, poisoning, burning, pushing the victim from a high place, neglect, abandonment, or abuse. Deaths from injuries caused by law enforcement officers or military in the line of duty are not included in this category.

## Risk factors

Intimate partner violence, poor access to quality education, lack of employment opportunities, youth with excessive unstructured free time, gang affiliation, alcohol and substance abuse, witnessing and experiencing violence and child abuse, access to firearms

## Community opportunities for prevention

- Provide educational and recreational opportunities for children and adolescents such as after-school programs
- Support nurse home-visitation programs for teenage parents

- Participate in community-based youth violence prevention approaches such as Striving To Reduce Youth Violence Everywhere (STRYVE) and Urban Networks to Increase Thriving Youth (UNITY) (see References for links)

- Support community policing

- Build communities that discourage street violence with well-lit streets and plenty of pedestrian traffic

## Individual opportunities for prevention

- Teach children how to handle tough social situations and how to resolve problems without using violence
- Participate in youth mentoring programs that pair an adult with a young person. The adult serves as a positive role model and helps guide the young person's behavior
- Seek help for substance abuse (drug or alcohol)
- Recognize that easy access to firearms is a risk for homicide
- Unload and lock firearms in the home with the ammunition stored and locked separately

## LOS ANGELES COUNTY

**Deaths** 651  
**Death Rate** 6.3 deaths per 100,000 population

**Healthy People 2010 Objective 15-32** 2.8 deaths per 100,000 population

**ICD-9 codes** E960-E969  
(1979-1998)

**ICD-10 codes** \*U01-\*U02, X85-Y09, Y87.1  
(1999-2010)

**References** **VETO Violence**  
<http://vetoviolence.cdc.gov>  
<http://vetoviolence.cdc.gov/stryve>  
**Prevention Institute UNITY**  
<http://preventioninstitute.org/unity>  
**CDC National Center for Injury Prevention and Control**  
[www.cdc.gov/ncipc/dvp/dvp.htm](http://www.cdc.gov/ncipc/dvp/dvp.htm)

**Referral** **Violence Prevention Coalition of Greater Los Angeles**  
213-346-3265  
**Los Angeles County Department of Public Health, Substance Abuse Prevention and Control Helpline**  
1-800-564-6600

Figure T10. Trends in homicide mortality

|                           | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|---------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                           | No. of deaths | Death rate* |
| <b>Los Angeles County</b> | <b>1,099</b>  | <b>11</b>   | <b>1,148</b>  | <b>11</b>   | <b>1,066</b>  | <b>10</b>   | <b>1,069</b>  | <b>10</b>   | <b>1,066</b>  | <b>10</b>   | <b>1,043</b>  | <b>10</b>   | <b>869</b>    | <b>8</b>    | <b>838</b>    | <b>8</b>    | <b>723</b>    | <b>7</b>    | <b>651</b>    | <b>6</b>    |
| Males                     | 937           | 18          | 990           | 19          | 931           | 18          | 940           | 18          | 940           | 18          | 916           | 17          | 751           | 14          | 710           | 13          | 618           | 11          | 545           | 10          |
| Females                   | 162           | 3           | 158           | 3           | 135           | 3           | 129           | 3           | 126           | 2           | 127           | 2           | 118           | 2           | 128           | 2           | 105           | 2           | 106           | 2           |
| White                     | 142           | 5           | 133           | 4           | 119           | 4           | 105           | 4           | 101           | 3           | 97            | 3           | 92            | 3           | 83            | 3           | 64            | 2           | 76            | 2           |
| Hispanic                  | 527           | 11          | 567           | 11          | 520           | 10          | 531           | 10          | 570           | 11          | 545           | 10          | 474           | 9           | 458           | 8           | 397           | 7           | 328           | 6           |
| Black                     | 361           | 38          | 393           | 41          | 369           | 38          | 388           | 41          | 362           | 38          | 344           | 36          | 272           | 28          | 250           | 26          | 227           | 23          | 219           | 25          |
| Asian/Pacific Islander    | 47            | 4           | 51            | 4           | 57            | 4           | 42            | 3           | 33            | 2           | 50            | 4           | 30            | 2           | 43            | 3           | 32            | 2           | 24            | 2           |
| Males                     |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| White                     | 97            | 6           | 98            | 6           | 93            | 6           | 77            | 5           | 69            | 4           | 76            | 5           | 71            | 5           | 62            | 4           | 43            | 3           | 51            | 3           |
| Hispanic                  | 473           | 19          | 501           | 19          | 471           | 18          | 481           | 17          | 528           | 19          | 491           | 18          | 420           | 15          | 407           | 14          | 344           | 13          | 288           | 11          |
| Black                     | 315           | 70          | 352           | 78          | 324           | 72          | 348           | 78          | 320           | 72          | 298           | 67          | 240           | 53          | 214           | 47          | 207           | 44          | 186           | 45          |
| Asian/Pacific Islander    | 37            | 6           | 36            | 6           | 42            | 6           | 33            | 5           | 23            | 3           | 46            | 7           | 20            | 3           | 24            | 4           | 23            | 3           | 18            | --          |
| Females                   |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| White                     | 45            | 3           | 35            | 2           | 26            | 1           | 28            | 2           | 32            | 2           | 21            | 1           | 21            | 1           | 21            | 1           | 21            | 1           | 25            | 2           |
| Hispanic                  | 54            | 2           | 66            | 3           | 49            | 2           | 50            | 2           | 42            | 2           | 54            | 2           | 54            | 2           | 51            | 2           | 53            | 2           | 40            | 2           |
| Black                     | 46            | 9           | 41            | 8           | 45            | 9           | 40            | 8           | 42            | 8           | 46            | 9           | 32            | 6           | 36            | 7           | 20            | 4           | 33            | 7           |
| Asian/Pacific Islander    | 10            | --          | 15            | --          | 15            | --          | 9             | --          | 10            | --          | 4             | --          | 10            | --          | 19            | --          | 9             | --          | 6             | --          |
| SPA 1: Antelope Valley    | 21            | 7           | 27            | 8           | 36            | 11          | 33            | 10          | 37            | 11          | 46            | 13          | 37            | 10          | 26            | 6           | 31            | 8           | 23            | 6           |
| SPA 2: San Fernando       | 142           | 7           | 139           | 7           | 120           | 6           | 101           | 5           | 104           | 5           | 98            | 5           | 81            | 4           | 91            | 4           | 79            | 4           | 71            | 3           |
| SPA 3: San Gabriel        | 114           | 6           | 111           | 6           | 106           | 6           | 131           | 7           | 103           | 5           | 116           | 6           | 106           | 5           | 108           | 6           | 69            | 4           | 71            | 4           |
| SPA 4: Metro              | 140           | 11          | 145           | 12          | 126           | 10          | 115           | 9           | 118           | 9           | 112           | 9           | 110           | 9           | 102           | 8           | 82            | 6           | 73            | 6           |
| SPA 5: West               | 43            | 6           | 38            | 6           | 24            | 4           | 24            | 4           | 26            | 4           | 25            | 5           | 14            | --          | 18            | --          | 14            | --          | 12            | --          |
| SPA 6: South              | 337           | 32          | 355           | 34          | 315           | 29          | 356           | 32          | 372           | 34          | 310           | 28          | 245           | 22          | 233           | 21          | 194           | 17          | 189           | 17          |
| SPA 7: East               | 107           | 8           | 129           | 9           | 117           | 8           | 108           | 7           | 130           | 9           | 126           | 9           | 108           | 7           | 99            | 7           | 101           | 7           | 88            | 6           |
| SPA 8: South Bay          | 175           | 11          | 190           | 12          | 192           | 12          | 177           | 11          | 161           | 10          | 179           | 11          | 145           | 9           | 140           | 9           | 144           | 9           | 120           | 8           |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

--Number of deaths is too small to calculate a reliable rate.

# HIV

 (Human Immunodeficiency Virus)

12th cause of premature death

35th cause of death

*HIV remained an important cause of death and premature death among some groups even though it has not been one of the overall leading causes of death or premature death since 2004. In 2010, it was the fifth-leading cause of premature death for black men and among residents of the Central Health District. The death rate among black men, 15 deaths per 100,000 population, was five times higher than the overall County rate.*

### In simple terms . . .

HIV (human immunodeficiency virus) affects the body's ability to fight infections and certain cancers by damaging the immune system. HIV is spread by sexual contact through blood or mucous membrane exposure to infected blood, semen, vaginal secretions, or rectal mucus; by sharing needles and/or syringes with someone who is infected, or, less commonly—and extremely rarely in the U.S.—through transfusions of infected blood, blood clotting factors, or organ/tissue donation. Babies born to HIV-infected women may become infected before or during birth, or through breastfeeding after birth. There is no scientific evidence that HIV can be transmitted in any other ways.

### Risk factors

Having unprotected sex and/or sharing drug needles and syringes with an HIV-infected person or a person whose HIV status is unknown

### Community opportunities for prevention

- Educate the community about how HIV is transmitted and how to avoid getting infected
- Provide HIV counseling and testing
- Provide access to drug treatment programs, and sexually transmitted disease testing and treatment
- Screen pregnant women for HIV infection and use drug therapies to reduce the transmission of HIV from mother to baby

### Individual opportunities for prevention

- Use latex condoms consistently and correctly with HIV-infected sexual partners or those whose HIV status is unknown
- Do not share drug needles and syringes
- Learn your HIV status by getting tested for antibodies to HIV. Nearly 60,000 persons are estimated to be living with HIV/AIDS in Los Angeles County, one-fifth of whom are believed to be unaware of their infection

## LOS ANGELES COUNTY

**Deaths** 274  
**Death Rate** 2.8 deaths per 100,000 population

**Healthy People 2010 Objective 13-14** 0.7 deaths per 100,000 population

**ICD-9 codes (1979-1998)** 042-044

**ICD-10 codes (1999-2010)** B20-B24

**References** **National Institute of Allergy and Infectious Diseases**  
[www.niaid.nih.gov/topics/hivaids](http://www.niaid.nih.gov/topics/hivaids)  
**CDC HIV/AIDS Prevention**  
[www.cdc.gov/hiv](http://www.cdc.gov/hiv)

**"Los Angeles County Five-Year Comprehensive HIV Plan"**  
[www.publichealth.lacounty.gov/dhsp/PPC/LAC\\_FiveYear\\_ComprehensiveHIVPlan2013-2017.pdf](http://www.publichealth.lacounty.gov/dhsp/PPC/LAC_FiveYear_ComprehensiveHIVPlan2013-2017.pdf)

**Referral** **Erase Doubt**  
 1-800-367-AIDS or  
[www.erasedoubt.org](http://www.erasedoubt.org)

**HIV L.A. Directory**  
 866-772-2365 or  
[www.hivla.org](http://www.hivla.org)

Figure T11. Trends in HIV mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>558</b>    | <b>6</b>    | <b>502</b>    | <b>5</b>    | <b>497</b>    | <b>5</b>    | <b>498</b>    | <b>5</b>    | <b>438</b>    | <b>4</b>    | <b>414</b>    | <b>4</b>    | <b>391</b>    | <b>4</b>    | <b>371</b>    | <b>4</b>    | <b>313</b>    | <b>3</b>    | <b>274</b>    | <b>3</b>    |
| <b>Males</b>                  | <b>485</b>    | <b>11</b>   | <b>428</b>    | <b>9</b>    | <b>438</b>    | <b>9</b>    | <b>436</b>    | <b>9</b>    | <b>378</b>    | <b>8</b>    | <b>355</b>    | <b>7</b>    | <b>338</b>    | <b>7</b>    | <b>310</b>    | <b>6</b>    | <b>256</b>    | <b>5</b>    | <b>232</b>    | <b>5</b>    |
| <b>Females</b>                | <b>73</b>     | <b>1</b>    | <b>74</b>     | <b>2</b>    | <b>59</b>     | <b>1</b>    | <b>62</b>     | <b>1</b>    | <b>60</b>     | <b>1</b>    | <b>59</b>     | <b>1</b>    | <b>53</b>     | <b>1</b>    | <b>61</b>     | <b>1</b>    | <b>57</b>     | <b>1</b>    | <b>42</b>     | <b>1</b>    |
| <b>White</b>                  | <b>195</b>    | <b>6</b>    | <b>151</b>    | <b>4</b>    | <b>167</b>    | <b>5</b>    | <b>174</b>    | <b>5</b>    | <b>139</b>    | <b>4</b>    | <b>155</b>    | <b>4</b>    | <b>119</b>    | <b>3</b>    | <b>96</b>     | <b>3</b>    | <b>84</b>     | <b>2</b>    | <b>74</b>     | <b>2</b>    |
| <b>Hispanic</b>               | <b>182</b>    | <b>5</b>    | <b>187</b>    | <b>5</b>    | <b>170</b>    | <b>5</b>    | <b>177</b>    | <b>5</b>    | <b>158</b>    | <b>4</b>    | <b>139</b>    | <b>3</b>    | <b>132</b>    | <b>3</b>    | <b>137</b>    | <b>3</b>    | <b>108</b>    | <b>3</b>    | <b>114</b>    | <b>3</b>    |
| <b>Black</b>                  | <b>170</b>    | <b>18</b>   | <b>148</b>    | <b>16</b>   | <b>145</b>    | <b>15</b>   | <b>136</b>    | <b>14</b>   | <b>131</b>    | <b>14</b>   | <b>108</b>    | <b>12</b>   | <b>125</b>    | <b>13</b>   | <b>113</b>    | <b>12</b>   | <b>109</b>    | <b>11</b>   | <b>80</b>     | <b>9</b>    |
| <b>Asian/Pacific Islander</b> | <b>9</b>      | <b>--</b>   | <b>14</b>     | <b>--</b>   | <b>10</b>     | <b>--</b>   | <b>7</b>      | <b>--</b>   | <b>6</b>      | <b>--</b>   | <b>8</b>      | <b>--</b>   | <b>11</b>     | <b>--</b>   | <b>21</b>     | <b>1</b>    | <b>11</b>     | <b>--</b>   | <b>5</b>      | <b>--</b>   |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>180</b>    | <b>10</b>   | <b>140</b>    | <b>8</b>    | <b>161</b>    | <b>9</b>    | <b>159</b>    | <b>9</b>    | <b>126</b>    | <b>7</b>    | <b>139</b>    | <b>8</b>    | <b>112</b>    | <b>6</b>    | <b>86</b>     | <b>5</b>    | <b>74</b>     | <b>4</b>    | <b>65</b>     | <b>4</b>    |
| <b>Hispanic</b>               | <b>156</b>    | <b>9</b>    | <b>165</b>    | <b>9</b>    | <b>143</b>    | <b>8</b>    | <b>159</b>    | <b>8</b>    | <b>140</b>    | <b>7</b>    | <b>121</b>    | <b>6</b>    | <b>119</b>    | <b>6</b>    | <b>114</b>    | <b>6</b>    | <b>91</b>     | <b>5</b>    | <b>98</b>     | <b>5</b>    |
| <b>Black</b>                  | <b>138</b>    | <b>33</b>   | <b>109</b>    | <b>26</b>   | <b>121</b>    | <b>28</b>   | <b>109</b>    | <b>25</b>   | <b>102</b>    | <b>24</b>   | <b>87</b>     | <b>21</b>   | <b>94</b>     | <b>22</b>   | <b>90</b>     | <b>21</b>   | <b>79</b>     | <b>18</b>   | <b>64</b>     | <b>15</b>   |
| <b>Asian/Pacific Islander</b> | <b>9</b>      | <b>--</b>   | <b>12</b>     | <b>--</b>   | <b>9</b>      | <b>--</b>   | <b>6</b>      | <b>--</b>   | <b>6</b>      | <b>--</b>   | <b>6</b>      | <b>--</b>   | <b>10</b>     | <b>--</b>   | <b>16</b>     | <b>--</b>   | <b>11</b>     | <b>--</b>   | <b>4</b>      | <b>--</b>   |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>15</b>     | <b>--</b>   | <b>11</b>     | <b>--</b>   | <b>6</b>      | <b>--</b>   | <b>15</b>     | <b>--</b>   | <b>13</b>     | <b>--</b>   | <b>16</b>     | <b>--</b>   | <b>7</b>      | <b>--</b>   | <b>10</b>     | <b>--</b>   | <b>10</b>     | <b>--</b>   | <b>9</b>      | <b>--</b>   |
| <b>Hispanic</b>               | <b>26</b>     | <b>1</b>    | <b>22</b>     | <b>1</b>    | <b>27</b>     | <b>1</b>    | <b>18</b>     | <b>--</b>   | <b>18</b>     | <b>--</b>   | <b>18</b>     | <b>--</b>   | <b>13</b>     | <b>--</b>   | <b>23</b>     | <b>1</b>    | <b>17</b>     | <b>--</b>   | <b>16</b>     | <b>--</b>   |
| <b>Black</b>                  | <b>32</b>     | <b>6</b>    | <b>39</b>     | <b>8</b>    | <b>24</b>     | <b>5</b>    | <b>27</b>     | <b>5</b>    | <b>29</b>     | <b>6</b>    | <b>21</b>     | <b>4</b>    | <b>31</b>     | <b>6</b>    | <b>23</b>     | <b>4</b>    | <b>30</b>     | <b>6</b>    | <b>16</b>     | <b>--</b>   |
| <b>Asian/Pacific Islander</b> | <b>0</b>      | <b>0</b>    | <b>2</b>      | <b>--</b>   | <b>1</b>      | <b>--</b>   | <b>1</b>      | <b>--</b>   | <b>0</b>      | <b>--</b>   | <b>2</b>      | <b>--</b>   | <b>1</b>      | <b>--</b>   | <b>5</b>      | <b>--</b>   | <b>0</b>      | <b>--</b>   | <b>1</b>      | <b>--</b>   |
| <b>SPA 1: Antelope Valley</b> | <b>19</b>     | <b>--</b>   | <b>11</b>     | <b>--</b>   | <b>10</b>     | <b>--</b>   | <b>4</b>      | <b>--</b>   | <b>9</b>      | <b>--</b>   | <b>6</b>      | <b>--</b>   | <b>11</b>     | <b>--</b>   | <b>5</b>      | <b>--</b>   | <b>10</b>     | <b>--</b>   | <b>10</b>     | <b>--</b>   |
| <b>SPA 2: San Fernando</b>    | <b>74</b>     | <b>4</b>    | <b>68</b>     | <b>3</b>    | <b>53</b>     | <b>3</b>    | <b>67</b>     | <b>3</b>    | <b>68</b>     | <b>3</b>    | <b>53</b>     | <b>2</b>    | <b>51</b>     | <b>2</b>    | <b>45</b>     | <b>2</b>    | <b>34</b>     | <b>1</b>    | <b>37</b>     | <b>2</b>    |
| <b>SPA 3: San Gabriel</b>     | <b>47</b>     | <b>3</b>    | <b>51</b>     | <b>3</b>    | <b>39</b>     | <b>2</b>    | <b>49</b>     | <b>3</b>    | <b>30</b>     | <b>2</b>    | <b>47</b>     | <b>3</b>    | <b>30</b>     | <b>2</b>    | <b>30</b>     | <b>2</b>    | <b>32</b>     | <b>2</b>    | <b>30</b>     | <b>2</b>    |
| <b>SPA 4: Metro</b>           | <b>155</b>    | <b>14</b>   | <b>133</b>    | <b>12</b>   | <b>167</b>    | <b>14</b>   | <b>133</b>    | <b>11</b>   | <b>129</b>    | <b>10</b>   | <b>132</b>    | <b>10</b>   | <b>112</b>    | <b>9</b>    | <b>93</b>     | <b>7</b>    | <b>81</b>     | <b>6</b>    | <b>71</b>     | <b>6</b>    |
| <b>SPA 5: West</b>            | <b>19</b>     | <b>--</b>   | <b>16</b>     | <b>--</b>   | <b>20</b>     | <b>3</b>    | <b>23</b>     | <b>3</b>    | <b>14</b>     | <b>--</b>   | <b>17</b>     | <b>--</b>   | <b>10</b>     | <b>--</b>   | <b>11</b>     | <b>--</b>   | <b>11</b>     | <b>--</b>   | <b>7</b>      | <b>--</b>   |
| <b>SPA 6: South</b>           | <b>90</b>     | <b>11</b>   | <b>87</b>     | <b>10</b>   | <b>96</b>     | <b>12</b>   | <b>106</b>    | <b>13</b>   | <b>76</b>     | <b>9</b>    | <b>57</b>     | <b>7</b>    | <b>76</b>     | <b>9</b>    | <b>85</b>     | <b>10</b>   | <b>63</b>     | <b>7</b>    | <b>41</b>     | <b>5</b>    |
| <b>SPA 7: East</b>            | <b>42</b>     | <b>4</b>    | <b>42</b>     | <b>3</b>    | <b>38</b>     | <b>3</b>    | <b>35</b>     | <b>3</b>    | <b>35</b>     | <b>3</b>    | <b>31</b>     | <b>2</b>    | <b>28</b>     | <b>2</b>    | <b>27</b>     | <b>2</b>    | <b>23</b>     | <b>2</b>    | <b>34</b>     | <b>3</b>    |
| <b>SPA 8: South Bay</b>       | <b>97</b>     | <b>6</b>    | <b>85</b>     | <b>5</b>    | <b>67</b>     | <b>4</b>    | <b>71</b>     | <b>5</b>    | <b>69</b>     | <b>4</b>    | <b>65</b>     | <b>4</b>    | <b>70</b>     | <b>4</b>    | <b>72</b>     | <b>4</b>    | <b>56</b>     | <b>3</b>    | <b>41</b>     | <b>3</b>    |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

--Number of deaths is too small to calculate a reliable rate.

# Liver Disease

5th cause of premature death  
9th cause of death

**LIVER DISEASE** has been a leading cause of premature death every year for the past 10 years. In 2010, it was the ninth-leading cause of death overall, but it was the second-leading cause of death among Hispanic men. Death rates from liver disease have been consistently higher for men than for women, with Hispanic men having the highest rates. The death rate for Hispanic men, 29 deaths per 100,000 population, was more than double the overall County rate, which far exceeded the Healthy People 2010 goal.

### In simple terms . . .

The liver stores vitamins and nutrients from food. It also breaks down toxic substances from the blood and removes waste products from the body. When normal liver cells are damaged, they are replaced by scar tissue. The scar tissue interferes with the flow of blood through the liver and prevents the liver from carrying out its normal functions. Damage from scarring of the liver (cirrhosis) cannot be reversed. Sustained heavy alcohol consumption is the leading cause of cirrhosis. Chronic hepatitis, a prolonged inflammation of the liver, also causes liver damage and can cause cirrhosis. Liver disease can also be caused by viral infections such as hepatitis B and hepatitis C, as well as non-viral causes such as autoimmune disease, and exposure to certain drugs and environmental toxins.

### Risk factors

Excessive alcohol consumption, prolonged exposure to certain chemicals and medications, hepatitis B or hepatitis C infection

### Community opportunities for prevention

- Provide access to alcohol treatment programs

- Promote hepatitis B vaccination for groups at high risk
- Provide hepatitis B and hepatitis C screening for high-risk populations which, for hepatitis C, includes adults born between 1945 and 1965
- Regulate alcohol outlet density, maintain limits on hours and days of sale, and enhance enforcement of laws prohibiting sales to minors

### Individual opportunities for prevention

- Limit alcohol intake
- Follow manufacturer's instructions when using household and industrial chemicals
- Follow doctor's instructions when taking prescription and over-the-counter drugs
- Avoid behaviors that promote transmission of hepatitis B and hepatitis C, such as injection drug use and unprotected sex
- Talk to your doctor about screening for the hepatitis B and hepatitis C viruses, and treatment for alcohol abuse

## LOS ANGELES COUNTY

Deaths 1,171  
Death Rate 12.0 deaths per 100,000 population

Healthy People 2010 Objective 26-2 3.2 deaths per 100,000 population

ICD-9 codes (1979-1998) 571

ICD-10 codes (1999-2010) K70, K73-K74

References **American Liver Foundation**  
[www.liverfoundation.org](http://www.liverfoundation.org)  
**National Digestive Diseases Information Clearinghouse**  
[www.digestive.niddk.nih.gov](http://www.digestive.niddk.nih.gov)  
**"Disparities and Deaths from Chronic Liver Disease and Cirrhosis, Los Angeles County, 2000-2008"**  
[http://publichealth.lacounty.gov/epi/docs/CLD\\_mortality\\_final\\_web.pdf](http://publichealth.lacounty.gov/epi/docs/CLD_mortality_final_web.pdf)

Referral **Greater Los Angeles Chapter of the American Liver Foundation**  
310-670-4624

Figure T12. Trends in liver disease mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>1,010</b>  | <b>12</b>   | <b>1,085</b>  | <b>12</b>   | <b>1,053</b>  | <b>12</b>   | <b>1,035</b>  | <b>11</b>   | <b>1,061</b>  | <b>11</b>   | <b>1,102</b>  | <b>11</b>   | <b>1,133</b>  | <b>12</b>   | <b>1,134</b>  | <b>11</b>   | <b>1,246</b>  | <b>12</b>   | <b>1,171</b>  | <b>12</b>   |
| <b>Males</b>                  | <b>695</b>    | <b>18</b>   | <b>741</b>    | <b>18</b>   | <b>727</b>    | <b>17</b>   | <b>698</b>    | <b>16</b>   | <b>759</b>    | <b>17</b>   | <b>758</b>    | <b>17</b>   | <b>792</b>    | <b>17</b>   | <b>773</b>    | <b>16</b>   | <b>837</b>    | <b>17</b>   | <b>787</b>    | <b>17</b>   |
| <b>Females</b>                | <b>315</b>    | <b>7</b>    | <b>344</b>    | <b>7</b>    | <b>326</b>    | <b>7</b>    | <b>337</b>    | <b>7</b>    | <b>302</b>    | <b>6</b>    | <b>344</b>    | <b>7</b>    | <b>341</b>    | <b>7</b>    | <b>361</b>    | <b>7</b>    | <b>409</b>    | <b>8</b>    | <b>384</b>    | <b>7</b>    |
| <b>White</b>                  | <b>416</b>    | <b>11</b>   | <b>432</b>    | <b>11</b>   | <b>403</b>    | <b>10</b>   | <b>428</b>    | <b>11</b>   | <b>397</b>    | <b>10</b>   | <b>386</b>    | <b>10</b>   | <b>396</b>    | <b>10</b>   | <b>398</b>    | <b>10</b>   | <b>419</b>    | <b>10</b>   | <b>416</b>    | <b>11</b>   |
| <b>Hispanic</b>               | <b>458</b>    | <b>19</b>   | <b>504</b>    | <b>19</b>   | <b>498</b>    | <b>19</b>   | <b>458</b>    | <b>17</b>   | <b>501</b>    | <b>17</b>   | <b>554</b>    | <b>18</b>   | <b>586</b>    | <b>19</b>   | <b>594</b>    | <b>18</b>   | <b>645</b>    | <b>20</b>   | <b>587</b>    | <b>18</b>   |
| <b>Black</b>                  | <b>97</b>     | <b>11</b>   | <b>100</b>    | <b>11</b>   | <b>92</b>     | <b>10</b>   | <b>98</b>     | <b>11</b>   | <b>102</b>    | <b>11</b>   | <b>98</b>     | <b>11</b>   | <b>86</b>     | <b>9</b>    | <b>69</b>     | <b>7</b>    | <b>112</b>    | <b>11</b>   | <b>97</b>     | <b>10</b>   |
| <b>Asian/Pacific Islander</b> | <b>32</b>     | <b>3</b>    | <b>39</b>     | <b>3</b>    | <b>42</b>     | <b>3</b>    | <b>46</b>     | <b>4</b>    | <b>48</b>     | <b>4</b>    | <b>49</b>     | <b>4</b>    | <b>55</b>     | <b>4</b>    | <b>59</b>     | <b>4</b>    | <b>58</b>     | <b>4</b>    | <b>55</b>     | <b>4</b>    |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>265</b>    | <b>15</b>   | <b>277</b>    | <b>15</b>   | <b>253</b>    | <b>14</b>   | <b>295</b>    | <b>16</b>   | <b>267</b>    | <b>14</b>   | <b>263</b>    | <b>14</b>   | <b>260</b>    | <b>13</b>   | <b>268</b>    | <b>13</b>   | <b>272</b>    | <b>13</b>   | <b>262</b>    | <b>14</b>   |
| <b>Hispanic</b>               | <b>343</b>    | <b>31</b>   | <b>381</b>    | <b>31</b>   | <b>377</b>    | <b>30</b>   | <b>308</b>    | <b>23</b>   | <b>383</b>    | <b>29</b>   | <b>397</b>    | <b>27</b>   | <b>439</b>    | <b>30</b>   | <b>413</b>    | <b>27</b>   | <b>448</b>    | <b>28</b>   | <b>423</b>    | <b>29</b>   |
| <b>Black</b>                  | <b>63</b>     | <b>17</b>   | <b>51</b>     | <b>13</b>   | <b>62</b>     | <b>16</b>   | <b>62</b>     | <b>16</b>   | <b>68</b>     | <b>18</b>   | <b>59</b>     | <b>14</b>   | <b>51</b>     | <b>12</b>   | <b>45</b>     | <b>10</b>   | <b>75</b>     | <b>17</b>   | <b>54</b>     | <b>12</b>   |
| <b>Asian/Pacific Islander</b> | <b>19</b>     | <b>--</b>   | <b>25</b>     | <b>5</b>    | <b>26</b>     | <b>4</b>    | <b>29</b>     | <b>5</b>    | <b>31</b>     | <b>5</b>    | <b>29</b>     | <b>5</b>    | <b>35</b>     | <b>5</b>    | <b>39</b>     | <b>6</b>    | <b>37</b>     | <b>5</b>    | <b>38</b>     | <b>5</b>    |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>151</b>    | <b>8</b>    | <b>155</b>    | <b>8</b>    | <b>150</b>    | <b>7</b>    | <b>133</b>    | <b>6</b>    | <b>130</b>    | <b>6</b>    | <b>123</b>    | <b>6</b>    | <b>136</b>    | <b>7</b>    | <b>130</b>    | <b>6</b>    | <b>147</b>    | <b>7</b>    | <b>154</b>    | <b>8</b>    |
| <b>Hispanic</b>               | <b>115</b>    | <b>10</b>   | <b>123</b>    | <b>9</b>    | <b>121</b>    | <b>10</b>   | <b>150</b>    | <b>11</b>   | <b>118</b>    | <b>8</b>    | <b>157</b>    | <b>11</b>   | <b>147</b>    | <b>9</b>    | <b>181</b>    | <b>11</b>   | <b>197</b>    | <b>12</b>   | <b>164</b>    | <b>10</b>   |
| <b>Black</b>                  | <b>34</b>     | <b>7</b>    | <b>49</b>     | <b>10</b>   | <b>30</b>     | <b>6</b>    | <b>36</b>     | <b>7</b>    | <b>34</b>     | <b>6</b>    | <b>39</b>     | <b>8</b>    | <b>35</b>     | <b>7</b>    | <b>24</b>     | <b>4</b>    | <b>37</b>     | <b>7</b>    | <b>43</b>     | <b>8</b>    |
| <b>Asian/Pacific Islander</b> | <b>13</b>     | <b>--</b>   | <b>14</b>     | <b>--</b>   | <b>16</b>     | <b>--</b>   | <b>17</b>     | <b>--</b>   | <b>17</b>     | <b>--</b>   | <b>20</b>     | <b>3</b>    | <b>20</b>     | <b>3</b>    | <b>20</b>     | <b>2</b>    | <b>21</b>     | <b>2</b>    | <b>17</b>     | <b>--</b>   |
| <b>SPA 1: Antelope Valley</b> | <b>40</b>     | <b>16</b>   | <b>35</b>     | <b>13</b>   | <b>48</b>     | <b>17</b>   | <b>40</b>     | <b>13</b>   | <b>39</b>     | <b>13</b>   | <b>43</b>     | <b>14</b>   | <b>50</b>     | <b>16</b>   | <b>45</b>     | <b>14</b>   | <b>53</b>     | <b>17</b>   | <b>47</b>     | <b>13</b>   |
| <b>SPA 2: San Fernando</b>    | <b>144</b>    | <b>8</b>    | <b>168</b>    | <b>9</b>    | <b>180</b>    | <b>9</b>    | <b>190</b>    | <b>9</b>    | <b>199</b>    | <b>10</b>   | <b>200</b>    | <b>9</b>    | <b>189</b>    | <b>9</b>    | <b>207</b>    | <b>9</b>    | <b>200</b>    | <b>9</b>    | <b>192</b>    | <b>9</b>    |
| <b>SPA 3: San Gabriel</b>     | <b>187</b>    | <b>12</b>   | <b>178</b>    | <b>11</b>   | <b>177</b>    | <b>10</b>   | <b>173</b>    | <b>10</b>   | <b>197</b>    | <b>11</b>   | <b>207</b>    | <b>11</b>   | <b>179</b>    | <b>10</b>   | <b>194</b>    | <b>10</b>   | <b>217</b>    | <b>11</b>   | <b>191</b>    | <b>11</b>   |
| <b>SPA 4: Metro</b>           | <b>136</b>    | <b>14</b>   | <b>159</b>    | <b>16</b>   | <b>134</b>    | <b>13</b>   | <b>131</b>    | <b>12</b>   | <b>127</b>    | <b>11</b>   | <b>136</b>    | <b>12</b>   | <b>144</b>    | <b>12</b>   | <b>147</b>    | <b>12</b>   | <b>163</b>    | <b>13</b>   | <b>151</b>    | <b>14</b>   |
| <b>SPA 5: West</b>            | <b>45</b>     | <b>7</b>    | <b>55</b>     | <b>8</b>    | <b>55</b>     | <b>8</b>    | <b>40</b>     | <b>6</b>    | <b>41</b>     | <b>6</b>    | <b>41</b>     | <b>6</b>    | <b>44</b>     | <b>6</b>    | <b>40</b>     | <b>5</b>    | <b>55</b>     | <b>7</b>    | <b>45</b>     | <b>6</b>    |
| <b>SPA 6: South</b>           | <b>110</b>    | <b>17</b>   | <b>119</b>    | <b>17</b>   | <b>106</b>    | <b>15</b>   | <b>118</b>    | <b>17</b>   | <b>102</b>    | <b>14</b>   | <b>120</b>    | <b>16</b>   | <b>122</b>    | <b>16</b>   | <b>112</b>    | <b>14</b>   | <b>130</b>    | <b>17</b>   | <b>141</b>    | <b>18</b>   |
| <b>SPA 7: East</b>            | <b>161</b>    | <b>15</b>   | <b>185</b>    | <b>17</b>   | <b>177</b>    | <b>16</b>   | <b>173</b>    | <b>15</b>   | <b>176</b>    | <b>15</b>   | <b>163</b>    | <b>14</b>   | <b>199</b>    | <b>17</b>   | <b>198</b>    | <b>16</b>   | <b>226</b>    | <b>18</b>   | <b>210</b>    | <b>18</b>   |
| <b>SPA 8: South Bay</b>       | <b>154</b>    | <b>11</b>   | <b>162</b>    | <b>12</b>   | <b>155</b>    | <b>11</b>   | <b>139</b>    | <b>10</b>   | <b>159</b>    | <b>11</b>   | <b>156</b>    | <b>10</b>   | <b>184</b>    | <b>12</b>   | <b>174</b>    | <b>11</b>   | <b>176</b>    | <b>11</b>   | <b>181</b>    | <b>12</b>   |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

--Number of deaths is too small to calculate a reliable rate.

# Lung Cancer

7th cause of premature death  
3rd cause of death

**LUNG CANCER** has been the third-leading cause of death each year for the past 10 years. In 2010, lung cancer was the third-leading cause of premature death for blacks and Asians/Pacific Islanders, the fourth-leading cause of premature death for whites, and the 12th-leading cause of premature death for Hispanics. The highest death rate, 66 deaths per 100,000 population, was among black men.

### In simple terms . . .

Cancer is a term for diseases in which cells in your body grow out of control. Cancer cells can invade nearby tissue and spread to other parts of the body through the blood and lymph systems. Lung cancer starts in the cells of the lung or bronchus.

### Risk factors

Tobacco smoking and breathing in the smoke of others; exposure to cancer-causing substances including radon, asbestos, uranium, and arsenic

### Community opportunities for prevention

- Restrict smoking in public places and worksites to decrease exposure to indoor and outdoor secondhand smoke
- Provide access to smoking cessation programs
- Reduce youth access to tobacco products through policies and their enforcement
- Increase the tobacco tax

### Individual opportunities for prevention

- If you smoke, get help to quit (1-800-NO-BUTTS)
- If you don't smoke, don't start
- Avoid being near people who are smoking
- Reduce exposure to cancer-causing substances

## LOS ANGELES COUNTY

Deaths 2,941  
Death Rate 32.8 deaths per 100,000 population

Healthy People 2010 Objective3-2 43.3 deaths per 100,000 population

ICD-9 codes (1979-1998) 162

ICD-10 codes (1999-2010) C33-C34

References **American Cancer Society**  
[www.cancer.org](http://www.cancer.org)  
**Guide to Community Preventive Services**  
[www.thecommunityguide.org](http://www.thecommunityguide.org)  
**National Cancer Institute, Surveillance, Epidemiology and End Results (SEER) Program**  
[www.seer.cancer.gov/registries/los\\_angeles.html](http://www.seer.cancer.gov/registries/los_angeles.html)  
**It's Quitting Time L.A.**  
[www.laquits.com](http://www.laquits.com)

Referral **American Cancer Society Helpline**  
1-800-227-2345  
**California Smokers' Helpline**  
1-800-NO-BUTTS

Figure T13. Trends in lung cancer mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>3,232</b>  | <b>42</b>   | <b>3,081</b>  | <b>39</b>   | <b>3,150</b>  | <b>38</b>   | <b>3,034</b>  | <b>36</b>   | <b>3,036</b>  | <b>35</b>   | <b>3,021</b>  | <b>35</b>   | <b>2,950</b>  | <b>33</b>   | <b>2,910</b>  | <b>31</b>   | <b>2,958</b>  | <b>31</b>   | <b>2,941</b>  | <b>33</b>   |
| <b>Males</b>                  | <b>1,797</b>  | <b>55</b>   | <b>1,702</b>  | <b>50</b>   | <b>1,713</b>  | <b>49</b>   | <b>1,710</b>  | <b>48</b>   | <b>1,608</b>  | <b>44</b>   | <b>1,719</b>  | <b>47</b>   | <b>1,568</b>  | <b>41</b>   | <b>1,568</b>  | <b>40</b>   | <b>1,650</b>  | <b>41</b>   | <b>1,602</b>  | <b>41</b>   |
| <b>Females</b>                | <b>1,435</b>  | <b>32</b>   | <b>1,379</b>  | <b>30</b>   | <b>1,437</b>  | <b>31</b>   | <b>1,324</b>  | <b>27</b>   | <b>1,428</b>  | <b>29</b>   | <b>1,302</b>  | <b>26</b>   | <b>1,382</b>  | <b>27</b>   | <b>1,342</b>  | <b>25</b>   | <b>1,308</b>  | <b>24</b>   | <b>1,339</b>  | <b>26</b>   |
| <b>White</b>                  | <b>2,039</b>  | <b>50</b>   | <b>1,950</b>  | <b>47</b>   | <b>1,942</b>  | <b>46</b>   | <b>1,825</b>  | <b>43</b>   | <b>1,830</b>  | <b>43</b>   | <b>1,788</b>  | <b>42</b>   | <b>1,700</b>  | <b>39</b>   | <b>1,687</b>  | <b>38</b>   | <b>1,702</b>  | <b>38</b>   | <b>1,655</b>  | <b>40</b>   |
| <b>Hispanic</b>               | <b>348</b>    | <b>20</b>   | <b>363</b>    | <b>21</b>   | <b>381</b>    | <b>20</b>   | <b>366</b>    | <b>19</b>   | <b>370</b>    | <b>17</b>   | <b>384</b>    | <b>18</b>   | <b>398</b>    | <b>17</b>   | <b>433</b>    | <b>18</b>   | <b>408</b>    | <b>16</b>   | <b>441</b>    | <b>18</b>   |
| <b>Black</b>                  | <b>482</b>    | <b>63</b>   | <b>455</b>    | <b>58</b>   | <b>451</b>    | <b>56</b>   | <b>452</b>    | <b>55</b>   | <b>457</b>    | <b>56</b>   | <b>480</b>    | <b>58</b>   | <b>464</b>    | <b>54</b>   | <b>377</b>    | <b>43</b>   | <b>432</b>    | <b>48</b>   | <b>433</b>    | <b>51</b>   |
| <b>Asian/Pacific Islander</b> | <b>356</b>    | <b>34</b>   | <b>306</b>    | <b>28</b>   | <b>367</b>    | <b>31</b>   | <b>379</b>    | <b>31</b>   | <b>368</b>    | <b>29</b>   | <b>359</b>    | <b>27</b>   | <b>378</b>    | <b>27</b>   | <b>406</b>    | <b>28</b>   | <b>412</b>    | <b>27</b>   | <b>400</b>    | <b>27</b>   |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>1,056</b>  | <b>60</b>   | <b>1,034</b>  | <b>57</b>   | <b>989</b>    | <b>54</b>   | <b>974</b>    | <b>53</b>   | <b>921</b>    | <b>50</b>   | <b>941</b>    | <b>51</b>   | <b>860</b>    | <b>45</b>   | <b>850</b>    | <b>44</b>   | <b>892</b>    | <b>45</b>   | <b>855</b>    | <b>47</b>   |
| <b>Hispanic</b>               | <b>219</b>    | <b>32</b>   | <b>217</b>    | <b>31</b>   | <b>237</b>    | <b>29</b>   | <b>231</b>    | <b>29</b>   | <b>210</b>    | <b>23</b>   | <b>236</b>    | <b>27</b>   | <b>233</b>    | <b>25</b>   | <b>253</b>    | <b>26</b>   | <b>243</b>    | <b>23</b>   | <b>260</b>    | <b>26</b>   |
| <b>Black</b>                  | <b>289</b>    | <b>94</b>   | <b>258</b>    | <b>81</b>   | <b>267</b>    | <b>82</b>   | <b>263</b>    | <b>78</b>   | <b>243</b>    | <b>73</b>   | <b>286</b>    | <b>85</b>   | <b>245</b>    | <b>70</b>   | <b>200</b>    | <b>58</b>   | <b>247</b>    | <b>69</b>   | <b>228</b>    | <b>66</b>   |
| <b>Asian/Pacific Islander</b> | <b>229</b>    | <b>51</b>   | <b>188</b>    | <b>39</b>   | <b>215</b>    | <b>42</b>   | <b>235</b>    | <b>44</b>   | <b>228</b>    | <b>42</b>   | <b>250</b>    | <b>43</b>   | <b>224</b>    | <b>38</b>   | <b>261</b>    | <b>42</b>   | <b>266</b>    | <b>42</b>   | <b>249</b>    | <b>39</b>   |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>983</b>    | <b>43</b>   | <b>916</b>    | <b>39</b>   | <b>953</b>    | <b>40</b>   | <b>851</b>    | <b>36</b>   | <b>909</b>    | <b>38</b>   | <b>847</b>    | <b>35</b>   | <b>840</b>    | <b>35</b>   | <b>837</b>    | <b>33</b>   | <b>810</b>    | <b>32</b>   | <b>800</b>    | <b>35</b>   |
| <b>Hispanic</b>               | <b>129</b>    | <b>12</b>   | <b>146</b>    | <b>14</b>   | <b>144</b>    | <b>13</b>   | <b>135</b>    | <b>12</b>   | <b>160</b>    | <b>13</b>   | <b>148</b>    | <b>12</b>   | <b>165</b>    | <b>12</b>   | <b>180</b>    | <b>13</b>   | <b>165</b>    | <b>11</b>   | <b>181</b>    | <b>13</b>   |
| <b>Black</b>                  | <b>193</b>    | <b>43</b>   | <b>197</b>    | <b>42</b>   | <b>184</b>    | <b>39</b>   | <b>189</b>    | <b>39</b>   | <b>214</b>    | <b>43</b>   | <b>194</b>    | <b>39</b>   | <b>219</b>    | <b>43</b>   | <b>177</b>    | <b>34</b>   | <b>185</b>    | <b>35</b>   | <b>205</b>    | <b>41</b>   |
| <b>Asian/Pacific Islander</b> | <b>127</b>    | <b>21</b>   | <b>118</b>    | <b>19</b>   | <b>152</b>    | <b>23</b>   | <b>144</b>    | <b>21</b>   | <b>140</b>    | <b>19</b>   | <b>109</b>    | <b>14</b>   | <b>154</b>    | <b>19</b>   | <b>145</b>    | <b>17</b>   | <b>146</b>    | <b>17</b>   | <b>151</b>    | <b>18</b>   |
| <b>SPA 1: Antelope Valley</b> | <b>117</b>    | <b>55</b>   | <b>109</b>    | <b>49</b>   | <b>120</b>    | <b>53</b>   | <b>114</b>    | <b>50</b>   | <b>122</b>    | <b>53</b>   | <b>123</b>    | <b>51</b>   | <b>134</b>    | <b>52</b>   | <b>128</b>    | <b>48</b>   | <b>118</b>    | <b>43</b>   | <b>123</b>    | <b>44</b>   |
| <b>SPA 2: San Fernando</b>    | <b>710</b>    | <b>42</b>   | <b>665</b>    | <b>38</b>   | <b>695</b>    | <b>39</b>   | <b>643</b>    | <b>35</b>   | <b>683</b>    | <b>37</b>   | <b>675</b>    | <b>36</b>   | <b>637</b>    | <b>33</b>   | <b>620</b>    | <b>30</b>   | <b>664</b>    | <b>32</b>   | <b>625</b>    | <b>31</b>   |
| <b>SPA 3: San Gabriel</b>     | <b>597</b>    | <b>40</b>   | <b>544</b>    | <b>35</b>   | <b>563</b>    | <b>35</b>   | <b>531</b>    | <b>32</b>   | <b>596</b>    | <b>35</b>   | <b>562</b>    | <b>32</b>   | <b>550</b>    | <b>31</b>   | <b>564</b>    | <b>31</b>   | <b>573</b>    | <b>31</b>   | <b>566</b>    | <b>32</b>   |
| <b>SPA 4: Metro</b>           | <b>318</b>    | <b>35</b>   | <b>294</b>    | <b>31</b>   | <b>313</b>    | <b>32</b>   | <b>290</b>    | <b>29</b>   | <b>285</b>    | <b>28</b>   | <b>267</b>    | <b>26</b>   | <b>274</b>    | <b>25</b>   | <b>294</b>    | <b>27</b>   | <b>265</b>    | <b>24</b>   | <b>302</b>    | <b>31</b>   |
| <b>SPA 5: West</b>            | <b>236</b>    | <b>36</b>   | <b>255</b>    | <b>38</b>   | <b>216</b>    | <b>32</b>   | <b>222</b>    | <b>32</b>   | <b>220</b>    | <b>31</b>   | <b>217</b>    | <b>31</b>   | <b>204</b>    | <b>29</b>   | <b>212</b>    | <b>28</b>   | <b>216</b>    | <b>28</b>   | <b>226</b>    | <b>31</b>   |
| <b>SPA 6: South</b>           | <b>310</b>    | <b>53</b>   | <b>300</b>    | <b>50</b>   | <b>286</b>    | <b>46</b>   | <b>297</b>    | <b>47</b>   | <b>293</b>    | <b>45</b>   | <b>271</b>    | <b>42</b>   | <b>280</b>    | <b>42</b>   | <b>242</b>    | <b>36</b>   | <b>275</b>    | <b>40</b>   | <b>268</b>    | <b>41</b>   |
| <b>SPA 7: East</b>            | <b>360</b>    | <b>37</b>   | <b>339</b>    | <b>34</b>   | <b>356</b>    | <b>35</b>   | <b>366</b>    | <b>35</b>   | <b>332</b>    | <b>31</b>   | <b>325</b>    | <b>30</b>   | <b>341</b>    | <b>30</b>   | <b>346</b>    | <b>30</b>   | <b>300</b>    | <b>26</b>   | <b>299</b>    | <b>28</b>   |
| <b>SPA 8: South Bay</b>       | <b>569</b>    | <b>46</b>   | <b>567</b>    | <b>45</b>   | <b>580</b>    | <b>44</b>   | <b>544</b>    | <b>41</b>   | <b>496</b>    | <b>36</b>   | <b>564</b>    | <b>41</b>   | <b>520</b>    | <b>36</b>   | <b>494</b>    | <b>34</b>   | <b>541</b>    | <b>36</b>   | <b>529</b>    | <b>38</b>   |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

# Motor Vehicle Crash

4th cause of premature death  
18th cause of death

**MOTOR VEHICLE CRASHES** were the 18th-leading cause of death overall, but were the second-leading cause of death for 5- to 14-year-olds and 15- to 24-year-olds, and the second-leading cause of premature death among men in the Antelope Valley Service Planning Area. The median age at death from motor vehicle crash was 34 years for Hispanics, 37 for blacks, 50 for whites, and 64 for Asians/Pacific Islanders. Most of the deaths were pedestrians (210 deaths) followed by the occupants of a car, van, or truck (197 deaths).

### In simple terms . . .

Motor vehicle crashes can occur on any public roadway, including streets, alleys, or highways. They can also occur in non-public areas such as parking lots or driveways.

Any type of vehicle can be involved in a motor vehicle crash, including a car, truck, bus, or motorcycle. The person injured may be the driver or passenger of the vehicle that caused the crash, or of the vehicle that was hit, or a pedestrian or bicyclist.

### Risk factors

Risk factors for crashing: driving under the influence of alcohol or drugs (illicit, prescription, or over-the-counter), driving recklessly, distracted driving, disobeying traffic laws, lack of driving experience, younger or older age, hazardous road conditions, neglecting routine car maintenance

Risk factors for injury after a crash: not using seat belts or other passenger safety restraints such as child safety seats, unsafe car design, not wearing a helmet when riding a motorcycle or bicycle

### Community opportunities for prevention

- Actively enforce all traffic laws, including those addressing distracted driving, seat belt use, child passenger safety, speeding, and driving under the influence

- Use media and educational campaigns to reduce alcohol-impaired driving, and to improve child passenger and teen driving safety
- Use the built environment to reduce motor vehicle injuries and fatalities by adding sidewalks, bike lanes, traffic calming measures, and signal timing
- Support national efforts for safe car design features such as antilock brakes and electronic stability control systems

### Individual opportunities for prevention

- Do not drive while impaired by alcohol or drugs
- Do not text while driving
- Always wear seat belts, even for short trips
- Place children under age 12 in an age-appropriate, properly installed child safety seat or booster seat in the back seat of the car
- Wear helmets when using bikes, scooters, skates, and skateboards
- When walking near traffic, supervise young children and hold their hand
- Keep your vehicle in good working order

## LOS ANGELES COUNTY

**Deaths** 625  
**Death Rate** 6.3 deaths per 100,000 population

**Healthy People 2010 Objective 15-15** 8.0 deaths per 100,000 population (rate for traffic-related deaths only)

**ICD-9 codes (1979-1998)** E810-E825

**ICD-10 codes (1999-2010)** V02-V04, V09.0, V09.2, V12-V14, V19.0-V19.2, V19.4-V19.6, V20-V79, V80.3-V80.5, V81.0-V81.1, V82.0-V82.1, V83-V86, V87.0-V87.8, V88.0-V88.8, V89.0, V89.2

**References** **Guide to Community Preventive Services**  
[www.thecommunityguide.org](http://www.thecommunityguide.org)  
**The National Highway Traffic Safety Administration**  
[www.nhtsa.dot.gov](http://www.nhtsa.dot.gov)

**Referral** **California Highway Patrol (non-emergency)**  
1-800-TELL-CHP

Figure T14. Trends in motor vehicle crash mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>890</b>    | <b>9</b>    | <b>851</b>    | <b>9</b>    | <b>967</b>    | <b>10</b>   | <b>947</b>    | <b>10</b>   | <b>925</b>    | <b>9</b>    | <b>965</b>    | <b>10</b>   | <b>908</b>    | <b>9</b>    | <b>822</b>    | <b>8</b>    | <b>677</b>    | <b>7</b>    | <b>625</b>    | <b>6</b>    |
| <b>Males</b>                  | <b>598</b>    | <b>13</b>   | <b>578</b>    | <b>12</b>   | <b>697</b>    | <b>15</b>   | <b>647</b>    | <b>14</b>   | <b>650</b>    | <b>13</b>   | <b>681</b>    | <b>14</b>   | <b>669</b>    | <b>13</b>   | <b>623</b>    | <b>12</b>   | <b>484</b>    | <b>10</b>   | <b>428</b>    | <b>9</b>    |
| <b>Females</b>                | <b>292</b>    | <b>6</b>    | <b>273</b>    | <b>6</b>    | <b>270</b>    | <b>5</b>    | <b>300</b>    | <b>6</b>    | <b>275</b>    | <b>5</b>    | <b>284</b>    | <b>6</b>    | <b>239</b>    | <b>5</b>    | <b>199</b>    | <b>4</b>    | <b>193</b>    | <b>4</b>    | <b>197</b>    | <b>4</b>    |
| <b>White</b>                  | <b>304</b>    | <b>9</b>    | <b>292</b>    | <b>9</b>    | <b>343</b>    | <b>10</b>   | <b>340</b>    | <b>10</b>   | <b>287</b>    | <b>9</b>    | <b>312</b>    | <b>10</b>   | <b>272</b>    | <b>8</b>    | <b>253</b>    | <b>8</b>    | <b>220</b>    | <b>6</b>    | <b>200</b>    | <b>6</b>    |
| <b>Hispanic</b>               | <b>359</b>    | <b>10</b>   | <b>373</b>    | <b>9</b>    | <b>418</b>    | <b>10</b>   | <b>374</b>    | <b>9</b>    | <b>428</b>    | <b>10</b>   | <b>425</b>    | <b>10</b>   | <b>436</b>    | <b>10</b>   | <b>367</b>    | <b>8</b>    | <b>312</b>    | <b>7</b>    | <b>290</b>    | <b>7</b>    |
| <b>Black</b>                  | <b>129</b>    | <b>14</b>   | <b>108</b>    | <b>12</b>   | <b>107</b>    | <b>12</b>   | <b>120</b>    | <b>13</b>   | <b>106</b>    | <b>11</b>   | <b>115</b>    | <b>12</b>   | <b>110</b>    | <b>12</b>   | <b>107</b>    | <b>11</b>   | <b>74</b>     | <b>8</b>    | <b>71</b>     | <b>8</b>    |
| <b>Asian/Pacific Islander</b> | <b>95</b>     | <b>8</b>    | <b>75</b>     | <b>6</b>    | <b>95</b>     | <b>7</b>    | <b>107</b>    | <b>8</b>    | <b>95</b>     | <b>7</b>    | <b>110</b>    | <b>8</b>    | <b>86</b>     | <b>6</b>    | <b>92</b>     | <b>7</b>    | <b>69</b>     | <b>5</b>    | <b>62</b>     | <b>4</b>    |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>216</b>    | <b>13</b>   | <b>190</b>    | <b>12</b>   | <b>246</b>    | <b>15</b>   | <b>218</b>    | <b>14</b>   | <b>201</b>    | <b>13</b>   | <b>220</b>    | <b>14</b>   | <b>191</b>    | <b>12</b>   | <b>198</b>    | <b>12</b>   | <b>169</b>    | <b>10</b>   | <b>136</b>    | <b>8</b>    |
| <b>Hispanic</b>               | <b>242</b>    | <b>14</b>   | <b>270</b>    | <b>13</b>   | <b>317</b>    | <b>15</b>   | <b>270</b>    | <b>13</b>   | <b>304</b>    | <b>14</b>   | <b>321</b>    | <b>15</b>   | <b>334</b>    | <b>15</b>   | <b>290</b>    | <b>13</b>   | <b>223</b>    | <b>10</b>   | <b>213</b>    | <b>10</b>   |
| <b>Black</b>                  | <b>82</b>     | <b>19</b>   | <b>77</b>     | <b>20</b>   | <b>71</b>     | <b>17</b>   | <b>85</b>     | <b>20</b>   | <b>83</b>     | <b>20</b>   | <b>82</b>     | <b>20</b>   | <b>84</b>     | <b>20</b>   | <b>77</b>     | <b>18</b>   | <b>52</b>     | <b>12</b>   | <b>54</b>     | <b>13</b>   |
| <b>Asian/Pacific Islander</b> | <b>56</b>     | <b>10</b>   | <b>40</b>     | <b>7</b>    | <b>60</b>     | <b>10</b>   | <b>71</b>     | <b>12</b>   | <b>58</b>     | <b>10</b>   | <b>55</b>     | <b>8</b>    | <b>57</b>     | <b>9</b>    | <b>56</b>     | <b>9</b>    | <b>39</b>     | <b>6</b>    | <b>25</b>     | <b>4</b>    |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>88</b>     | <b>5</b>    | <b>102</b>    | <b>6</b>    | <b>97</b>     | <b>6</b>    | <b>122</b>    | <b>7</b>    | <b>86</b>     | <b>5</b>    | <b>92</b>     | <b>5</b>    | <b>81</b>     | <b>4</b>    | <b>55</b>     | <b>3</b>    | <b>51</b>     | <b>3</b>    | <b>64</b>     | <b>4</b>    |
| <b>Hispanic</b>               | <b>117</b>    | <b>7</b>    | <b>103</b>    | <b>5</b>    | <b>101</b>    | <b>5</b>    | <b>104</b>    | <b>5</b>    | <b>124</b>    | <b>6</b>    | <b>104</b>    | <b>5</b>    | <b>102</b>    | <b>5</b>    | <b>77</b>     | <b>4</b>    | <b>89</b>     | <b>4</b>    | <b>77</b>     | <b>4</b>    |
| <b>Black</b>                  | <b>47</b>     | <b>9</b>    | <b>31</b>     | <b>6</b>    | <b>36</b>     | <b>7</b>    | <b>35</b>     | <b>7</b>    | <b>23</b>     | <b>5</b>    | <b>33</b>     | <b>7</b>    | <b>26</b>     | <b>5</b>    | <b>30</b>     | <b>6</b>    | <b>22</b>     | <b>4</b>    | <b>17</b>     | <b>--</b>   |
| <b>Asian/Pacific Islander</b> | <b>39</b>     | <b>6</b>    | <b>35</b>     | <b>5</b>    | <b>35</b>     | <b>5</b>    | <b>36</b>     | <b>5</b>    | <b>37</b>     | <b>5</b>    | <b>55</b>     | <b>7</b>    | <b>29</b>     | <b>4</b>    | <b>36</b>     | <b>5</b>    | <b>30</b>     | <b>4</b>    | <b>37</b>     | <b>4</b>    |
| <b>SPA 1: Antelope Valley</b> | <b>64</b>     | <b>22</b>   | <b>69</b>     | <b>22</b>   | <b>71</b>     | <b>22</b>   | <b>83</b>     | <b>28</b>   | <b>80</b>     | <b>25</b>   | <b>73</b>     | <b>22</b>   | <b>51</b>     | <b>15</b>   | <b>44</b>     | <b>12</b>   | <b>45</b>     | <b>13</b>   | <b>35</b>     | <b>10</b>   |
| <b>SPA 2: San Fernando</b>    | <b>196</b>    | <b>10</b>   | <b>172</b>    | <b>8</b>    | <b>203</b>    | <b>10</b>   | <b>180</b>    | <b>9</b>    | <b>197</b>    | <b>9</b>    | <b>197</b>    | <b>9</b>    | <b>156</b>    | <b>7</b>    | <b>167</b>    | <b>8</b>    | <b>142</b>    | <b>6</b>    | <b>127</b>    | <b>6</b>    |
| <b>SPA 3: San Gabriel</b>     | <b>140</b>    | <b>8</b>    | <b>140</b>    | <b>8</b>    | <b>138</b>    | <b>8</b>    | <b>153</b>    | <b>8</b>    | <b>179</b>    | <b>10</b>   | <b>147</b>    | <b>8</b>    | <b>153</b>    | <b>8</b>    | <b>124</b>    | <b>6</b>    | <b>109</b>    | <b>6</b>    | <b>100</b>    | <b>6</b>    |
| <b>SPA 4: Metro</b>           | <b>98</b>     | <b>9</b>    | <b>78</b>     | <b>7</b>    | <b>99</b>     | <b>8</b>    | <b>84</b>     | <b>7</b>    | <b>91</b>     | <b>8</b>    | <b>82</b>     | <b>7</b>    | <b>87</b>     | <b>7</b>    | <b>76</b>     | <b>6</b>    | <b>65</b>     | <b>5</b>    | <b>75</b>     | <b>7</b>    |
| <b>SPA 5: West</b>            | <b>32</b>     | <b>5</b>    | <b>35</b>     | <b>5</b>    | <b>40</b>     | <b>6</b>    | <b>37</b>     | <b>6</b>    | <b>35</b>     | <b>6</b>    | <b>41</b>     | <b>6</b>    | <b>39</b>     | <b>6</b>    | <b>32</b>     | <b>5</b>    | <b>31</b>     | <b>4</b>    | <b>30</b>     | <b>5</b>    |
| <b>SPA 6: South</b>           | <b>121</b>    | <b>13</b>   | <b>110</b>    | <b>12</b>   | <b>106</b>    | <b>12</b>   | <b>106</b>    | <b>11</b>   | <b>99</b>     | <b>10</b>   | <b>118</b>    | <b>13</b>   | <b>119</b>    | <b>13</b>   | <b>112</b>    | <b>12</b>   | <b>94</b>     | <b>10</b>   | <b>70</b>     | <b>7</b>    |
| <b>SPA 7: East</b>            | <b>91</b>     | <b>8</b>    | <b>114</b>    | <b>9</b>    | <b>110</b>    | <b>9</b>    | <b>105</b>    | <b>8</b>    | <b>106</b>    | <b>8</b>    | <b>110</b>    | <b>8</b>    | <b>124</b>    | <b>9</b>    | <b>111</b>    | <b>8</b>    | <b>85</b>     | <b>6</b>    | <b>88</b>     | <b>7</b>    |
| <b>SPA 8: South Bay</b>       | <b>123</b>    | <b>8</b>    | <b>114</b>    | <b>8</b>    | <b>114</b>    | <b>8</b>    | <b>112</b>    | <b>7</b>    | <b>117</b>    | <b>7</b>    | <b>137</b>    | <b>9</b>    | <b>113</b>    | <b>7</b>    | <b>113</b>    | <b>7</b>    | <b>89</b>     | <b>6</b>    | <b>83</b>     | <b>5</b>    |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

# Pneumonia/Influenza

21st cause of premature death  
6th cause of death

**PNEUMONIA/INFLUENZA** has been the fifth- or sixth-leading cause of death each year for the past 10 years, but it contributed little to premature death. In 2010, the median age at death from pneumonia/influenza was 84 years. The overall death rate from pneumonia/influenza was 22 deaths per 100,000 population, but for seniors older than 84, the rate was 642 deaths per 100,000 population.

### In simple terms . . .

Pneumonia is an inflammation of the lungs caused by an infection or, less commonly, by a chemical or physical irritant that can result in difficulty breathing. Pneumonia is a common illness that is often mild but can be quite severe, even fatal. The severity of the infection depends on the cause and the person's age and health. Lung infections can be caused by bacteria, viruses, or fungi. Influenza, often called "the flu," is one of many viruses that cause mild to severe respiratory illness, including pneumonia, which can result in death. Influenza and some forms of bacterial pneumonia are spread from person to person. Influenza and some kinds of pneumonia are vaccine preventable.

### Risk factors (for complications)

Age (young and old), underlying chronic medical conditions such as diabetes and heart disease, being morbidly obese, weakened immune system, chronic lung disease, tobacco smoking and breathing in the smoke of others

### Community opportunities for prevention

- Educate the community about the recommendations for influenza and pneumococcal vaccination
- Provide information about the availability of no-cost vaccinations

### Individual opportunities for prevention

- Follow recommended guidelines for influenza and pneumococcal vaccination
- Wash your hands frequently with soap and water
- If you smoke, get help to quit (1-800-NO-BUTTS)
- Stay away from people who are sick and avoid spreading illness to others by staying home if you have a fever, cough and runny nose
- Avoid touching your eyes, nose, or mouth

## LOS ANGELES COUNTY

Deaths 1,964  
Death Rate 22 deaths per 100,000 population

Healthy People 2010 Objective None

ICD-9 codes (1979-1998) 480-487

ICD-10 codes (1999-2010) J09-J18

References **American Lung Association**  
[www.lungusa.org](http://www.lungusa.org)  
**Centers for Disease Control and Prevention**  
[www.cdc.gov/flu](http://www.cdc.gov/flu)  
**U.S. Department of Health and Human Services**  
[www.flu.gov](http://www.flu.gov)  
**California Department of Public Health**  
[www.cdph.ca.gov/HealthInfo/discond/Pages/Influenza\(Flu\).aspx](http://www.cdph.ca.gov/HealthInfo/discond/Pages/Influenza(Flu).aspx)

Referral **Los Angeles County Info Line for free or low-cost immunization clinics**  
2-1-1, or 1-800-427-8700

Figure T15. Trends in pneumonia/influenza mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>2,421</b>  | <b>32</b>   | <b>2,494</b>  | <b>31</b>   | <b>2,419</b>  | <b>29</b>   | <b>2,272</b>  | <b>27</b>   | <b>2,333</b>  | <b>27</b>   | <b>2,283</b>  | <b>26</b>   | <b>2,184</b>  | <b>24</b>   | <b>2,171</b>  | <b>23</b>   | <b>2,097</b>  | <b>21</b>   | <b>1,964</b>  | <b>22</b>   |
| <b>Males</b>                  | <b>1,065</b>  | <b>38</b>   | <b>1,155</b>  | <b>39</b>   | <b>1,121</b>  | <b>36</b>   | <b>1,013</b>  | <b>32</b>   | <b>1,055</b>  | <b>32</b>   | <b>1,083</b>  | <b>32</b>   | <b>1,018</b>  | <b>29</b>   | <b>990</b>    | <b>27</b>   | <b>1,016</b>  | <b>26</b>   | <b>910</b>    | <b>26</b>   |
| <b>Females</b>                | <b>1,356</b>  | <b>28</b>   | <b>1,339</b>  | <b>27</b>   | <b>1,298</b>  | <b>25</b>   | <b>1,259</b>  | <b>24</b>   | <b>1,278</b>  | <b>24</b>   | <b>1,200</b>  | <b>22</b>   | <b>1,166</b>  | <b>20</b>   | <b>1,181</b>  | <b>20</b>   | <b>1,081</b>  | <b>18</b>   | <b>1,054</b>  | <b>19</b>   |
| <b>White</b>                  | <b>1,488</b>  | <b>32</b>   | <b>1,595</b>  | <b>64</b>   | <b>1,475</b>  | <b>31</b>   | <b>1,330</b>  | <b>27</b>   | <b>1,338</b>  | <b>27</b>   | <b>1,314</b>  | <b>27</b>   | <b>1,198</b>  | <b>24</b>   | <b>1,203</b>  | <b>23</b>   | <b>1,076</b>  | <b>21</b>   | <b>1,011</b>  | <b>22</b>   |
| <b>Hispanic</b>               | <b>398</b>    | <b>28</b>   | <b>383</b>    | <b>26</b>   | <b>411</b>    | <b>25</b>   | <b>408</b>    | <b>24</b>   | <b>448</b>    | <b>24</b>   | <b>429</b>    | <b>22</b>   | <b>418</b>    | <b>20</b>   | <b>430</b>    | <b>19</b>   | <b>492</b>    | <b>20</b>   | <b>399</b>    | <b>19</b>   |
| <b>Black</b>                  | <b>270</b>    | <b>39</b>   | <b>269</b>    | <b>37</b>   | <b>271</b>    | <b>37</b>   | <b>257</b>    | <b>34</b>   | <b>238</b>    | <b>31</b>   | <b>246</b>    | <b>32</b>   | <b>259</b>    | <b>32</b>   | <b>232</b>    | <b>28</b>   | <b>223</b>    | <b>26</b>   | <b>247</b>    | <b>31</b>   |
| <b>Asian/Pacific Islander</b> | <b>259</b>    | <b>30</b>   | <b>236</b>    | <b>25</b>   | <b>250</b>    | <b>25</b>   | <b>265</b>    | <b>24</b>   | <b>300</b>    | <b>26</b>   | <b>284</b>    | <b>23</b>   | <b>305</b>    | <b>23</b>   | <b>297</b>    | <b>21</b>   | <b>290</b>    | <b>20</b>   | <b>296</b>    | <b>21</b>   |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>622</b>    | <b>37</b>   | <b>723</b>    | <b>41</b>   | <b>659</b>    | <b>36</b>   | <b>613</b>    | <b>33</b>   | <b>580</b>    | <b>32</b>   | <b>612</b>    | <b>34</b>   | <b>532</b>    | <b>28</b>   | <b>541</b>    | <b>28</b>   | <b>528</b>    | <b>26</b>   | <b>480</b>    | <b>26</b>   |
| <b>Hispanic</b>               | <b>180</b>    | <b>34</b>   | <b>182</b>    | <b>33</b>   | <b>189</b>    | <b>29</b>   | <b>174</b>    | <b>26</b>   | <b>208</b>    | <b>29</b>   | <b>198</b>    | <b>26</b>   | <b>197</b>    | <b>24</b>   | <b>192</b>    | <b>22</b>   | <b>232</b>    | <b>23</b>   | <b>179</b>    | <b>21</b>   |
| <b>Black</b>                  | <b>120</b>    | <b>51</b>   | <b>124</b>    | <b>46</b>   | <b>139</b>    | <b>51</b>   | <b>100</b>    | <b>37</b>   | <b>103</b>    | <b>36</b>   | <b>117</b>    | <b>42</b>   | <b>134</b>    | <b>45</b>   | <b>119</b>    | <b>38</b>   | <b>100</b>    | <b>31</b>   | <b>91</b>     | <b>30</b>   |
| <b>Asian/Pacific Islander</b> | <b>140</b>    | <b>40</b>   | <b>120</b>    | <b>31</b>   | <b>130</b>    | <b>31</b>   | <b>118</b>    | <b>26</b>   | <b>161</b>    | <b>34</b>   | <b>152</b>    | <b>30</b>   | <b>154</b>    | <b>29</b>   | <b>135</b>    | <b>24</b>   | <b>148</b>    | <b>25</b>   | <b>155</b>    | <b>27</b>   |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>866</b>    | <b>29</b>   | <b>872</b>    | <b>29</b>   | <b>816</b>    | <b>27</b>   | <b>717</b>    | <b>24</b>   | <b>758</b>    | <b>25</b>   | <b>702</b>    | <b>23</b>   | <b>666</b>    | <b>22</b>   | <b>662</b>    | <b>20</b>   | <b>548</b>    | <b>18</b>   | <b>531</b>    | <b>19</b>   |
| <b>Hispanic</b>               | <b>218</b>    | <b>25</b>   | <b>201</b>    | <b>22</b>   | <b>222</b>    | <b>22</b>   | <b>234</b>    | <b>22</b>   | <b>240</b>    | <b>21</b>   | <b>231</b>    | <b>19</b>   | <b>221</b>    | <b>17</b>   | <b>238</b>    | <b>18</b>   | <b>260</b>    | <b>18</b>   | <b>220</b>    | <b>17</b>   |
| <b>Black</b>                  | <b>150</b>    | <b>33</b>   | <b>145</b>    | <b>31</b>   | <b>132</b>    | <b>28</b>   | <b>157</b>    | <b>32</b>   | <b>135</b>    | <b>27</b>   | <b>129</b>    | <b>26</b>   | <b>125</b>    | <b>25</b>   | <b>113</b>    | <b>22</b>   | <b>123</b>    | <b>23</b>   | <b>156</b>    | <b>31</b>   |
| <b>Asian/Pacific Islander</b> | <b>119</b>    | <b>23</b>   | <b>116</b>    | <b>21</b>   | <b>120</b>    | <b>20</b>   | <b>147</b>    | <b>23</b>   | <b>139</b>    | <b>20</b>   | <b>132</b>    | <b>18</b>   | <b>151</b>    | <b>19</b>   | <b>162</b>    | <b>19</b>   | <b>142</b>    | <b>16</b>   | <b>141</b>    | <b>16</b>   |
| <b>SPA 1: Antelope Valley</b> | <b>61</b>     | <b>33</b>   | <b>69</b>     | <b>35</b>   | <b>72</b>     | <b>37</b>   | <b>50</b>     | <b>25</b>   | <b>68</b>     | <b>35</b>   | <b>70</b>     | <b>32</b>   | <b>51</b>     | <b>22</b>   | <b>51</b>     | <b>21</b>   | <b>59</b>     | <b>23</b>   | <b>61</b>     | <b>25</b>   |
| <b>SPA 2: San Fernando</b>    | <b>496</b>    | <b>30</b>   | <b>529</b>    | <b>31</b>   | <b>521</b>    | <b>29</b>   | <b>500</b>    | <b>28</b>   | <b>472</b>    | <b>25</b>   | <b>454</b>    | <b>24</b>   | <b>407</b>    | <b>21</b>   | <b>415</b>    | <b>20</b>   | <b>414</b>    | <b>19</b>   | <b>415</b>    | <b>20</b>   |
| <b>SPA 3: San Gabriel</b>     | <b>529</b>    | <b>36</b>   | <b>483</b>    | <b>31</b>   | <b>467</b>    | <b>29</b>   | <b>488</b>    | <b>29</b>   | <b>477</b>    | <b>28</b>   | <b>409</b>    | <b>24</b>   | <b>454</b>    | <b>25</b>   | <b>449</b>    | <b>24</b>   | <b>404</b>    | <b>21</b>   | <b>390</b>    | <b>21</b>   |
| <b>SPA 4: Metro</b>           | <b>335</b>    | <b>35</b>   | <b>344</b>    | <b>34</b>   | <b>350</b>    | <b>34</b>   | <b>293</b>    | <b>28</b>   | <b>319</b>    | <b>29</b>   | <b>302</b>    | <b>28</b>   | <b>294</b>    | <b>25</b>   | <b>255</b>    | <b>21</b>   | <b>256</b>    | <b>21</b>   | <b>229</b>    | <b>23</b>   |
| <b>SPA 5: West</b>            | <b>206</b>    | <b>29</b>   | <b>230</b>    | <b>31</b>   | <b>212</b>    | <b>28</b>   | <b>184</b>    | <b>24</b>   | <b>188</b>    | <b>24</b>   | <b>188</b>    | <b>24</b>   | <b>184</b>    | <b>23</b>   | <b>218</b>    | <b>26</b>   | <b>162</b>    | <b>19</b>   | <b>158</b>    | <b>19</b>   |
| <b>SPA 6: South</b>           | <b>204</b>    | <b>37</b>   | <b>192</b>    | <b>33</b>   | <b>183</b>    | <b>30</b>   | <b>183</b>    | <b>29</b>   | <b>181</b>    | <b>28</b>   | <b>202</b>    | <b>31</b>   | <b>195</b>    | <b>29</b>   | <b>188</b>    | <b>27</b>   | <b>178</b>    | <b>25</b>   | <b>181</b>    | <b>30</b>   |
| <b>SPA 7: East</b>            | <b>259</b>    | <b>29</b>   | <b>262</b>    | <b>27</b>   | <b>253</b>    | <b>25</b>   | <b>262</b>    | <b>25</b>   | <b>2,586</b>  | <b>23</b>   | <b>284</b>    | <b>26</b>   | <b>239</b>    | <b>20</b>   | <b>248</b>    | <b>21</b>   | <b>263</b>    | <b>22</b>   | <b>216</b>    | <b>20</b>   |
| <b>SPA 8: South Bay</b>       | <b>316</b>    | <b>28</b>   | <b>375</b>    | <b>31</b>   | <b>350</b>    | <b>28</b>   | <b>298</b>    | <b>23</b>   | <b>360</b>    | <b>27</b>   | <b>366</b>    | <b>28</b>   | <b>354</b>    | <b>25</b>   | <b>343</b>    | <b>23</b>   | <b>360</b>    | <b>24</b>   | <b>311</b>    | <b>22</b>   |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

# Stroke

8th cause of premature death

2nd cause of death

**STROKE** has been the second-leading cause of death for each of the past 10 years, and it has been the seventh- to ninth-leading cause of premature death. The death rates for blacks were consistently higher than for other race/ethnic groups. Among blacks, the median age at death from stroke was 74 years, compared with 78 for Hispanics, 81 for Asians/Pacific Islanders, and 85 for whites.

## In simple terms . . .

A stroke occurs when the blood supply to part of the brain is suddenly interrupted or when a blood vessel in the brain bursts, spilling blood into the soft tissue and the spaces containing or surrounding brain cells.

When that happens, part of the brain cannot get the blood and oxygen it needs. Without oxygen, nerve cells in the affected part of the brain usually die within minutes and the soft tissue can develop scarring, resulting in the loss of functions controlled by that part of the brain.

## Risk factors

High blood pressure, tobacco smoking, diabetes, high cholesterol, being overweight, excessive alcohol use, age, family history of stroke, prior stroke or heart attack

## Community opportunities for prevention

- Promote access to blood pressure screening and treatment for high blood pressure
- Promote physical activity by providing access to safe places like parks and schools to walk, play, and exercise
- Restrict smoking in public places and worksites to decrease exposure to indoor and outdoor secondhand smoke
- Provide access to smoking cessation programs

## Individual opportunities for prevention

- Work with your health care provider to control blood pressure and manage diabetes
- If you smoke, get help to quit (1-800-NO-BUTTS)
- Maintain a healthy weight
- Make time to be physically active every day with your children, partner, pet, friends, or on your own
- Eat a diet low in fat and salt
- Learn the stroke warning signs

## LOS ANGELES COUNTY

Deaths 3,278  
Death Rate 36 deaths per 100,000 population

Healthy People  
2010 Objective12-7 50 deaths per 100,000 population

ICD-9 codes  
(1979-1998) 430-434, 436-438

ICD-10 codes  
(1999-2010) I60-I69

References **American Stroke Association**  
[www.strokeassociation.org](http://www.strokeassociation.org)  
**National Institute of Neurological Disorders and Stroke**  
[www.ninds.nih.gov/disorders/stroke](http://www.ninds.nih.gov/disorders/stroke)

Referral **Los Angeles County Division of the American Heart Association**  
213-291-7000

Figure T16. Trends in stroke mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>4,259</b>  | <b>56</b>   | <b>4,169</b>  | <b>52</b>   | <b>4,249</b>  | <b>51</b>   | <b>4,121</b>  | <b>49</b>   | <b>3,775</b>  | <b>43</b>   | <b>3,622</b>  | <b>41</b>   | <b>3,323</b>  | <b>36</b>   | <b>3,280</b>  | <b>34</b>   | <b>3,301</b>  | <b>34</b>   | <b>3,278</b>  | <b>36</b>   |
| <b>Males</b>                  | <b>1,691</b>  | <b>56</b>   | <b>1,701</b>  | <b>54</b>   | <b>1,754</b>  | <b>53</b>   | <b>1,718</b>  | <b>51</b>   | <b>1,554</b>  | <b>45</b>   | <b>1,501</b>  | <b>42</b>   | <b>1,409</b>  | <b>37</b>   | <b>1,373</b>  | <b>35</b>   | <b>1,399</b>  | <b>35</b>   | <b>1,405</b>  | <b>38</b>   |
| <b>Females</b>                | <b>2,568</b>  | <b>55</b>   | <b>2,468</b>  | <b>51</b>   | <b>2,495</b>  | <b>49</b>   | <b>2,403</b>  | <b>47</b>   | <b>2,221</b>  | <b>42</b>   | <b>2,121</b>  | <b>40</b>   | <b>1,914</b>  | <b>34</b>   | <b>1,907</b>  | <b>33</b>   | <b>1,902</b>  | <b>32</b>   | <b>1,873</b>  | <b>34</b>   |
| <b>White</b>                  | <b>2,483</b>  | <b>55</b>   | <b>2,382</b>  | <b>51</b>   | <b>2,441</b>  | <b>52</b>   | <b>2,234</b>  | <b>47</b>   | <b>1,962</b>  | <b>41</b>   | <b>1,817</b>  | <b>39</b>   | <b>1,587</b>  | <b>33</b>   | <b>1,552</b>  | <b>31</b>   | <b>1,623</b>  | <b>32</b>   | <b>1,534</b>  | <b>34</b>   |
| <b>Hispanic</b>               | <b>708</b>    | <b>44</b>   | <b>711</b>    | <b>42</b>   | <b>755</b>    | <b>41</b>   | <b>785</b>    | <b>42</b>   | <b>782</b>    | <b>38</b>   | <b>779</b>    | <b>36</b>   | <b>742</b>    | <b>32</b>   | <b>749</b>    | <b>31</b>   | <b>733</b>    | <b>29</b>   | <b>780</b>    | <b>34</b>   |
| <b>Black</b>                  | <b>591</b>    | <b>82</b>   | <b>589</b>    | <b>79</b>   | <b>584</b>    | <b>76</b>   | <b>572</b>    | <b>74</b>   | <b>530</b>    | <b>66</b>   | <b>495</b>    | <b>61</b>   | <b>516</b>    | <b>62</b>   | <b>469</b>    | <b>55</b>   | <b>433</b>    | <b>50</b>   | <b>446</b>    | <b>54</b>   |
| <b>Asian/Pacific Islander</b> | <b>472</b>    | <b>49</b>   | <b>473</b>    | <b>46</b>   | <b>462</b>    | <b>43</b>   | <b>513</b>    | <b>44</b>   | <b>489</b>    | <b>40</b>   | <b>522</b>    | <b>41</b>   | <b>469</b>    | <b>34</b>   | <b>496</b>    | <b>34</b>   | <b>504</b>    | <b>34</b>   | <b>501</b>    | <b>34</b>   |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>923</b>    | <b>54</b>   | <b>932</b>    | <b>53</b>   | <b>918</b>    | <b>51</b>   | <b>881</b>    | <b>48</b>   | <b>770</b>    | <b>42</b>   | <b>704</b>    | <b>39</b>   | <b>645</b>    | <b>34</b>   | <b>603</b>    | <b>31</b>   | <b>668</b>    | <b>33</b>   | <b>629</b>    | <b>35</b>   |
| <b>Hispanic</b>               | <b>322</b>    | <b>48</b>   | <b>326</b>    | <b>48</b>   | <b>342</b>    | <b>44</b>   | <b>364</b>    | <b>47</b>   | <b>360</b>    | <b>43</b>   | <b>356</b>    | <b>38</b>   | <b>338</b>    | <b>33</b>   | <b>343</b>    | <b>32</b>   | <b>325</b>    | <b>29</b>   | <b>346</b>    | <b>35</b>   |
| <b>Black</b>                  | <b>232</b>    | <b>82</b>   | <b>227</b>    | <b>77</b>   | <b>248</b>    | <b>84</b>   | <b>208</b>    | <b>71</b>   | <b>206</b>    | <b>67</b>   | <b>202</b>    | <b>61</b>   | <b>209</b>    | <b>62</b>   | <b>194</b>    | <b>57</b>   | <b>170</b>    | <b>49</b>   | <b>179</b>    | <b>56</b>   |
| <b>Asian/Pacific Islander</b> | <b>212</b>    | <b>51</b>   | <b>209</b>    | <b>48</b>   | <b>242</b>    | <b>82</b>   | <b>260</b>    | <b>53</b>   | <b>216</b>    | <b>42</b>   | <b>235</b>    | <b>43</b>   | <b>211</b>    | <b>35</b>   | <b>223</b>    | <b>37</b>   | <b>235</b>    | <b>38</b>   | <b>243</b>    | <b>40</b>   |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>1,560</b>  | <b>55</b>   | <b>1,450</b>  | <b>50</b>   | <b>1,523</b>  | <b>51</b>   | <b>1,353</b>  | <b>46</b>   | <b>1,192</b>  | <b>40</b>   | <b>1,113</b>  | <b>38</b>   | <b>942</b>    | <b>32</b>   | <b>949</b>    | <b>30</b>   | <b>955</b>    | <b>31</b>   | <b>905</b>    | <b>32</b>   |
| <b>Hispanic</b>               | <b>386</b>    | <b>41</b>   | <b>385</b>    | <b>38</b>   | <b>413</b>    | <b>39</b>   | <b>421</b>    | <b>38</b>   | <b>422</b>    | <b>35</b>   | <b>423</b>    | <b>33</b>   | <b>404</b>    | <b>30</b>   | <b>406</b>    | <b>29</b>   | <b>408</b>    | <b>28</b>   | <b>434</b>    | <b>32</b>   |
| <b>Black</b>                  | <b>359</b>    | <b>80</b>   | <b>362</b>    | <b>78</b>   | <b>336</b>    | <b>69</b>   | <b>364</b>    | <b>75</b>   | <b>324</b>    | <b>65</b>   | <b>293</b>    | <b>59</b>   | <b>307</b>    | <b>60</b>   | <b>275</b>    | <b>53</b>   | <b>263</b>    | <b>49</b>   | <b>267</b>    | <b>53</b>   |
| <b>Asian/Pacific Islander</b> | <b>260</b>    | <b>47</b>   | <b>264</b>    | <b>44</b>   | <b>220</b>    | <b>35</b>   | <b>253</b>    | <b>38</b>   | <b>273</b>    | <b>39</b>   | <b>287</b>    | <b>39</b>   | <b>258</b>    | <b>32</b>   | <b>273</b>    | <b>32</b>   | <b>269</b>    | <b>31</b>   | <b>258</b>    | <b>30</b>   |
| <b>SPA 1: Antelope Valley</b> | <b>110</b>    | <b>58</b>   | <b>106</b>    | <b>52</b>   | <b>131</b>    | <b>65</b>   | <b>125</b>    | <b>61</b>   | <b>124</b>    | <b>60</b>   | <b>125</b>    | <b>56</b>   | <b>110</b>    | <b>45</b>   | <b>120</b>    | <b>48</b>   | <b>94</b>     | <b>37</b>   | <b>114</b>    | <b>45</b>   |
| <b>SPA 2: San Fernando</b>    | <b>866</b>    | <b>52</b>   | <b>840</b>    | <b>48</b>   | <b>898</b>    | <b>50</b>   | <b>905</b>    | <b>50</b>   | <b>734</b>    | <b>40</b>   | <b>758</b>    | <b>40</b>   | <b>623</b>    | <b>32</b>   | <b>628</b>    | <b>30</b>   | <b>690</b>    | <b>32</b>   | <b>661</b>    | <b>32</b>   |
| <b>SPA 3: San Gabriel</b>     | <b>749</b>    | <b>50</b>   | <b>806</b>    | <b>52</b>   | <b>822</b>    | <b>51</b>   | <b>756</b>    | <b>45</b>   | <b>729</b>    | <b>43</b>   | <b>679</b>    | <b>39</b>   | <b>608</b>    | <b>33</b>   | <b>629</b>    | <b>33</b>   | <b>694</b>    | <b>36</b>   | <b>650</b>    | <b>36</b>   |
| <b>SPA 4: Metro</b>           | <b>475</b>    | <b>50</b>   | <b>462</b>    | <b>47</b>   | <b>453</b>    | <b>44</b>   | <b>426</b>    | <b>41</b>   | <b>374</b>    | <b>35</b>   | <b>400</b>    | <b>37</b>   | <b>358</b>    | <b>32</b>   | <b>367</b>    | <b>32</b>   | <b>344</b>    | <b>29</b>   | <b>311</b>    | <b>31</b>   |
| <b>SPA 5: West</b>            | <b>368</b>    | <b>51</b>   | <b>379</b>    | <b>52</b>   | <b>342</b>    | <b>45</b>   | <b>321</b>    | <b>42</b>   | <b>332</b>    | <b>43</b>   | <b>258</b>    | <b>34</b>   | <b>251</b>    | <b>32</b>   | <b>262</b>    | <b>33</b>   | <b>232</b>    | <b>28</b>   | <b>253</b>    | <b>30</b>   |
| <b>SPA 6: South</b>           | <b>434</b>    | <b>76</b>   | <b>403</b>    | <b>67</b>   | <b>401</b>    | <b>65</b>   | <b>407</b>    | <b>65</b>   | <b>376</b>    | <b>58</b>   | <b>349</b>    | <b>52</b>   | <b>377</b>    | <b>55</b>   | <b>355</b>    | <b>51</b>   | <b>323</b>    | <b>46</b>   | <b>307</b>    | <b>48</b>   |
| <b>SPA 7: East</b>            | <b>493</b>    | <b>53</b>   | <b>513</b>    | <b>52</b>   | <b>479</b>    | <b>46</b>   | <b>499</b>    | <b>47</b>   | <b>460</b>    | <b>42</b>   | <b>421</b>    | <b>38</b>   | <b>435</b>    | <b>37</b>   | <b>378</b>    | <b>32</b>   | <b>411</b>    | <b>34</b>   | <b>426</b>    | <b>39</b>   |
| <b>SPA 8: South Bay</b>       | <b>733</b>    | <b>62</b>   | <b>651</b>    | <b>64</b>   | <b>676</b>    | <b>64</b>   | <b>635</b>    | <b>49</b>   | <b>638</b>    | <b>48</b>   | <b>600</b>    | <b>44</b>   | <b>535</b>    | <b>37</b>   | <b>519</b>    | <b>35</b>   | <b>510</b>    | <b>33</b>   | <b>551</b>    | <b>39</b>   |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

**SUICIDE** was the third-leading cause of premature death in 2010, its highest ranking in the past 10 years. Between 2001 and 2007, the number of suicide deaths was declining, but there was a sharp increase in 2008. In 2010, most suicides were among men (80%) and, among men, firearms were the most common method of committing suicide. Among women, suffocation/hanging was the most common method. Since 2009, the number of suicides have exceeded the number of homicides.

### In simple terms . . .

Suicide refers to a person intentionally taking his or her own life.

### Risk factors

Suicidal behavior is complex. Risk factors for suicidal behavior include mental illness such as depression or bipolar disorder, alcohol or drug abuse, previous suicide attempts, family history of suicide, history of being sexually abused, impulsive or aggressive tendencies, and having a firearm in the home.

### Community opportunities for prevention

- Increase public awareness that suicide is preventable
- Educate health care providers and the public to identify and respond to persons at risk for suicide
- Provide access to mental health and substance abuse services
- Use media campaigns to reduce stigma about seeking help for mental health issues and suicide

### Individual opportunities for prevention

- Limit access to lethal means of self-harm, including the stockpiling of prescription medications
- Remove firearms from the home
- If firearms are in the home, store them unloaded and locked with the ammunition locked separately
- Seek help for substance abuse (drug or alcohol) from a healthcare provider, or call the Substance Abuse Prevention and Control helpline: 1-800-564-6600
- Seek mental health counseling for suicidal thoughts, or call the National Suicide Prevention Lifeline: 1-800-273-8255
- Respond to threats of self-harm and do not leave a suicidal person alone

## LOS ANGELES COUNTY

Deaths 792  
Death Rate 8.0 suicides per 100,000 population

Healthy People 2010 Objective18-1 4.8 suicides per 100,000 population

ICD-9 codes (1979-1998) E950-E959

ICD-10 codes (1999-2010) \*U03, X60-X84, Y87.0

References **National Institute of Mental Health**  
[www.nimh.nih.gov](http://www.nimh.nih.gov)  
**U.S. Department of Health and Human Services**  
[www.mentalhealth.gov](http://www.mentalhealth.gov)

Referral **Didi Hirsch Community Mental Health Center Suicide Prevention Center**  
1-877-727-4747  
**National Suicide Prevention Lifeline**  
1-800-273-8255

Figure T17. Trends in suicide mortality

|                               | 2001          |             | 2002          |             | 2003          |             | 2004          |             | 2005          |             | 2006          |             | 2007          |             | 2008          |             | 2009          |             | 2010          |             |
|-------------------------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|---------------|-------------|
|                               | No. of deaths | Death rate* |
| <b>Los Angeles County</b>     | <b>762</b>    | <b>8</b>    | <b>727</b>    | <b>8</b>    | <b>727</b>    | <b>8</b>    | <b>696</b>    | <b>7</b>    | <b>695</b>    | <b>7</b>    | <b>662</b>    | <b>7</b>    | <b>667</b>    | <b>7</b>    | <b>802</b>    | <b>8</b>    | <b>775</b>    | <b>7</b>    | <b>792</b>    | <b>8</b>    |
| <b>Males</b>                  | <b>608</b>    | <b>14</b>   | <b>564</b>    | <b>13</b>   | <b>582</b>    | <b>13</b>   | <b>537</b>    | <b>12</b>   | <b>524</b>    | <b>11</b>   | <b>506</b>    | <b>11</b>   | <b>529</b>    | <b>11</b>   | <b>620</b>    | <b>13</b>   | <b>580</b>    | <b>12</b>   | <b>635</b>    | <b>13</b>   |
| <b>Females</b>                | <b>154</b>    | <b>3</b>    | <b>163</b>    | <b>3</b>    | <b>145</b>    | <b>3</b>    | <b>159</b>    | <b>3</b>    | <b>171</b>    | <b>3</b>    | <b>156</b>    | <b>3</b>    | <b>138</b>    | <b>3</b>    | <b>182</b>    | <b>3</b>    | <b>195</b>    | <b>4</b>    | <b>157</b>    | <b>3</b>    |
| <b>White</b>                  | <b>443</b>    | <b>13</b>   | <b>401</b>    | <b>11</b>   | <b>442</b>    | <b>12</b>   | <b>379</b>    | <b>11</b>   | <b>388</b>    | <b>11</b>   | <b>367</b>    | <b>10</b>   | <b>374</b>    | <b>10</b>   | <b>478</b>    | <b>13</b>   | <b>449</b>    | <b>12</b>   | <b>420</b>    | <b>13</b>   |
| <b>Hispanic</b>               | <b>188</b>    | <b>5</b>    | <b>171</b>    | <b>4</b>    | <b>163</b>    | <b>4</b>    | <b>182</b>    | <b>4</b>    | <b>172</b>    | <b>4</b>    | <b>165</b>    | <b>4</b>    | <b>161</b>    | <b>4</b>    | <b>160</b>    | <b>4</b>    | <b>173</b>    | <b>4</b>    | <b>203</b>    | <b>4</b>    |
| <b>Black</b>                  | <b>51</b>     | <b>5</b>    | <b>72</b>     | <b>8</b>    | <b>55</b>     | <b>6</b>    | <b>42</b>     | <b>4</b>    | <b>50</b>     | <b>5</b>    | <b>47</b>     | <b>5</b>    | <b>48</b>     | <b>5</b>    | <b>65</b>     | <b>7</b>    | <b>47</b>     | <b>5</b>    | <b>56</b>     | <b>6</b>    |
| <b>Asian/Pacific Islander</b> | <b>78</b>     | <b>6</b>    | <b>81</b>     | <b>6</b>    | <b>65</b>     | <b>5</b>    | <b>92</b>     | <b>7</b>    | <b>81</b>     | <b>6</b>    | <b>82</b>     | <b>6</b>    | <b>80</b>     | <b>6</b>    | <b>93</b>     | <b>6</b>    | <b>101</b>    | <b>6</b>    | <b>107</b>    | <b>7</b>    |
| <b>Males</b>                  |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>350</b>    | <b>20</b>   | <b>297</b>    | <b>17</b>   | <b>342</b>    | <b>20</b>   | <b>284</b>    | <b>16</b>   | <b>286</b>    | <b>16</b>   | <b>279</b>    | <b>16</b>   | <b>297</b>    | <b>17</b>   | <b>363</b>    | <b>20</b>   | <b>329</b>    | <b>18</b>   | <b>324</b>    | <b>19</b>   |
| <b>Hispanic</b>               | <b>161</b>    | <b>9</b>    | <b>151</b>    | <b>8</b>    | <b>148</b>    | <b>8</b>    | <b>154</b>    | <b>8</b>    | <b>146</b>    | <b>6</b>    | <b>133</b>    | <b>6</b>    | <b>137</b>    | <b>7</b>    | <b>132</b>    | <b>6</b>    | <b>142</b>    | <b>6</b>    | <b>181</b>    | <b>8</b>    |
| <b>Black</b>                  | <b>40</b>     | <b>9</b>    | <b>55</b>     | <b>14</b>   | <b>45</b>     | <b>11</b>   | <b>32</b>     | <b>8</b>    | <b>37</b>     | <b>9</b>    | <b>40</b>     | <b>10</b>   | <b>38</b>     | <b>9</b>    | <b>52</b>     | <b>12</b>   | <b>33</b>     | <b>8</b>    | <b>46</b>     | <b>11</b>   |
| <b>Asian/Pacific Islander</b> | <b>56</b>     | <b>10</b>   | <b>59</b>     | <b>10</b>   | <b>45</b>     | <b>7</b>    | <b>67</b>     | <b>10</b>   | <b>54</b>     | <b>8</b>    | <b>54</b>     | <b>8</b>    | <b>54</b>     | <b>8</b>    | <b>70</b>     | <b>10</b>   | <b>73</b>     | <b>10</b>   | <b>81</b>     | <b>12</b>   |
| <b>Females</b>                |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |               |             |
| <b>White</b>                  | <b>93</b>     | <b>5</b>    | <b>104</b>    | <b>6</b>    | <b>100</b>    | <b>6</b>    | <b>95</b>     | <b>5</b>    | <b>102</b>    | <b>6</b>    | <b>88</b>     | <b>5</b>    | <b>77</b>     | <b>4</b>    | <b>115</b>    | <b>6</b>    | <b>120</b>    | <b>7</b>    | <b>96</b>     | <b>6</b>    |
| <b>Hispanic</b>               | <b>27</b>     | <b>1</b>    | <b>20</b>     | <b>1</b>    | <b>15</b>     | --          | <b>28</b>     | <b>1</b>    | <b>29</b>     | <b>1</b>    | <b>32</b>     | <b>1</b>    | <b>24</b>     | <b>1</b>    | <b>28</b>     | <b>1</b>    | <b>31</b>     | <b>1</b>    | <b>22</b>     | <b>1</b>    |
| <b>Black</b>                  | <b>11</b>     | --          | <b>17</b>     | --          | <b>10</b>     | --          | <b>10</b>     | --          | <b>13</b>     | --          | <b>7</b>      | --          | <b>10</b>     | --          | <b>13</b>     | --          | <b>14</b>     | --          | <b>10</b>     | --          |
| <b>Asian/Pacific Islander</b> | <b>22</b>     | <b>3</b>    | <b>22</b>     | <b>3</b>    | <b>20</b>     | <b>3</b>    | <b>25</b>     | <b>3</b>    | <b>27</b>     | <b>4</b>    | <b>28</b>     | <b>4</b>    | <b>26</b>     | <b>3</b>    | <b>23</b>     | <b>3</b>    | <b>28</b>     | <b>3</b>    | <b>26</b>     | <b>3</b>    |
| <b>SPA 1: Antelope Valley</b> | <b>32</b>     | <b>12</b>   | <b>37</b>     | <b>14</b>   | <b>37</b>     | <b>13</b>   | <b>35</b>     | <b>11</b>   | <b>34</b>     | <b>12</b>   | <b>37</b>     | <b>11</b>   | <b>27</b>     | <b>8</b>    | <b>48</b>     | <b>14</b>   | <b>29</b>     | <b>9</b>    | <b>53</b>     | <b>15</b>   |
| <b>SPA 2: San Fernando</b>    | <b>177</b>    | <b>9</b>    | <b>148</b>    | <b>7</b>    | <b>162</b>    | <b>8</b>    | <b>159</b>    | <b>8</b>    | <b>154</b>    | <b>7</b>    | <b>145</b>    | <b>7</b>    | <b>168</b>    | <b>8</b>    | <b>193</b>    | <b>9</b>    | <b>192</b>    | <b>8</b>    | <b>169</b>    | <b>8</b>    |
| <b>SPA 3: San Gabriel</b>     | <b>131</b>    | <b>8</b>    | <b>125</b>    | <b>7</b>    | <b>110</b>    | <b>6</b>    | <b>118</b>    | <b>7</b>    | <b>122</b>    | <b>7</b>    | <b>118</b>    | <b>6</b>    | <b>106</b>    | <b>6</b>    | <b>101</b>    | <b>5</b>    | <b>128</b>    | <b>7</b>    | <b>132</b>    | <b>7</b>    |
| <b>SPA 4: Metro</b>           | <b>98</b>     | <b>8</b>    | <b>97</b>     | <b>9</b>    | <b>97</b>     | <b>8</b>    | <b>78</b>     | <b>7</b>    | <b>89</b>     | <b>7</b>    | <b>81</b>     | <b>6</b>    | <b>88</b>     | <b>7</b>    | <b>99</b>     | <b>8</b>    | <b>101</b>    | <b>8</b>    | <b>113</b>    | <b>10</b>   |
| <b>SPA 5: West</b>            | <b>54</b>     | <b>8</b>    | <b>61</b>     | <b>9</b>    | <b>65</b>     | <b>10</b>   | <b>59</b>     | <b>8</b>    | <b>70</b>     | <b>10</b>   | <b>56</b>     | <b>8</b>    | <b>53</b>     | <b>7</b>    | <b>82</b>     | <b>11</b>   | <b>79</b>     | <b>11</b>   | <b>53</b>     | <b>8</b>    |
| <b>SPA 6: South</b>           | <b>44</b>     | <b>5</b>    | <b>44</b>     | <b>5</b>    | <b>41</b>     | <b>4</b>    | <b>46</b>     | <b>5</b>    | <b>33</b>     | <b>3</b>    | <b>46</b>     | <b>5</b>    | <b>38</b>     | <b>4</b>    | <b>48</b>     | <b>5</b>    | <b>33</b>     | <b>3</b>    | <b>45</b>     | <b>4</b>    |
| <b>SPA 7: East</b>            | <b>82</b>     | <b>7</b>    | <b>70</b>     | <b>6</b>    | <b>80</b>     | <b>6</b>    | <b>67</b>     | <b>5</b>    | <b>67</b>     | <b>5</b>    | <b>57</b>     | <b>4</b>    | <b>65</b>     | <b>5</b>    | <b>72</b>     | <b>6</b>    | <b>93</b>     | <b>7</b>    | <b>65</b>     | <b>5</b>    |
| <b>SPA 8: South Bay</b>       | <b>134</b>    | <b>9</b>    | <b>131</b>    | <b>9</b>    | <b>114</b>    | <b>8</b>    | <b>112</b>    | <b>7</b>    | <b>113</b>    | <b>7</b>    | <b>105</b>    | <b>7</b>    | <b>105</b>    | <b>7</b>    | <b>143</b>    | <b>9</b>    | <b>109</b>    | <b>7</b>    | <b>147</b>    | <b>10</b>   |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

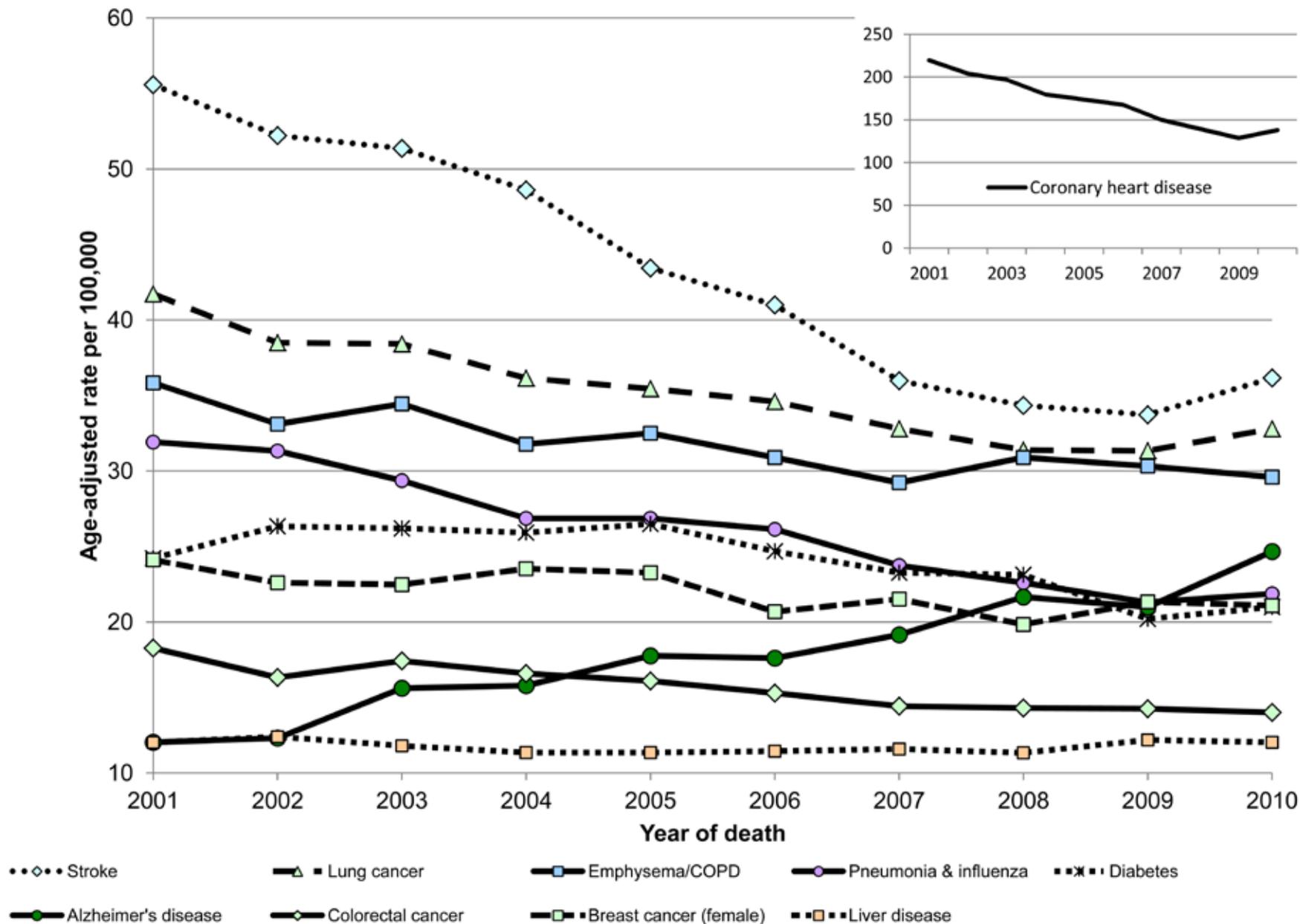
--Number of deaths is too small to calculate a reliable rate.

Figure T18. Trends in mortality from all causes of death

|                               | 2001          |              | 2002          |              | 2003          |              | 2004          |              | 2005          |              | 2006          |              | 2007          |              | 2008          |              | 2009          |              | 2010          |              |
|-------------------------------|---------------|--------------|---------------|--------------|---------------|--------------|---------------|--------------|---------------|--------------|---------------|--------------|---------------|--------------|---------------|--------------|---------------|--------------|---------------|--------------|
|                               | No. of deaths | Death rate*  |
| <b>Los Angeles County</b>     | <b>59,774</b> | <b>756</b>   | <b>59,586</b> | <b>726</b>   | <b>61,026</b> | <b>721</b>   | <b>59,153</b> | <b>682</b>   | <b>60,145</b> | <b>679</b>   | <b>59,461</b> | <b>661</b>   | <b>58,316</b> | <b>624</b>   | <b>58,043</b> | <b>601</b>   | <b>57,620</b> | <b>583</b>   | <b>56,538</b> | <b>615</b>   |
| <b>Males</b>                  | <b>29,968</b> | <b>908</b>   | <b>29,968</b> | <b>871</b>   | <b>30,907</b> | <b>867</b>   | <b>29,839</b> | <b>818</b>   | <b>30,308</b> | <b>812</b>   | <b>30,035</b> | <b>793</b>   | <b>29,630</b> | <b>753</b>   | <b>29,402</b> | <b>722</b>   | <b>29,342</b> | <b>703</b>   | <b>28,772</b> | <b>739</b>   |
| <b>Females</b>                | <b>29,806</b> | <b>637</b>   | <b>29,618</b> | <b>610</b>   | <b>30,119</b> | <b>599</b>   | <b>29,314</b> | <b>575</b>   | <b>29,837</b> | <b>572</b>   | <b>29,426</b> | <b>556</b>   | <b>28,686</b> | <b>522</b>   | <b>28,641</b> | <b>504</b>   | <b>28,278</b> | <b>488</b>   | <b>27,766</b> | <b>517</b>   |
| <b>White</b>                  | <b>34,189</b> | <b>801</b>   | <b>33,672</b> | <b>773</b>   | <b>34,105</b> | <b>772</b>   | <b>32,324</b> | <b>727</b>   | <b>32,101</b> | <b>716</b>   | <b>31,376</b> | <b>705</b>   | <b>30,593</b> | <b>673</b>   | <b>30,149</b> | <b>643</b>   | <b>29,622</b> | <b>621</b>   | <b>28,738</b> | <b>667</b>   |
| <b>Hispanic</b>               | <b>11,879</b> | <b>622</b>   | <b>11,969</b> | <b>588</b>   | <b>12,803</b> | <b>594</b>   | <b>12,632</b> | <b>561</b>   | <b>13,574</b> | <b>573</b>   | <b>13,783</b> | <b>556</b>   | <b>13,429</b> | <b>506</b>   | <b>13,591</b> | <b>500</b>   | <b>13,671</b> | <b>493</b>   | <b>13,751</b> | <b>529</b>   |
| <b>Black</b>                  | <b>8,447</b>  | <b>1,101</b> | <b>8,482</b>  | <b>1,076</b> | <b>8,517</b>  | <b>1,059</b> | <b>8,372</b>  | <b>1,024</b> | <b>8,413</b>  | <b>1,016</b> | <b>8,185</b>  | <b>985</b>   | <b>8,023</b>  | <b>940</b>   | <b>7,697</b>  | <b>879</b>   | <b>7,825</b>  | <b>874</b>   | <b>7,438</b>  | <b>891</b>   |
| <b>Asian/Pacific Islander</b> | <b>5,085</b>  | <b>211</b>   | <b>5,255</b>  | <b>496</b>   | <b>5,352</b>  | <b>476</b>   | <b>5,591</b>  | <b>473</b>   | <b>5,820</b>  | <b>468</b>   | <b>5,884</b>  | <b>454</b>   | <b>6,088</b>  | <b>440</b>   | <b>6,354</b>  | <b>438</b>   | <b>6,267</b>  | <b>419</b>   | <b>6,343</b>  | <b>429</b>   |
| <b>Males</b>                  |               |              |               |              |               |              |               |              |               |              |               |              |               |              |               |              |               |              |               |              |
| <b>White</b>                  | <b>16,360</b> | <b>946</b>   | <b>16,171</b> | <b>912</b>   | <b>16,454</b> | <b>911</b>   | <b>15,615</b> | <b>856</b>   | <b>15,336</b> | <b>836</b>   | <b>15,182</b> | <b>831</b>   | <b>14,872</b> | <b>797</b>   | <b>14,768</b> | <b>764</b>   | <b>14,553</b> | <b>735</b>   | <b>14,184</b> | <b>783</b>   |
| <b>Hispanic</b>               | <b>6,446</b>  | <b>758</b>   | <b>6,596</b>  | <b>723</b>   | <b>7,100</b>  | <b>731</b>   | <b>6,950</b>  | <b>691</b>   | <b>7,517</b>  | <b>712</b>   | <b>7,440</b>  | <b>673</b>   | <b>7,370</b>  | <b>617</b>   | <b>7,316</b>  | <b>601</b>   | <b>7,433</b>  | <b>604</b>   | <b>7,448</b>  | <b>644</b>   |
| <b>Black</b>                  | <b>4,356</b>  | <b>1,402</b> | <b>4,338</b>  | <b>1,345</b> | <b>4,365</b>  | <b>1,322</b> | <b>4,224</b>  | <b>1,267</b> | <b>4,321</b>  | <b>1,274</b> | <b>4,181</b>  | <b>1,238</b> | <b>4,078</b>  | <b>1,172</b> | <b>3,871</b>  | <b>1,087</b> | <b>3,961</b>  | <b>1,083</b> | <b>3,704</b>  | <b>1,087</b> |
| <b>Asian/Pacific Islander</b> | <b>2,714</b>  | <b>625</b>   | <b>2,744</b>  | <b>594</b>   | <b>2,846</b>  | <b>580</b>   | <b>2,919</b>  | <b>570</b>   | <b>3,012</b>  | <b>563</b>   | <b>3,106</b>  | <b>558</b>   | <b>3,205</b>  | <b>542</b>   | <b>3,301</b>  | <b>538</b>   | <b>3,276</b>  | <b>518</b>   | <b>3,277</b>  | <b>532</b>   |
| <b>Females</b>                |               |              |               |              |               |              |               |              |               |              |               |              |               |              |               |              |               |              |               |              |
| <b>White</b>                  | <b>17,829</b> | <b>684</b>   | <b>17,501</b> | <b>661</b>   | <b>17,651</b> | <b>656</b>   | <b>16,709</b> | <b>621</b>   | <b>16,765</b> | <b>617</b>   | <b>16,194</b> | <b>601</b>   | <b>15,721</b> | <b>572</b>   | <b>15,381</b> | <b>542</b>   | <b>15,069</b> | <b>526</b>   | <b>14,554</b> | <b>568</b>   |
| <b>Hispanic</b>               | <b>5,433</b>  | <b>521</b>   | <b>5,373</b>  | <b>486</b>   | <b>5,703</b>  | <b>487</b>   | <b>5,682</b>  | <b>462</b>   | <b>6,057</b>  | <b>482</b>   | <b>6,343</b>  | <b>466</b>   | <b>6,059</b>  | <b>416</b>   | <b>6,275</b>  | <b>419</b>   | <b>6,238</b>  | <b>408</b>   | <b>6,303</b>  | <b>440</b>   |
| <b>Black</b>                  | <b>4,091</b>  | <b>893</b>   | <b>4,144</b>  | <b>882</b>   | <b>4,152</b>  | <b>863</b>   | <b>4,148</b>  | <b>848</b>   | <b>4,092</b>  | <b>466</b>   | <b>4,004</b>  | <b>802</b>   | <b>3,945</b>  | <b>771</b>   | <b>3,826</b>  | <b>730</b>   | <b>3,864</b>  | <b>721</b>   | <b>3,734</b>  | <b>748</b>   |
| <b>Asian/Pacific Islander</b> | <b>2,371</b>  | <b>424</b>   | <b>2,511</b>  | <b>420</b>   | <b>2,506</b>  | <b>395</b>   | <b>2,672</b>  | <b>398</b>   | <b>2,808</b>  | <b>826</b>   | <b>2,778</b>  | <b>376</b>   | <b>2,883</b>  | <b>361</b>   | <b>3,053</b>  | <b>361</b>   | <b>2,991</b>  | <b>344</b>   | <b>3,066</b>  | <b>354</b>   |
| SPA 1: Antelope Valley        | 1,862         | 884          | 1,961         | 894          | 2,075         | 921          | 1,972         | 870          | 2,137         | 917          | 2,125         | 868          | 2,109         | 808          | 2,165         | 803          | 2,230         | 815          | 2,214         | 799          |
| SPA 2: San Fernando           | 12,182        | 710          | 12,229        | 688          | 12,670        | 698          | 12,435        | 670          | 12,591        | 664          | 12,345        | 643          | 12,018        | 603          | 12,259        | 585          | 12,132        | 559          | 12,032        | 577          |
| SPA 3: San Gabriel            | 10,828        | 713          | 10,827        | 685          | 10,895        | 664          | 10,582        | 627          | 11,074        | 641          | 10,736        | 612          | 10,569        | 577          | 10,616        | 563          | 10,636        | 553          | 10,457        | 580          |
| SPA 4: Metro                  | 6,864         | 713          | 6,726         | 671          | 6,866         | 665          | 6,516         | 618          | 6,687         | 618          | 6,540         | 593          | 6,340         | 554          | 6,210         | 527          | 6,032         | 505          | 5,982         | 585          |
| SPA 5: West                   | 4,192         | 607          | 4,287         | 605          | 4,290         | 596          | 4,098         | 560          | 4,132         | 558          | 4,039         | 547          | 4,026         | 533          | 4,112         | 521          | 3,967         | 487          | 3,943         | 497          |
| SPA 6: South                  | 6,130         | 987          | 6,174         | 956          | 6,063         | 915          | 6,058         | 890          | 6,019         | 865          | 5,853         | 831          | 5,731         | 794          | 5,614         | 760          | 5,638         | 754          | 5,234         | 762          |
| SPA 7: East                   | 7,386         | 763          | 7,273         | 719          | 7,428         | 701          | 7,240         | 662          | 7,359         | 658          | 7,370         | 647          | 7,153         | 605          | 7,130         | 593          | 7,184         | 590          | 6,914         | 622          |
| SPA 8: South Bay              | 9,786         | 797          | 9,759         | 769          | 9,992         | 763          | 9,453         | 702          | 9,796         | 711          | 9,739         | 696          | 9,629         | 661          | 9,415         | 624          | 9,455         | 611          | 9,402         | 655          |

\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

**Figure T19.** Trends in death rates from the leading causes of death



\*Age-adjusted rate per 100,000. Population estimates were revised; therefore, death rates for 2001-2004 may differ from those previously published. The 2009 population was overestimated; therefore, death rates for 2009 were underestimated. Rate changes from 2009 to 2010 should be interpreted with caution. See Note on Page 6 for additional information.

Appendix 1. Sample California Certificate of Death

CERTIFICATE OF DEATH

USE BLACK INK ONLY / NO ERASERS, WHITEOUTS OR ALTERATIONS

LOCAL REGISTRATION NUMBER

| STATE REGISTAR   |   |  |   |   | FAX AUTH. # |   | CENSUS TRACT |                             |
|--|---|--|---|---|-------------|---|--------------|-----------------------------|
| A  | B | C  | D   | E   |             |   |              |                             |
| <b>DECEDENT'S PERSONAL DATA</b>  |   |  |   |   |             |   |              |                             |
| 1. NAME OF DECEDENT --- FIRST (Given)  |   | 2. MIDDLE  |   | 3. LAST (Family)  |             | 4. DATE OF BIRTH mm/dd/yyyy   |              |                             |
| 9. BIRTH STATE/FOREIGN COUNTRY   |   | 10. SOCIAL SECURITY NUMBER   |   | 11. EVER IN U.S. ARMED FORCES?<br>YES <input type="checkbox"/> NO <input type="checkbox"/> UNK <input type="checkbox"/> |             | 12. MARITAL STATUS (at Time of Death)   |              | 7. DATE OF DEATH mm/dd/yyyy |
| 13. EDUCATION --- Highest Level/Degree (see worksheet on back)   |   | 14/15. WAS DECEDENT HISPANIC/LATINO(A)/SPANISH? (If yes, see worksheet on back.)<br>YES <input type="checkbox"/> NO <input type="checkbox"/> |   | 16. DECEDENT'S RACE ... Up to 3 races may be listed (see worksheet on back)   |             | 17. USUAL OCCUPATION ... Type of work for most of life. DO NOT USE RETIRED  |              | 8 HOUR (24 hours)           |
| 20. DECEDENT'S RESIDENCE (Street and number or location)   |   |  |   |   |             |   |              |                             |
| 21. CITY   |   | 22. COUNTY/PROVINCE  |   | 23. ZIP CODE  |             | 24. YEARS IN COUNTRY  |              | 25. STATE/FOREIGN COUNTRY   |
| 26. INFORMANT'S NAME, RELATIONSHIP   |   |  |   |   |             |   |              |                             |
| 27. INFORMANT'S MAILING ADDRESS (Street and number or rural route number, city or town, state, ZIP)  |   |  |   |   |             |   |              |                             |
| 28. NAME OF SURVIVING SPOUSE ... FIRST   |   |  | 29. MIDDLE  |   |             | 30. LAST (Maiden Name)  |              |                             |
| 31. NAME OF FATHER ... FIRST   |   |  | 32. MIDDLE  |   |             | 33. LAST  |              |                             |
| 35. NAME OF MOTHER ... FIRST   |   |  | 36. MIDDLE  |   |             | 37. LAST (Maiden)   |              |                             |
| 39. DISPOSITION DATE mm/dd/yyyy  |   |  | 40. PLACE OF FINAL DISPOSITION  |   |             | 43. LICENSE NUMBER  |              |                             |
| <b>FUNERAL DIRECTOR/ LOCAL REGISTRAR</b>   |   |  |   |   |             |   |              |                             |
| 41. TYPE OF DISPOSITION(S)   |   |  | 42. SIGNATURE OF FUNERAL DIRECTOR   |   |             | 44. LICENSE NUMBER  |              |                             |
| 44. NAME OF FUNERAL ESTABLISHMENT  |   |  | 45. LICENSE NUMBER  |   |             | 46. SIGNATURE OF LOCAL REGISTRAR  |              |                             |
| 101. PLACE OF DEATH  |   |  |   |   |             |   |              |                             |
| 104. COUNTY  |   |  | 105. FACILITY ADDRESS OR LOCATION WHERE FOUND (Street and number or location)   |   |             | 102. IF HOSPITAL, SPECIFY ONE<br><input type="checkbox"/> IP <input type="checkbox"/> ER/OP <input type="checkbox"/> DOA <input type="checkbox"/> Hospice <input type="checkbox"/> Home/LTC <input type="checkbox"/> Nursing Home <input type="checkbox"/> Decedent's Home <input type="checkbox"/> Other |              |                             |
| <b>PLACE OF DEATH</b>  |   |  |   |   |             |   |              |                             |
| 107. CAUSE OF DEATH  |   |  | 108. DEATH REPORTED TO CORONER?<br>YES <input type="checkbox"/> NO <input type="checkbox"/>                                     |   |             | Time Interval Between Onset and Death (A) <input type="checkbox"/> (B) <input type="checkbox"/> (C) <input type="checkbox"/> (D) <input type="checkbox"/>   |              |                             |
| IMMEDIATE CAUSE (A)<br>(Final disease or condition resulting in death)   |   |  | (B)   |   |             | 109. BIOPSY PERFORMED?<br>YES <input type="checkbox"/> NO <input type="checkbox"/>  |              |                             |
| Sequentially, list conditions, if any, leading to the final cause of death. Enter underlying CAUSE (disease or injury that initiated the events resulting in death) LAST   |   |  | (C)   |   |             | 110. AUTOPSY PERFORMED?<br>YES <input type="checkbox"/> NO <input type="checkbox"/>   |              |                             |
| 112. OTHER SIGNIFICANT CONDITIONS CONTRIBUTING TO DEATH BUT NOT RESULTING IN THE UNDERLYING CAUSE GIVEN IN 107   |   |  | (D)   |   |             | 111. USED IN DETERMINING CAUSE?<br>YES <input type="checkbox"/> NO <input type="checkbox"/>   |              |                             |
| <b>CAUSE OF DEATH</b>  |   |  |   |   |             |   |              |                             |
| 113. WAS OPERATION PERFORMED FOR ANY CONDITION IN ITEM 107 OR 112? (If yes, list type of operation and date.)  |   |  | 113A. IF FEMALE PREGNANT IN LAST YEAR?<br>YES <input type="checkbox"/> NO <input type="checkbox"/> UNK <input type="checkbox"/> |   |             | 117. DATE mm/dd/yyyy  |              |                             |
| <b>PHYSICIAN'S CERTIFICATION</b>   |   |  |   |   |             |   |              |                             |
| 114. I CERTIFY THAT TO THE BEST OF MY KNOWLEDGE DEATH OCCURRED AT THE HOUR, DATE, AND PLACE STATED FROM THE CAUSES STATED. Decedent Attended Since   |   |  | 115. SIGNATURE AND TITLE OF CERTIFIER   |   |             | 116. LICENSE NUMBER   |              | 117. DATE mm/dd/yyyy        |
| (A) mm/dd/yyyy   |   |  | (B) mm/dd/yyyy  |   |             | 118. TYPE ATTENDING PHYSICIAN'S NAME, MAILING ADDRESS, ZIP CODE   |              |                             |
| <b>PHYSICIAN'S CERTIFICATION</b>   |   |  |   |   |             |   |              |                             |
| 119. I CERTIFY THAT IN MY OPINION DEATH OCCURRED AT THE HOUR, DATE, AND PLACE STATED FROM THE CAUSES STATED.   |   |  | 120. INJURED AT WORK?<br>YES <input type="checkbox"/> NO <input type="checkbox"/> UNK <input type="checkbox"/>                  |   |             | 121. INJURY DATE mm/dd/yyyy   |              | 122. HOUR (24 hours)        |
| MANNER OF DEATH: <input type="checkbox"/> Natural <input type="checkbox"/> Accident <input type="checkbox"/> Homicide <input type="checkbox"/> Suicide <input type="checkbox"/> Pending investigation <input type="checkbox"/> Could not be determined |   |  | 123. PLACE OF INJURY (e.g., home, construction site, wooded area, etc.)   |   |             | 124. DESCRIBE HOW INJURY OCCURRED (Events which resulted in injury)   |              |                             |
| <b>CORONER'S USE ONLY</b>  |   |  |   |   |             |   |              |                             |
| 125. LOCATION OF INJURY (Street and number, or location, and city, and ZIP)  |   |  | 127. DATE mm/dd/yyyy  |   |             | 128. TYPE NAME, TITLE OF CORONER / DEPUTY CORONER   |              |                             |
| 128. SIGNATURE OF CORONER / DEPUTY CORONER   |   |  |   |   |             |   |              |                             |

Appendix 2. Los Angeles County population estimates and United States standard population

**Los Angeles County population estimates, 2010**

|                               | Age Group (years) |                |                  |                  |                  |                  |                  |                  |                |                |                |                  |
|-------------------------------|-------------------|----------------|------------------|------------------|------------------|------------------|------------------|------------------|----------------|----------------|----------------|------------------|
|                               | Less than 1       | 1-4            | 5-14             | 15-24            | 25-34            | 35-44            | 45-54            | 55-64            | 65-74          | 75-84          | 85+            | All ages         |
| <b>Males</b>                  |                   |                |                  |                  |                  |                  |                  |                  |                |                |                |                  |
| White                         | 12,690            | 49,713         | 127,929          | 169,626          | 202,971          | 203,896          | 242,797          | 205,194          | 117,477        | 72,620         | 30,509         | 1,435,422        |
| Hispanic                      | 41,496            | 167,855        | 415,059          | 437,563          | 389,102          | 358,750          | 268,565          | 152,452          | 70,330         | 34,232         | 9,929          | 2,345,333        |
| Black                         | 5,150             | 20,550         | 56,186           | 66,188           | 51,433           | 53,178           | 62,543           | 43,238           | 24,533         | 11,813         | 3,544          | 398,356          |
| Asian/Pacific Islander        | 83                | 372            | 974              | 1,322            | 1,232            | 1,417            | 1,670            | 1,162            | 674            | 303            | 79             | 9,288            |
| American Indian/Alaska Native | 6,489             | 26,182         | 71,287           | 96,503           | 102,558          | 96,999           | 98,065           | 79,862           | 44,598         | 24,277         | 8,652          | 655,472          |
| <b>All races</b>              | <b>65,908</b>     | <b>264,672</b> | <b>671,435</b>   | <b>771,202</b>   | <b>747,296</b>   | <b>714,240</b>   | <b>673,640</b>   | <b>481,908</b>   | <b>257,612</b> | <b>143,245</b> | <b>52,713</b>  | <b>4,843,871</b> |
| <b>Females</b>                |                   |                |                  |                  |                  |                  |                  |                  |                |                |                |                  |
| White                         | 11,820            | 46,907         | 120,589          | 164,751          | 187,470          | 186,512          | 225,539          | 203,179          | 129,103        | 95,661         | 56,905         | 1,428,436        |
| Hispanic                      | 39,652            | 161,066        | 398,917          | 409,621          | 368,263          | 350,856          | 277,631          | 176,177          | 92,932         | 52,848         | 19,014         | 2,346,977        |
| Black                         | 5,066             | 19,818         | 54,209           | 68,120           | 58,862           | 62,440           | 71,703           | 52,858           | 32,969         | 18,826         | 8,522          | 453,393          |
| Asian/Pacific Islander        | 6,071             | 24,959         | 67,661           | 92,941           | 113,820          | 116,079          | 120,037          | 98,402           | 55,414         | 34,822         | 14,350         | 744,556          |
| American Indian/Alaska Native | 97                | 345            | 963              | 1,290            | 1,290            | 1,428            | 1,746            | 1,433            | 716            | 363            | 166            | 9,837            |
| <b>All races</b>              | <b>62,706</b>     | <b>253,095</b> | <b>642,339</b>   | <b>736,723</b>   | <b>729,705</b>   | <b>717,315</b>   | <b>696,656</b>   | <b>532,049</b>   | <b>311,134</b> | <b>202,520</b> | <b>98,957</b>  | <b>4,983,199</b> |
| <b>Los Angeles County</b>     |                   |                |                  |                  |                  |                  |                  |                  |                |                |                |                  |
| White                         | 24,510            | 96,620         | 248,518          | 334,377          | 390,441          | 390,408          | 468,336          | 408,373          | 246,580        | 168,281        | 87,414         | 2,863,858        |
| Hispanic                      | 81,148            | 328,921        | 813,976          | 847,184          | 757,365          | 709,606          | 546,196          | 328,629          | 163,262        | 87,080         | 28,943         | 4,692,310        |
| Black                         | 10,216            | 40,368         | 110,395          | 134,308          | 110,295          | 115,618          | 134,246          | 96,096           | 57,502         | 30,639         | 12,066         | 851,749          |
| Asian/Pacific Islander        | 12,560            | 51,141         | 138,948          | 189,444          | 216,378          | 213,078          | 218,102          | 178,264          | 100,012        | 59,099         | 23,002         | 1,400,028        |
| American Indian/Alaska Native | 180               | 717            | 1,937            | 2,612            | 2,522            | 2,845            | 3,416            | 2,595            | 1,390          | 666            | 245            | 19,125           |
| <b>All races</b>              | <b>128,614</b>    | <b>517,767</b> | <b>1,313,774</b> | <b>1,507,925</b> | <b>1,477,001</b> | <b>1,431,555</b> | <b>1,370,296</b> | <b>1,013,957</b> | <b>568,746</b> | <b>345,765</b> | <b>151,670</b> | <b>9,827,070</b> |

Notes: July 1, 2010 population estimates by Walter R. McDonald & Associates, Inc., released September 30, 2012. See Note on Page 6 for additional information about population estimates.

**United States standard population, 2000<sup>6</sup>**

|                      | Age Group (years) |                   |                   |                   |                   |                   |                   |                   |                   |                   |                  |                    |
|----------------------|-------------------|-------------------|-------------------|-------------------|-------------------|-------------------|-------------------|-------------------|-------------------|-------------------|------------------|--------------------|
|                      | Less than 1       | 1-4               | 5-14              | 15-24             | 25-34             | 35-44             | 45-54             | 55-64             | 65-74             | 75-84             | 85+              | All ages           |
| <b>United States</b> |                   |                   |                   |                   |                   |                   |                   |                   |                   |                   |                  |                    |
| <b>All races</b>     | <b>3,794,901</b>  | <b>15,191,619</b> | <b>39,976,619</b> | <b>38,076,743</b> | <b>37,233,437</b> | <b>44,659,185</b> | <b>37,030,152</b> | <b>23,961,506</b> | <b>18,135,514</b> | <b>12,314,793</b> | <b>4,259,173</b> | <b>274,633,642</b> |

<sup>6</sup>Hoyert DL, Heron MP, Murphy SL, Kung H. Deaths: Final data for 2003. National vital statistics reports; vol 54 no 13. Hyattsville, MD: National Center for Health Statistics. 2006.

### Appendix 3. Service Planning Areas (SPA) Boundaries

- SPA-1 Antelope Valley
- SPA-2 San Fernando
- SPA-3 San Gabriel
- SPA-4 Metro
- SPA-5 West
- SPA-6 South
- SPA-7 East
- SPA-8 South Bay (Includes Catalina Island)



Appendix 4. Incorporated cities in Los Angeles County, by service planning area (SPA)

| <b>SPA 1</b><br><b>Antelope Valley</b><br>Pop. 384,843 | <b>SPA 2</b><br><b>San Fernando</b><br>Pop. 2,125,778 | <b>SPA 3</b><br><b>San Gabriel</b><br>Pop. 1,744,887 | <b>SPA 4</b><br><b>Metro</b><br>Pop. 1,117,416 | <b>SPA 5</b><br><b>West</b><br>Pop. 635,529 | <b>SPA 6</b><br><b>South</b><br>Pop. 1,002,270 | <b>SPA 7</b><br><b>East</b><br>Pop. 1,293,134 | <b>SPA 8</b><br><b>South Bay</b><br>Pop. 1,523,213 |
|--|---|--|--|---|--|---|--|
| Lancaster  | Agoura Hills  | Alhambra   | Los Angeles                                    | Beverly Hills                               | Compton  | Artesia                                       | Avalon   |
| Palmdale   | Burbank   | Arcadia  | West Hollywood                                 | Culver City                                 | Los Angeles                                    | Bell  | Carson   |
|  | Calabasas   | Azusa  |  | Los Angeles                                 | Lynwood  | Bell Gardens                                  | El Segundo   |
|  | Glendale  | Baldwin Park   |  | Malibu                                      | Paramount                                      | Bellflower                                    | Gardena  |
|  | Hidden Hills  | Bradbury   |  | Santa Monica                                |  | Cerritos                                      | Hawthorne  |
|  | La Canada Flintridge                                  | Claremont  |  |   |  | Commerce                                      | Hermosa Beach                                      |
|  | Los Angeles   | Covina   |  |   |  | Cudahy  | Inglewood  |
|  | San Fernando  | Diamond Bar  |  |   |  | Downey  | Lawndale   |
|  | Santa Clarita   | Duarte   |  |   |  | Hawaiian Gardens                              | Lomita   |
|  | Westlake Village                                      | El Monte   |  |   |  | Huntington Park                               | Long Beach   |
|  |   | Glendora   |  |   |  | La Habra Heights                              | Los Angeles  |
|  |   | Industry   |  |   |  | La Mirada                                     | Manhattan Beach                                    |
|  |   | Irwindale  |  |   |  | Lakewood                                      | Palos Verdes Estates                               |
|  |   | La Puente  |  |   |  | Maywood                                       | Rancho Palos Verdes                                |
|  |   | La Verne   |  |   |  | Montebello                                    | Redondo Beach                                      |
|  |   | Monrovia   |  |   |  | Norwalk                                       | Rolling Hills                                      |
|  |   | Monterey Park  |  |   |  | Pico Rivera                                   | Rolling Hills Estates                              |
|  |   | Pasadena   |  |   |  | Santa Fe Springs                              | Torrance   |
|  |   | Pomona   |  |   |  | Signal Hill                                   |  |
|  |   | Rosemead   |  |   |  | South Gate                                    |  |
|  |   | San Dimas  |  |   |  | Vernon  |  |
|  |   | San Gabriel  |  |   |  | Whittier                                      |  |
|  |   | San Marino   |  |   |  |   |  |
|  |   | Sierra Madre   |  |   |  |   |  |
|  |   | South El Monte                                       |  |   |  |   |  |
|  |   | South Pasadena                                       |  |   |  |   |  |
|  |   | Temple City  |  |   |  |   |  |
|  |   | Walnut   |  |   |  |   |  |
|  |   | West Covina  |  |   |  |   |  |

Notes: July 1, 2010 population estimates by Walter R. McDonald & Associates, Inc., released September 30, 2012.

# MORTALITY IN LOS ANGELES COUNTY 2010

Leading Causes of Death and Premature Death with Trends for 2001-2010

A PUBLICATION OF THE LOS ANGELES COUNTY DEPARTMENT OF PUBLIC HEALTH

## Department of Public Health

Jonathan E. Fielding, MD, MPH  
Director and Health Officer

Steven Teutsch, MD, MPH  
Chief Science Officer

## Office of Health Assessment and Epidemiology

Margaret Shih, MD, PhD  
Director

EDITED BY  
Loren Lieb, MPH

GRAPHIC DESIGN BY  
Alan Albert

We thank Sun Lee, MPH and Louise Rollin, MS for their assistance.

## Los Angeles County Board of Supervisors

Gloria Molina, First District

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**Data are available online**

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