

# Demographic Future of the Southern California Region

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Southern California Water Dialogue,  
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California headquarters, Los Angeles,  
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# About SCAG

- Nation's largest Metropolitan Planning Organization (MPO) and Council of Governments (COG). Joint Powers Agency.
- Governed by a Regional Council of 86 local elected officials
- 6 counties and 191 cities in an area of 38,000 square miles
- 18.8 million residents and 8 million jobs
- 16th largest economy in the world
- Nation's global gateway for trade



# SCAG Deals with these Regional Issues



TRANSPORTATION



GOODS MOVEMENT



HOUSING



AIR QUALITY



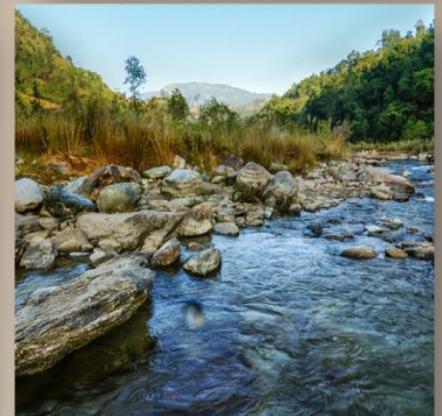
SCS/LAND USE



FUNDING



LONG TERM GROWTH FORECAST



WATER

# Population Projections are Basis for Developing Local and Regional Plans

- Transportation Planning (RTP)
- Sustainable Communities Strategy (SCS)
- Air Quality Planning (AQMD)
- Housing (RHNA)
- Airport Planning (Aviation)
- Water Planning (MWD & LA County Sanitation Districts)
- Education, Land Use and Local Planning

# What Will Southern California Look Like in the Future?

(LA Times, June 18, 2015)

<b>1980s</b> <b>ACTUAL</b> <small>1988 except where noted</small>	<b>2010</b> <b>PROJECTIONS</b> <small>As predicted in 1980s</small>	<b>2010</b> <b>ACTUAL</b> <small>2012 data where noted</small>	<b>2040</b> <b>PROJECTIONS</b> <small>2035 projections where noted</small>
<p><b>POPULATION OF THE SIX-COUNTY AREA IN 1986</b>  <small>Los Angeles, Orange, Ventura, San Bernardino, Riverside and Imperial counties</small></p> <p><b>12.8 million</b></p>	<p><b>POPULATION OF THE SIX-COUNTY AREA</b>  <small>Los Angeles, Orange, Ventura, San Bernardino, Riverside and Imperial counties</small></p> <p><b>18.3 million</b></p>	<p><b>POPULATION OF THE SIX-COUNTY AREA</b>  <small>Los Angeles, Orange, Ventura, San Bernardino, Riverside and Imperial counties</small></p> <p><b>18.1 million</b>  <small>(18,051,534)</small></p>	<p><b>POPULATION OF THE SIX-COUNTY AREA</b>  <small>Los Angeles, Orange, Ventura, San Bernardino, Riverside and Imperial counties</small></p> <p><b>22.1 million</b></p>
<p><b>PORTION OF THE U.S. POPULATION LIVING IN REGION:</b></p> <p><b>1 in 20</b></p>	<p><b>PORTION OF THE U.S. POPULATION LIVING IN REGION:</b></p> <p><b>1 in 15</b></p>	<p><b>PORTION OF THE U.S. POPULATION LIVING IN REGION:</b></p> <p><b>1 in 17</b></p>	<p><b>PORTION OF THE U.S. POPULATION LIVING IN REGION:</b></p> <p><b>1 in 17</b></p>
<p><b>ETHNIC BREAKDOWN IN 1984</b></p> <p><b>White 60%</b>  <b>Black 9%</b>  <b>Asian 6.2%</b>  <b>Latino 24%</b></p>	<p><b>ETHNIC BREAKDOWN:</b></p> <p><b>White 41%</b>  <b>Black 10.2%</b>  <b>Asian 9.3%</b>  <b>Latino 39.5%</b></p>	<p><b>ETHNIC BREAKDOWN:</b></p> <p><b>White 33.4%</b>  <b>Black 6.5%</b>  <b>Asian 14.8%</b>  <b>Latino 45.3%</b></p>	<p><b>ETHNIC BREAKDOWN:</b></p> <p><b>White 22.4%</b>  <b>Black 5.4%</b>  <b>Asian 19.1%</b>  <b>Latino 53.1%</b></p>
<p><b>MEDIAN AGE IN 1980</b></p> <p><b>Male 28.7</b>  <b>Female 30.6</b></p>	<p><b>MEDIAN AGE</b></p> <p><b>Male 34.5</b>  <b>Female 37</b></p>	<p><b>MEDIAN AGE</b></p> <p><b>Male 33.4</b>  <b>Female 35.7</b></p>	<p><b>MEDIAN AGE</b></p> <p><b>Male 37.3</b>  <b>Female 39.2</b></p>
<p><b>JOBS</b></p> <p><b>6 million</b></p>	<p><b>JOBS</b></p> <p><b>9 million</b></p>	<p><b>JOBS</b></p> <p><b>7.3 million</b></p>	<p><b>JOBS</b></p> <p><b>9.8 million</b></p>
<p><b>SCHOOL-AGE CHILDREN</b></p> <p><b>2.4 million</b></p>	<p><b>SCHOOL-AGE CHILDREN</b></p> <p><b>3.2 million</b></p>	<p><b>SCHOOL-AGE CHILDREN (5-17)</b></p> <p><b>3.4 million</b></p>	<p><b>SCHOOL-AGE CHILDREN (5-17)</b></p> <p><b>3.6 million</b></p>
<p><b>POPULATION 65 AND OLDER IN 1984</b></p> <p><b>1.1 million</b></p>	<p><b>POPULATION 65 AND OLDER</b></p> <p><b>2.3 million</b></p>	<p><b>POPULATION 65 AND OLDER:</b></p> <p><b>1.97 million</b></p>	<p><b>POPULATION 65 AND OLDER</b></p> <p><b>4 million</b></p>

# Accuracy and Bias of SCAG Region's Population and Employment Projections (as of 2014)

		Projection Horizon			
		5 year	10 year	15 year	20 year
Forecast Accuracy*	Population	3%	6%	9%	11%
	Employment	6%	10%	15%	14%
Forecast Bias**	Population	0%	-2%	-4%	-5%
	Employment	-1%	0%	1%	6%
Observations		11	10	9	8

Note: \* Mean Absolute Percentage Errors = Abs. (Projected - Estimated) / Estimated \*100;

\*\* Mean Percentage Errors = (Projected - Estimated) / Estimated \*100;

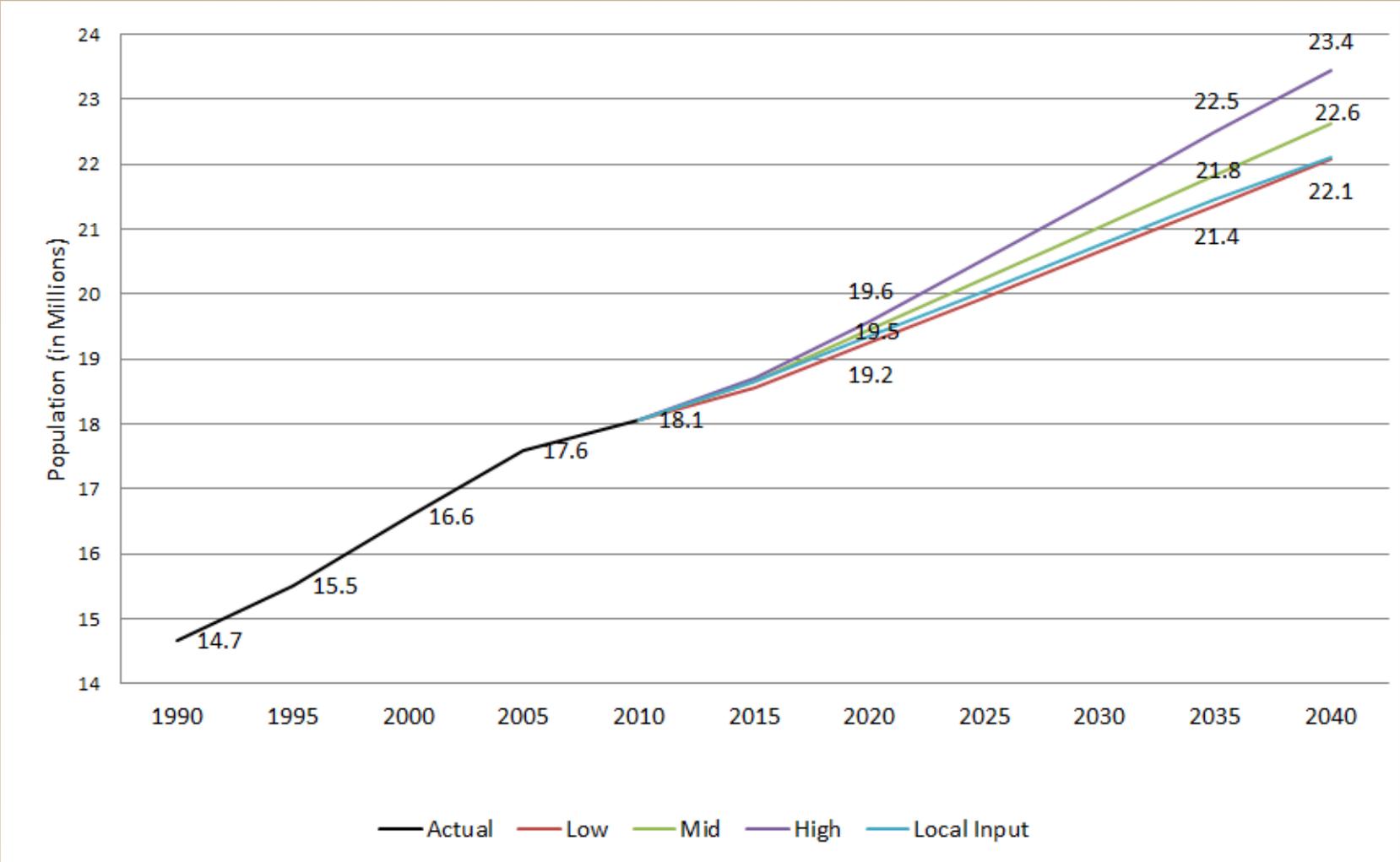
Compound growth rate was used to interpolate the intermediate years.

Source: CA DOF, SCAG

# Future Demographic Trends of the SCAG Region

1. Slower population growth
2. Less share of children
3. Population aging
4. More new immigrants
5. Slower racial and ethnic change
6. Suburban growth and aging in place

# SCAG Region Range of Preliminary Population Projections (2013) and Local Input (2014)



Source: CA DOF, SCAG

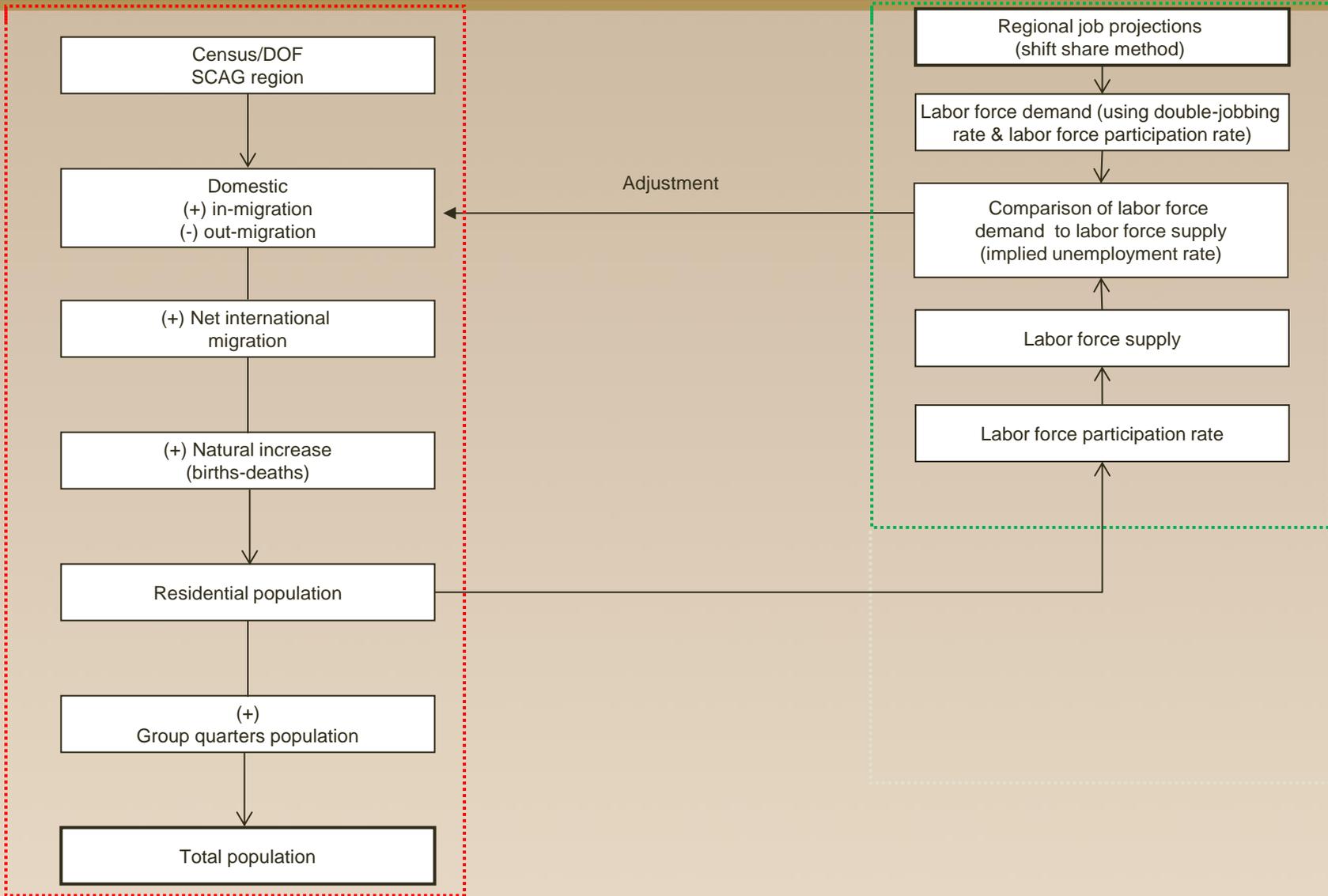
# Annual Average Growth Rate of Population (1850-2040): Historical and Projected

Over the last 160 years (1850-2010), the regional growth went through 4 periods: (1) very rapid growth, (2) rapid growth, (3) average growth, (4) slow growth, using statewide growth as a reference. The new projection shows an extension of the “slower” growth in 2010-2015 than 4<sup>th</sup> period (1990-2010) with an annual average growth rate of less than 1% in the future.

Periods	1850-1910	1910-1960	1960-1990	1990-2010	2010-2015	2015-2040
SCAG Region	310.8%	21.6%	2.9%	1.2%	0.7%	0.7%
California	41.1%	11.2%	3.0%	1.3%	1.0%	0.9%
US	5.0%	1.9%	1.3%	1.2%	0.8%	0.8%

Source: US Census Bureau, Decennial Census (1850-2010), Population Estimates (2014), Population Projections (2014); CA DOF, Population Projections, 2014; SCAG, Draft Growth Forecast, 9.2015.

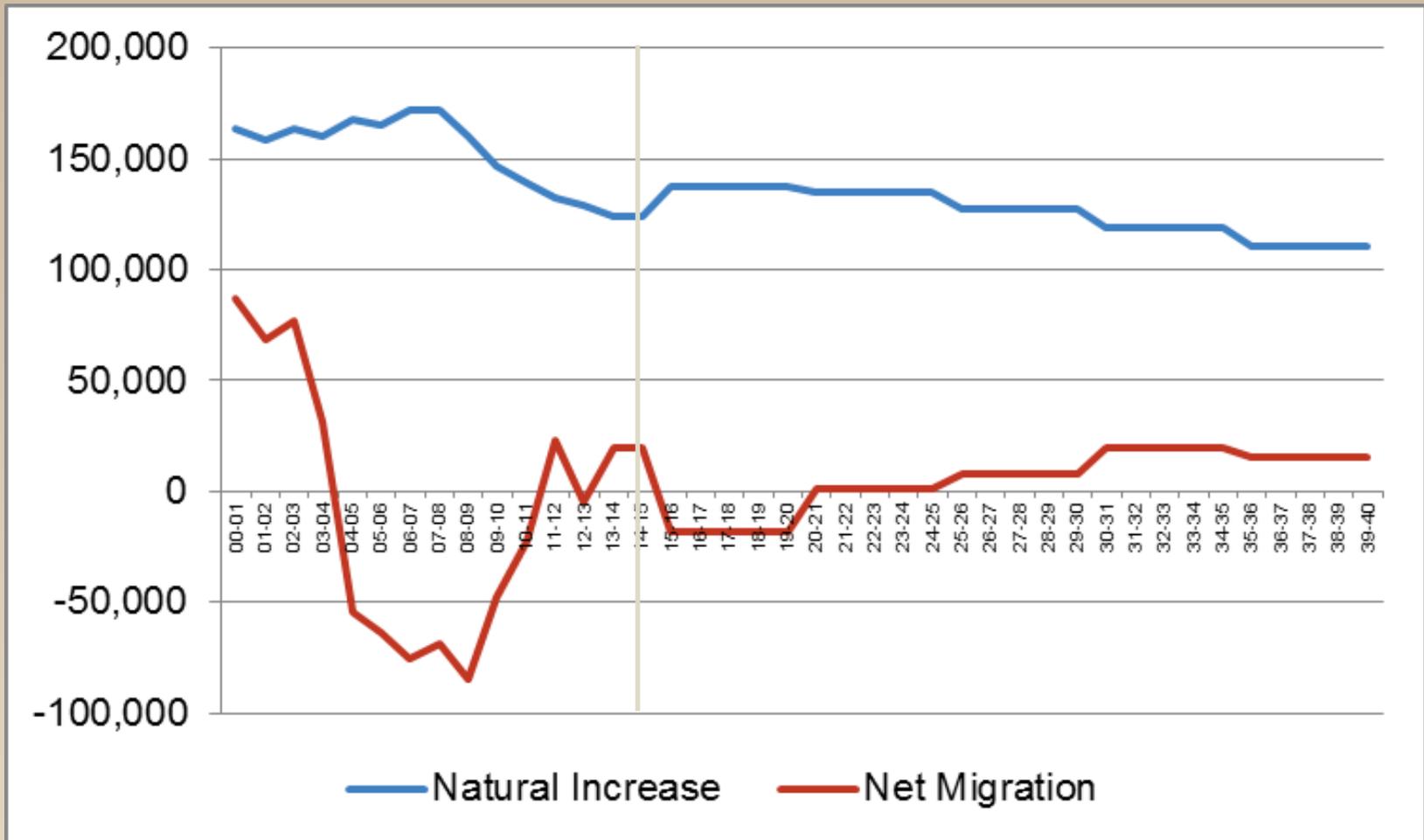
# SCAG Region Population Projections: Economic-Demographic Model



# Regional Demographic Assumptions

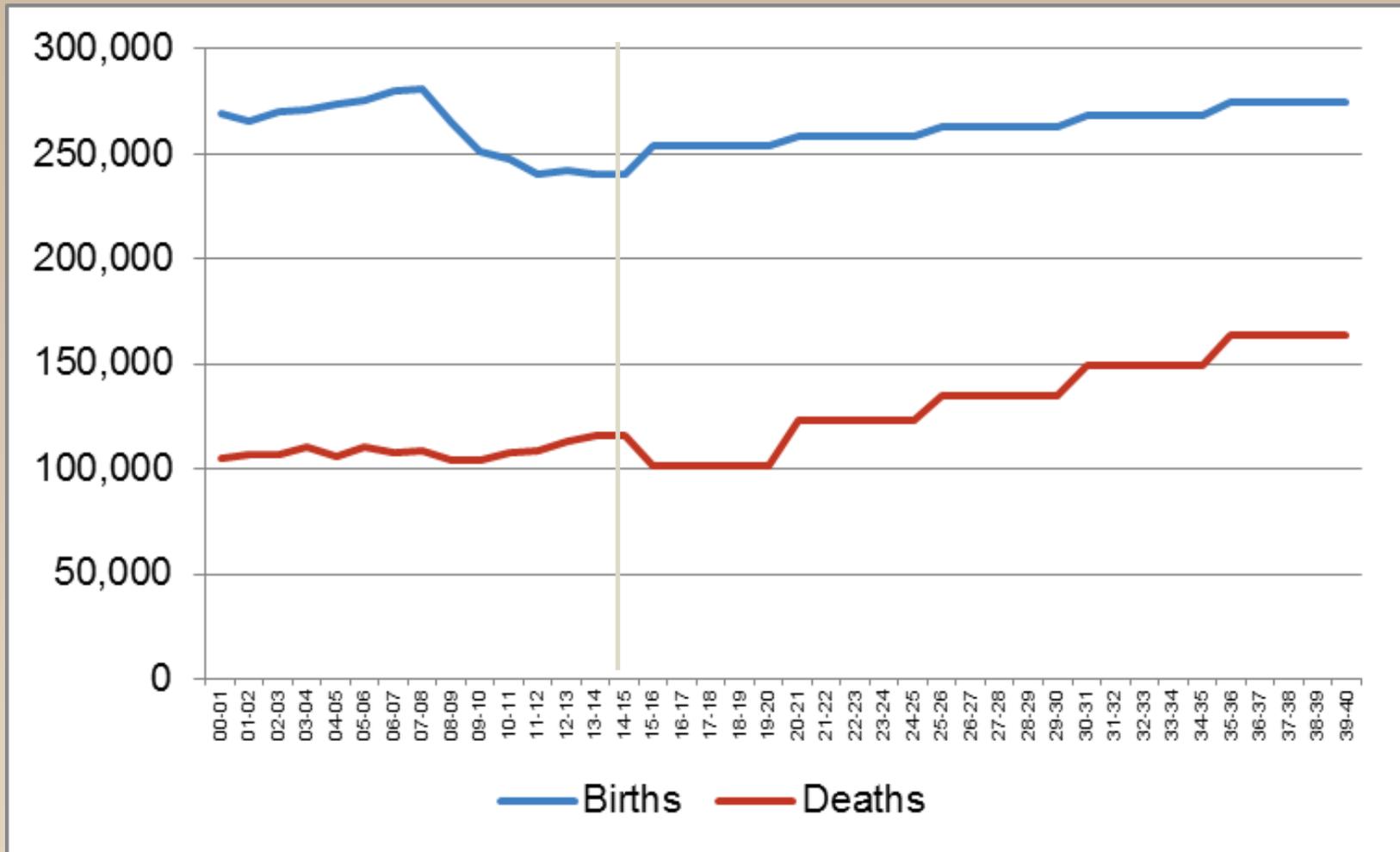
- Demographic Assumptions
  - Fertility: Stable at 1.9
  - Mortality: Declines (Life expectancy at birth increases by 7%-8%)
  - Net Immigration: Increases until 2020 and remains constant during the remaining period.
  - Net Domestic Migration: Fluctuates
- Additional Regional Assumptions
  - Jobs Per Worker: 1.0452
  - Unemployment Rate: 5%-8%
  - Total Labor Force Participation Rate: Declines with an increase of older age cohorts.

# Components of Population Change (2000-2040): Historical and Projected



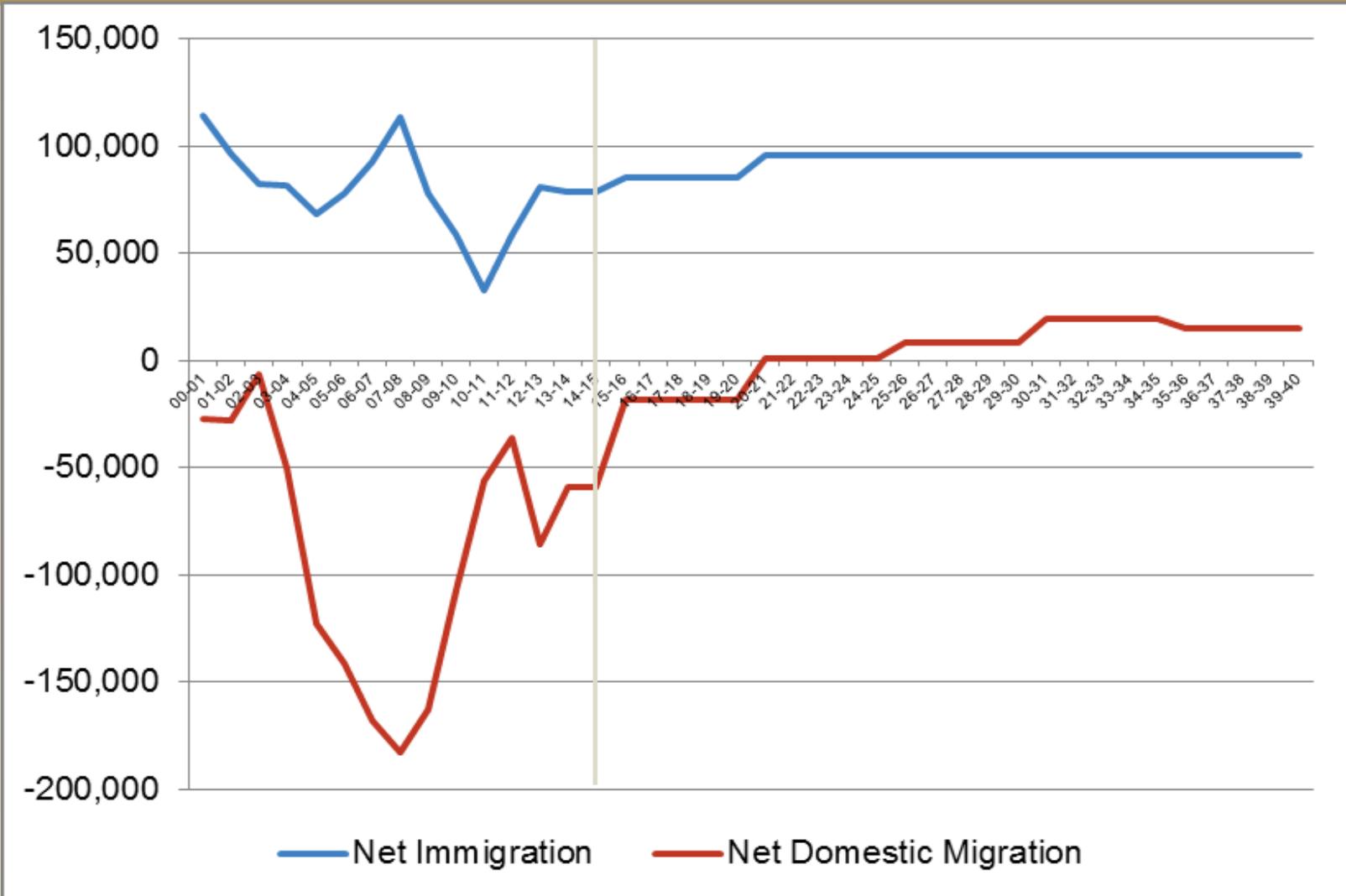
Source: CA DOF, SCAG

# Births and Deaths (2000-2040): Historical and Projected



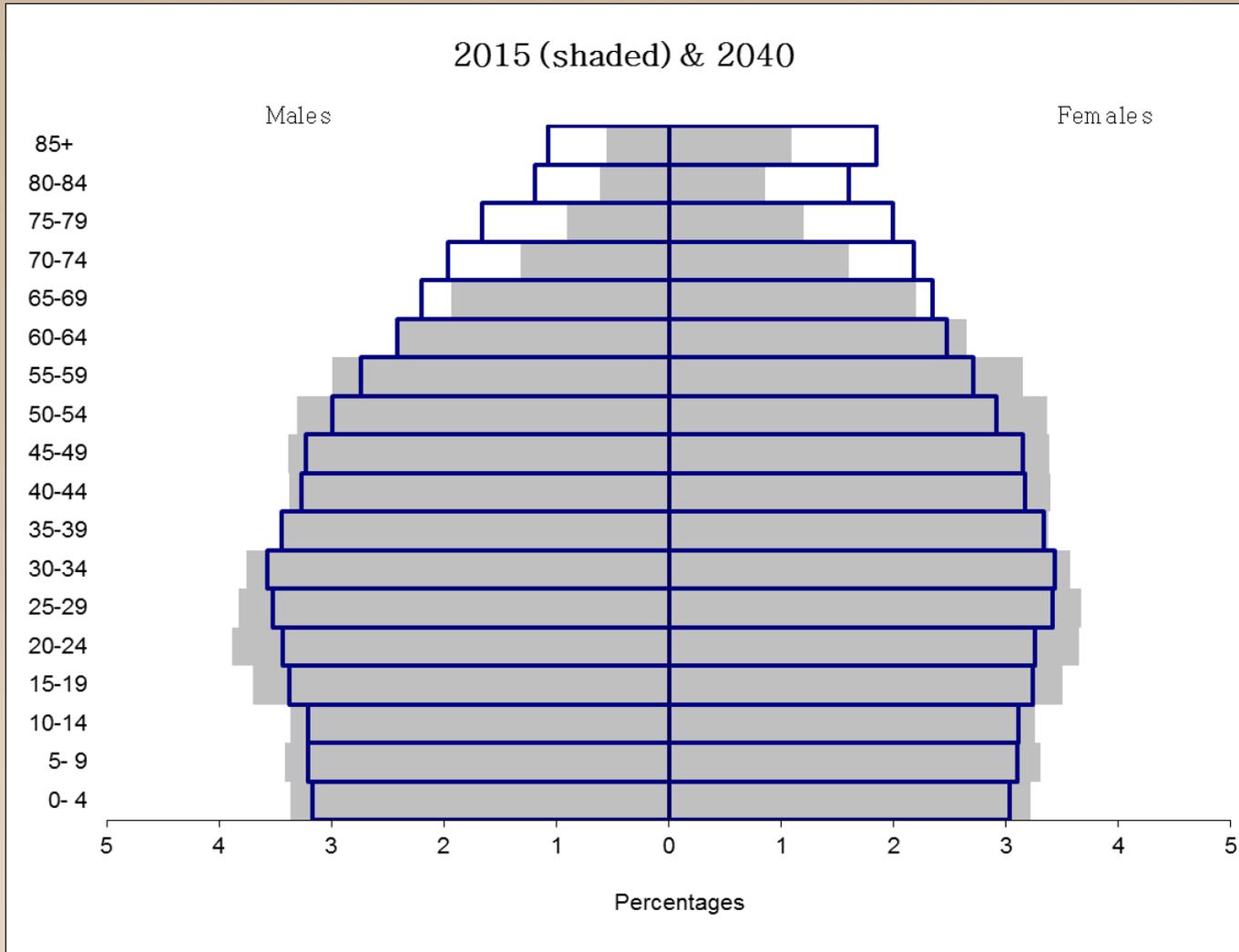
Source: CA DOF, SCAG

# Net Immigration and Net Domestic Migration (2000-2040): Historical and Projected



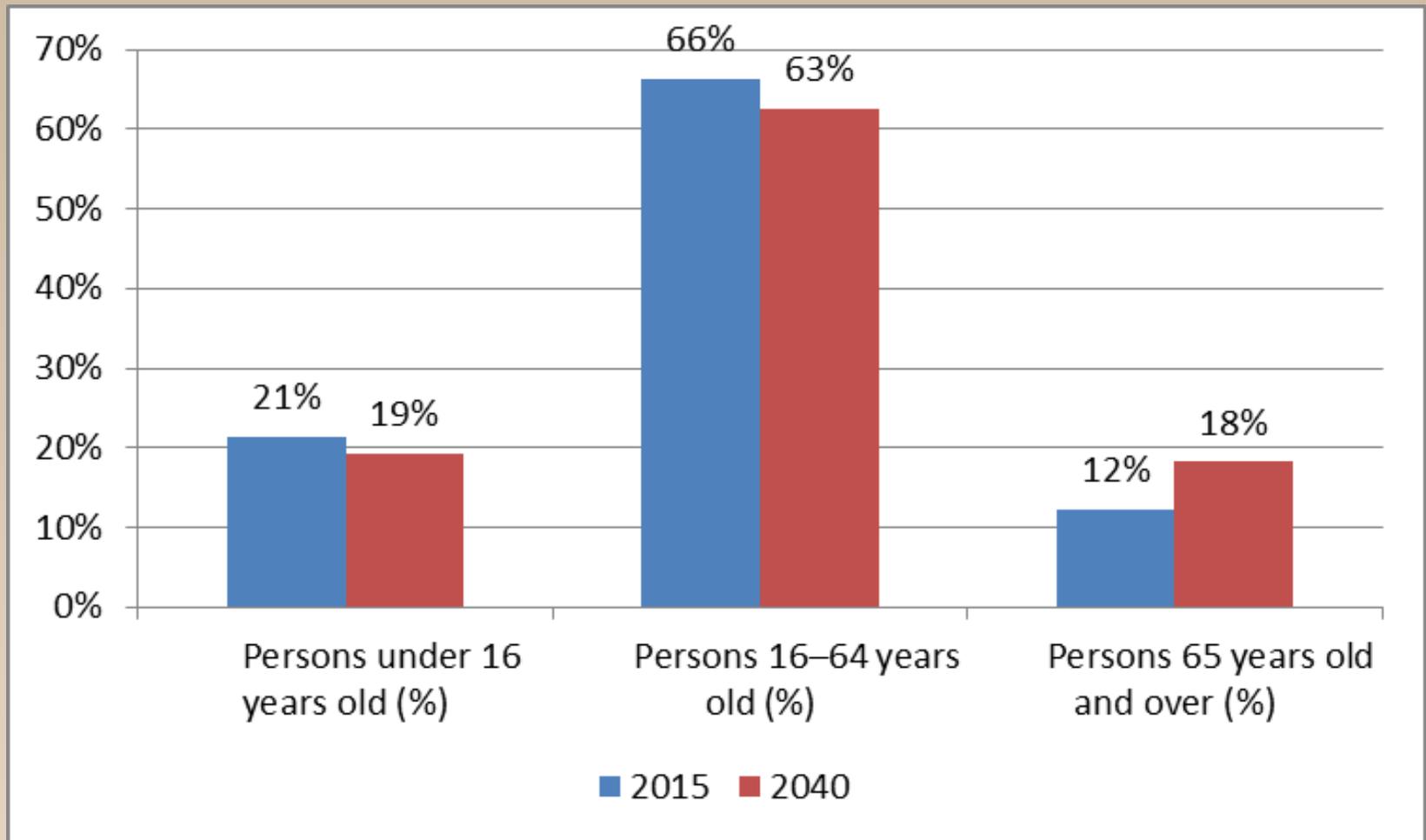
Source: CA DOF, SCAG

# Population Pyramid: 2015 & 2040



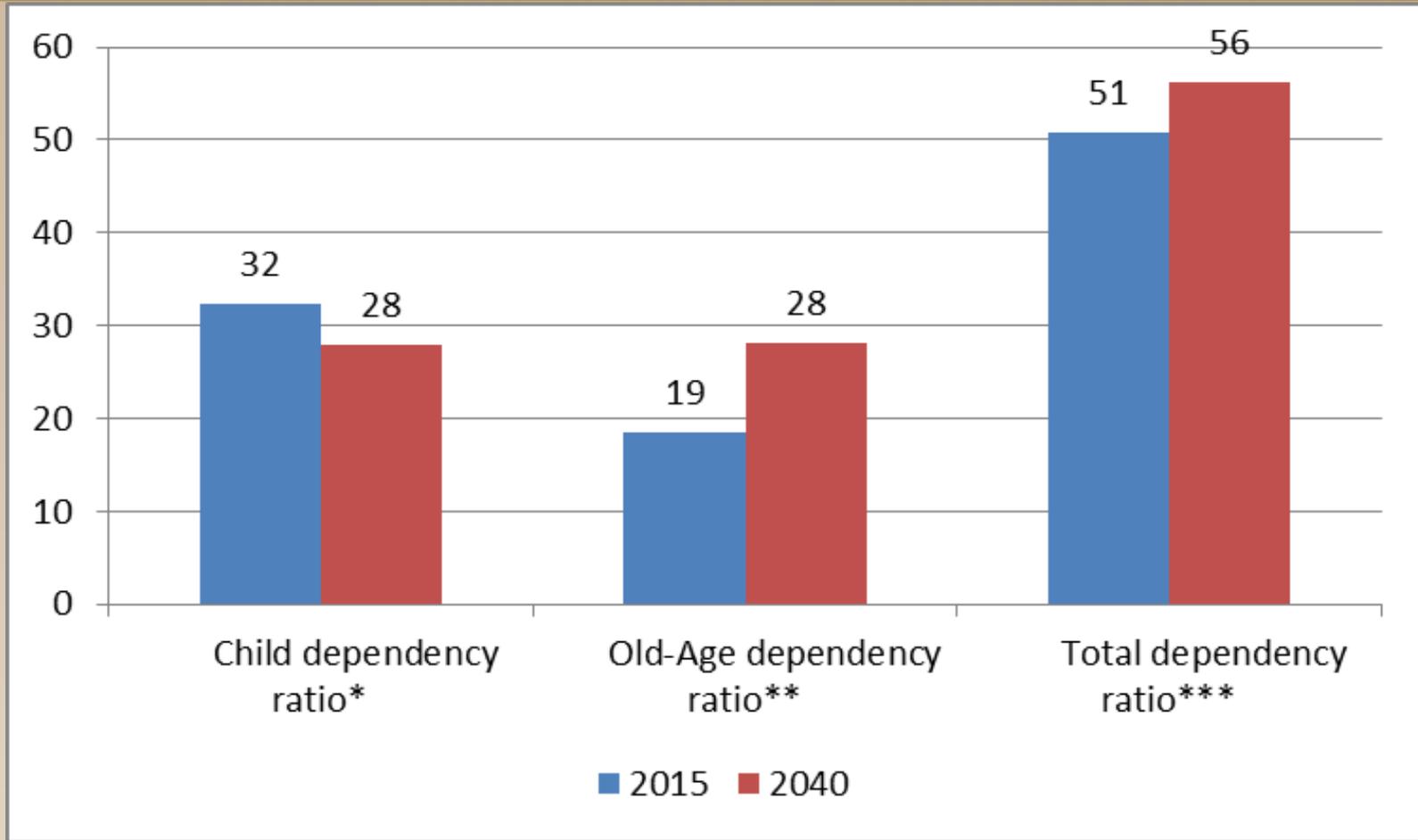
Source: US Census Bureau & SCAG

# Population by Age: 2015 & 2040



Source: US Census Bureau & SCAG

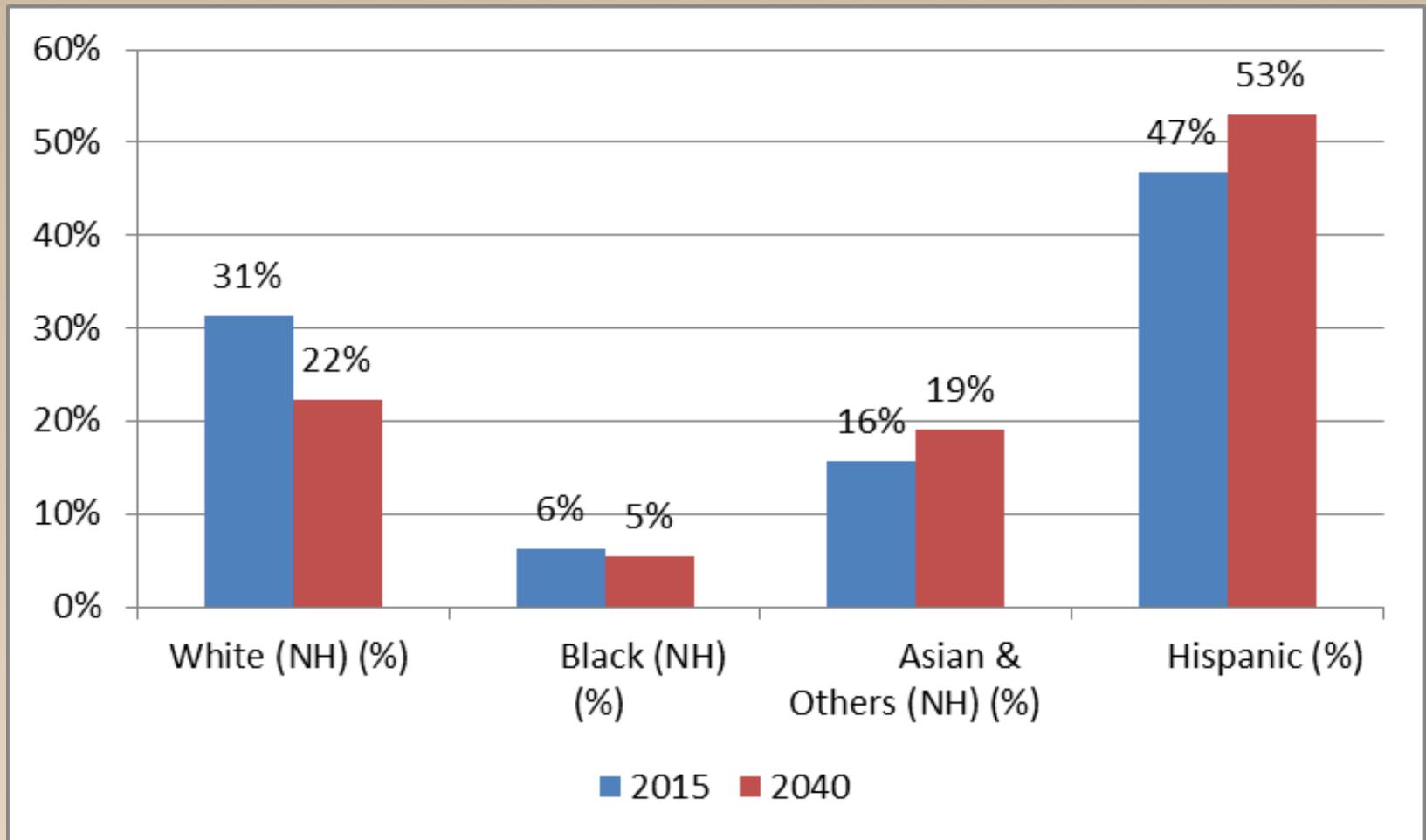
# Dependency Ratio: 2015 & 2040



Note: \* The number of children per hundred people of working age. \*\* The number of aged people per hundred people of working age. \*\*\* The number of children (age 0-15) and aged persons (age 65 and over) per hundred people of working age (age 16-64).

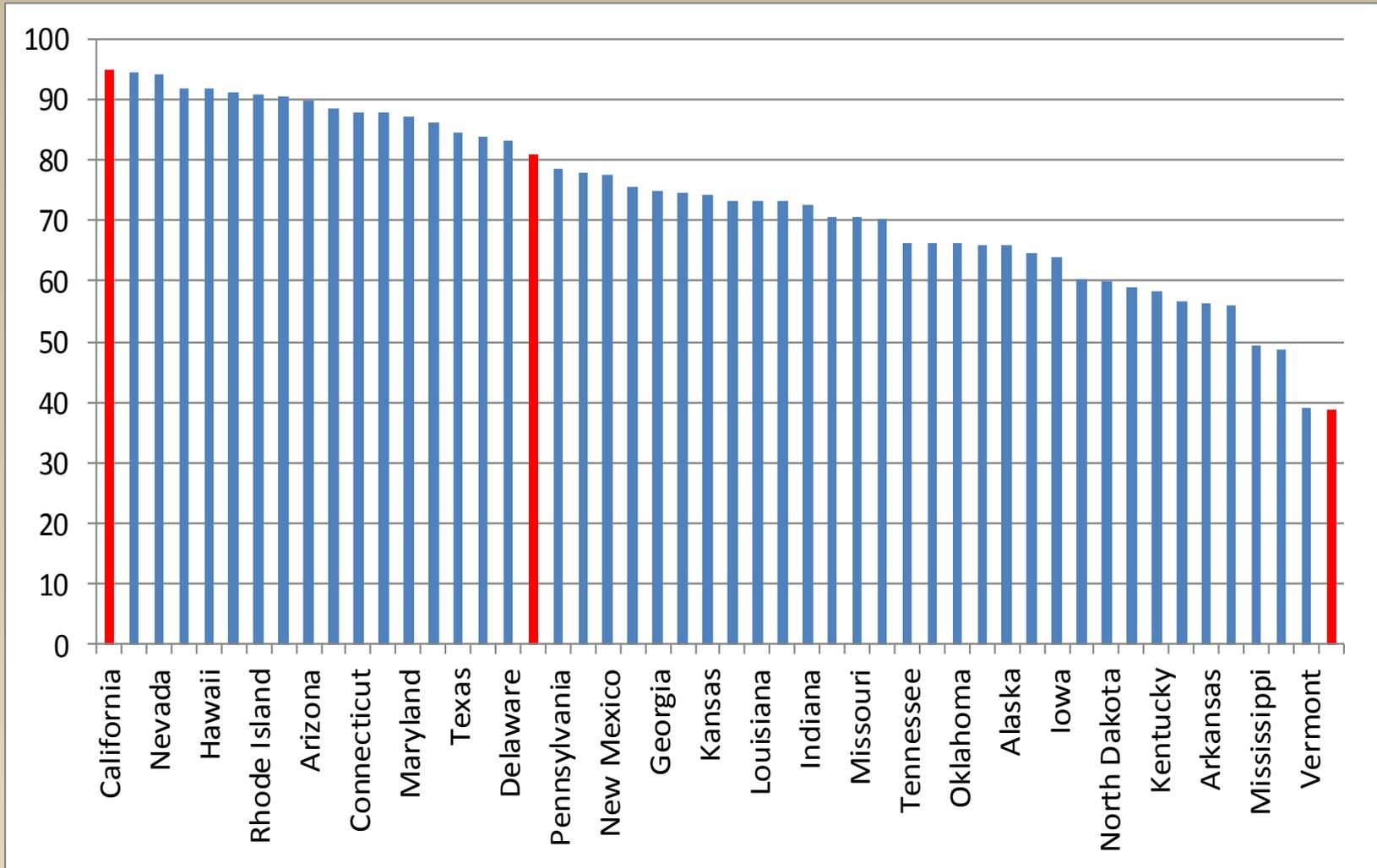
Source: US Census Bureau & SCAG

# Population by Race/Ethnicity: 2015 & 2040



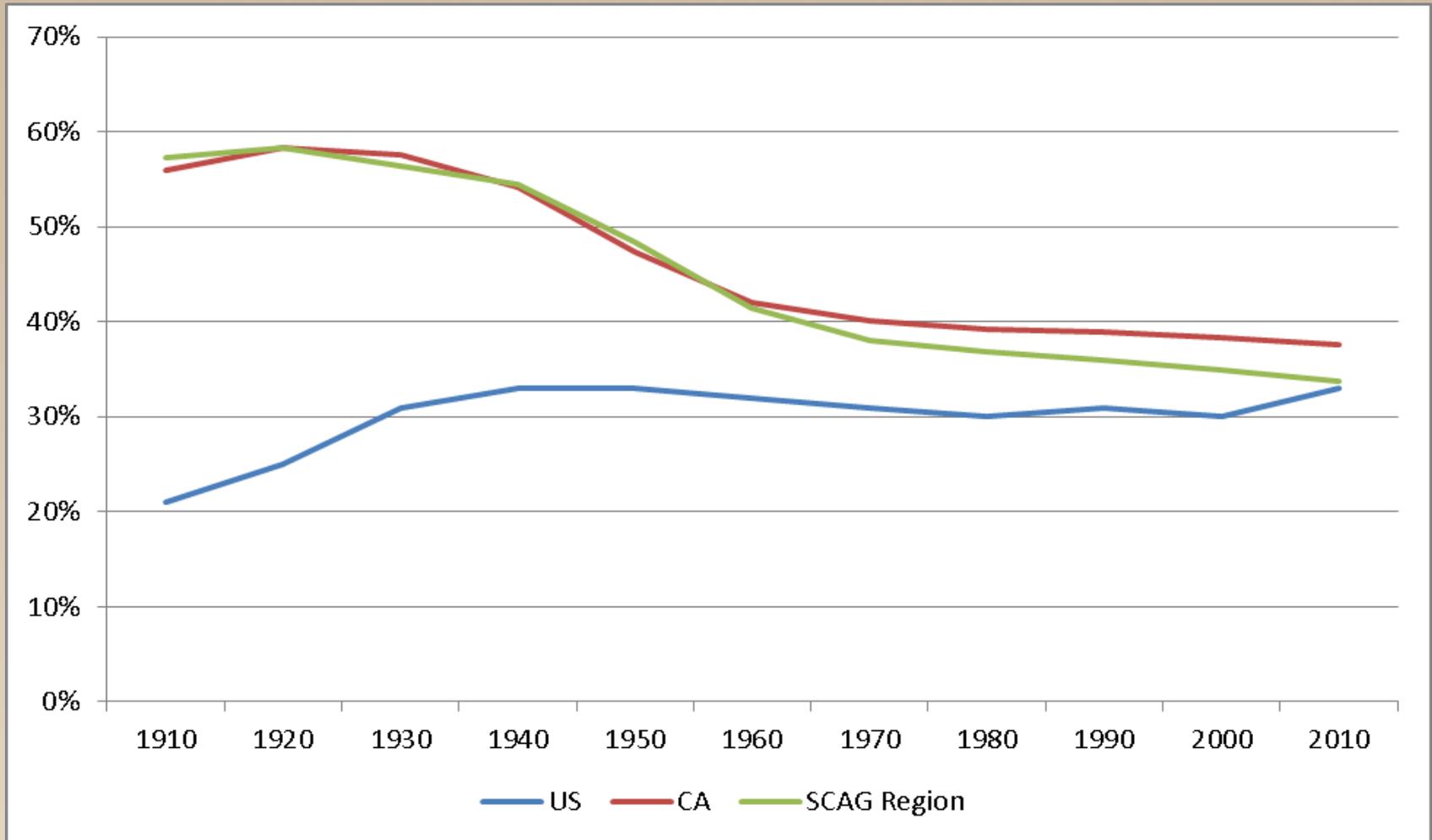
Source: US Census Bureau & SCAG

# Percentage of Urban Population by State, 2010



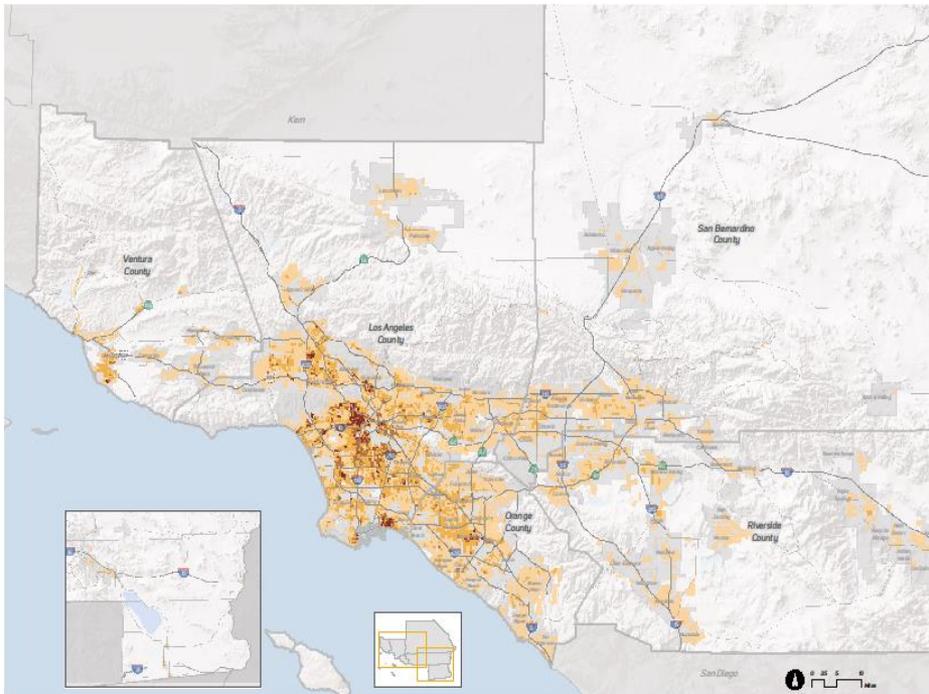
Source: US Census Bureau

# Percentage of Central Cities' Population in US, California, SCAG Region, 1910-2010



Source: US Census Bureau

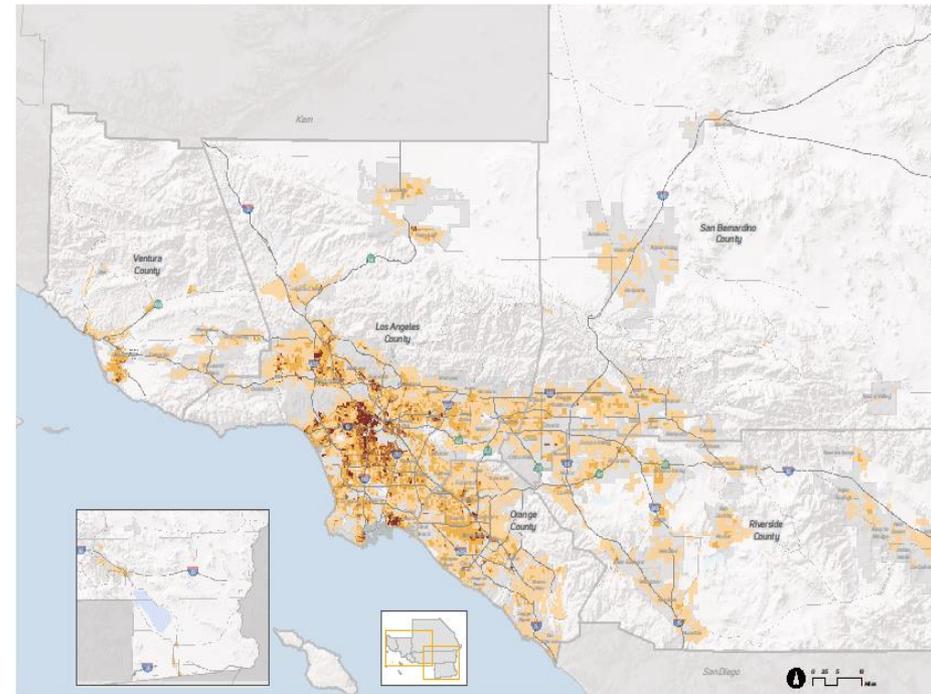
# Population Density (2012 & 2040): Persons per Square Mile



Population Density in 2012 (Persons per Square Mile)

Less than or Equal to 2,500    2,501 - 10,000    10,001 - 20,000    20,001 - 30,000    Greater than 30,000

(Source: SCAG, 2013)



Population Density in 2040 (Persons per Square Mile)

Less than or Equal to 2,500    2,501 - 10,000    10,001 - 20,000    20,001 - 30,000    Greater than 30,000

(Source: SCAG, 2013)

Map Title: Population Density in 2012

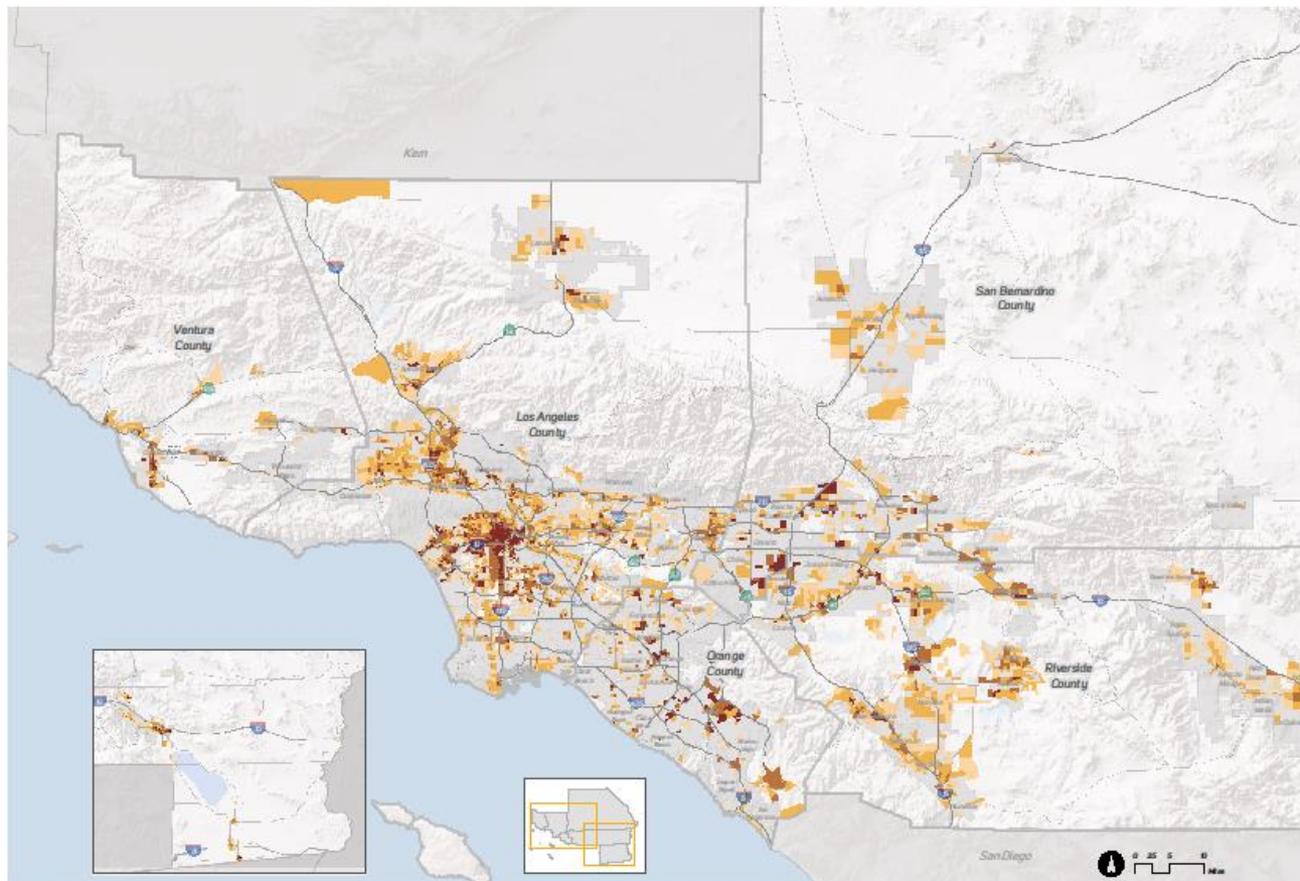
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Map Title: Population Density in 2040

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Source: SCAG, Draft Growth Forecast – Policy Scenario, 9.2015

# Growth of Population (2012-2040): Persons per Square Mile



Population Growth, 2012 - 2040 (Persons per Square Mile)

Less than or Equal to 500    501 - 1,000    1,001 - 2,500    2,501 - 5,000    Greater than 5,000

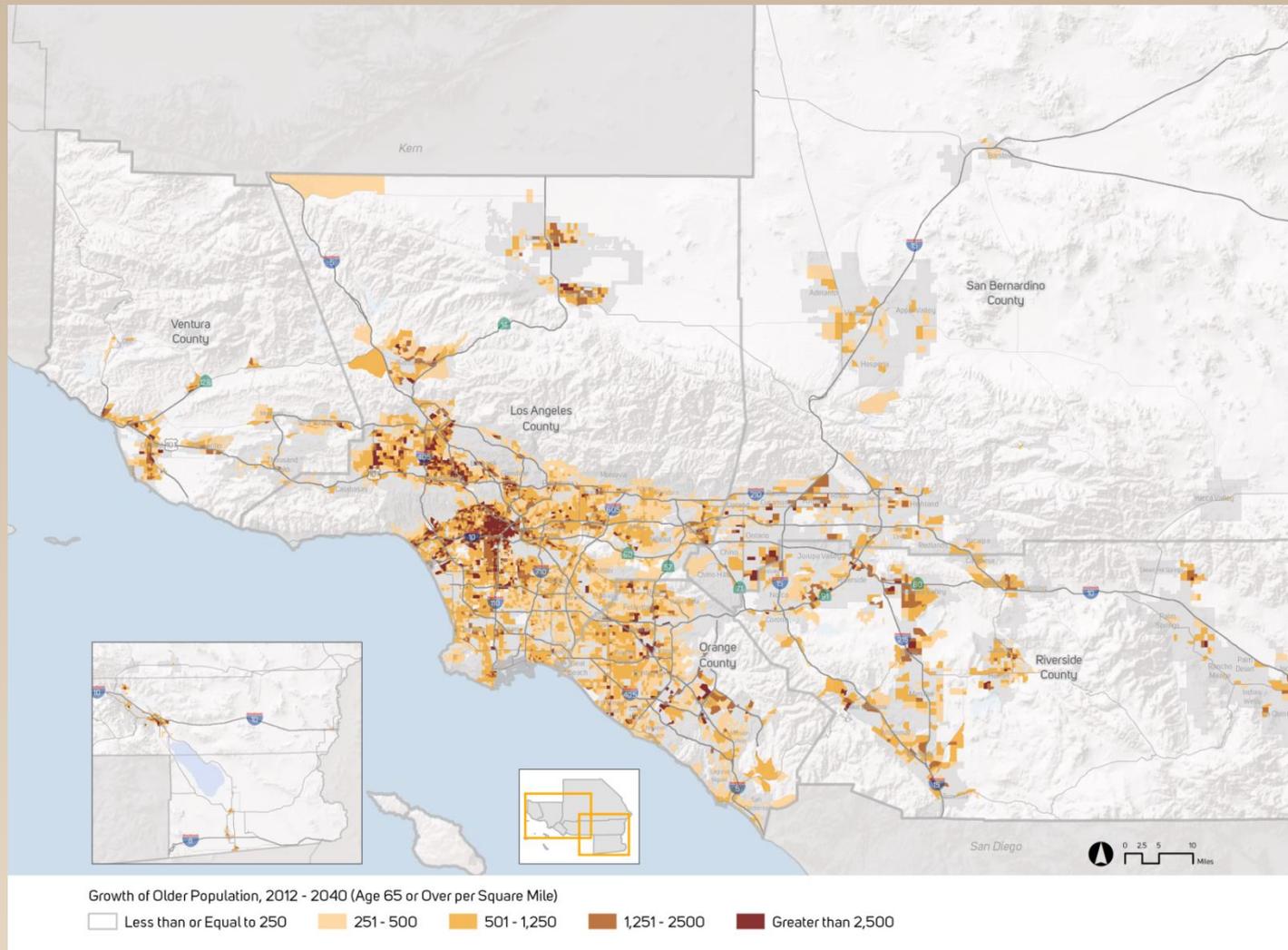
(Source: SCAG, 2015)

Map Title: Population Growth, 2012 - 2040

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Source: SCAG, Draft Growth Forecast – Policy Scenario, 9.2015

# Growth of Older Population (2012-2040): Persons per Square Mile



# Thank you!

**For more information  
please contact**

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