THE METHOD
\[ P_n = P_0 + B - D + NM \]

- \( P_n \) = projected population
- \( P_0 \) = beginning population
- \( B \) = births
- \( D \) = deaths
- \( NM \) = net migration
NM = NI + NDM

NI = Net Immigration (from a foreign country)

NDM = Net Domestic Migration (from other states and counties)
STEP 1 - Benchmark Population

√ Modified Age, Race, and Sex (MARS)
√ Modified for known age misreporting - total matches official census counts
√ By single year of age
√ Races are Hispanic-exclusive
√ Include Hispanics by race categories
STEP 2 - Remove Special Populations

Populations which do not age normally

- college students
- prison inmates
- CYA wards
STEP 3 - Survive the Population

√ Annual process
√ Apply survival probabilities
√ Oldest age group is 100+
STEP 4 - Migrate the Population

√ Control Total
√ Race/ethnic distribution
√ Age and sex distribution
STEP 5 - Create New Cohort

√ Female population by race and age
√ Fertility rates
√ Result is births or new cohorts
STEP 6 - Add Special Populations

- Forecast based on input from administering State or Federal Agency
- Add to forecasted population
- Result is total population
Assumptions
MORTALITY

- Life table survival rates
- Sex, race and age-specific
- Same rates used for all counties
FERTILITY

- Rates are race and age specific
- Beginning rates are county specific
- Local rates can merge toward statewide norms
- Or follow the state trend
- Or remain constant
MIGRATION

- Work in conjunction with local planners
- Independent statewide assumption
- Control local migration assumptions to statewide assumption

Net Migration California 1970-2040
PHILOSOPHY
✓ No major or world wide wars nor natural catastrophes will befall the State or the Nation
✓ Everyone has the right the move where their whims or social or economic advantages dictate
✓ Assumptions reflect historical trends and levels unless there are known reasons to modify
✓ The assumptions justify the end population
Accuracy
Special Report
January 15, 1970

Population
Lesson # 1

Department of Finance population projections are quite accurate
Annual Average Projection Error and Actual Growth Rates

-2.00% -1.00% 0.00% 1.00% 2.00% 3.00% 4.00% 5.00%


Lesson # 2

Errors reflect the underlying methodology and purpose of the population projections
Lesson # 3

County populations are more difficult to project than the statewide population.
Year 2000 Average Percent Errors in DOF Population Projections

-100.00% to -10.00%
-10.00% to 10.00%
10.00% to 50.00%
Absolute Percent Error DOF Population Projections

- 0.00% to 10.00%
- 10.00% to 20.00%
- 20.00% to 40.00%
✓ Department of Finance population projections are quite accurate
✓ Errors reflect the underlying methodology and purpose of the population projections
✓ County populations are more difficult to project than the statewide population.
POPULATION

A Titanic Issue in California
Today there are more than 37 Million Californians
2030
California Population

The graph shows the population of California over selected years from 2007 to 2047. The population is expected to increase gradually over time, with a steady rise in the number of inhabitants each subsequent year.
Demographic Research Unit
Navigating the State’s future