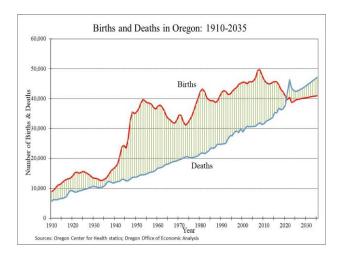
# **Population and Demographic Outlook**

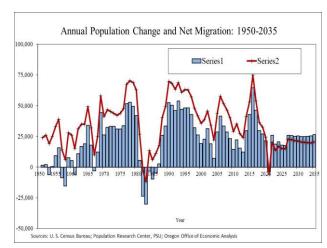
### **Population and Demographic Summary**

Based on the most recent decennial census, Oregon's resident population on April 1, 2020, was 4,237,256. During the past decade, Oregon gained 406,182 residents or 10.6%. This decennial gain was the second lowest since the first census count in Oregon in 1860 after gaining statehood. Still, the gain was substantial enough to yield one additional congressional seat for the state. Oregon now has a total of six members in the House of Representatives. This is rare because it took 40 years for Oregon to gain one additional seat.

Oregon's population growth of 10.6% in the 2010-20 decade was the 11<sup>th</sup> highest in the nation, excluding Washington D.C. The growth rate for the decade lagged all Oregon's neighboring states except California. Oregon's growth has experienced some turbulence since the 2020 census and the corresponding COVID-19 pandemic. At OEA, the PSU Population Research Center (PRC)'s recent postcensal estimate is used as the base for the office's population forecasts. The PRC released the preliminary estimate for 2025 and revised again its estimates for the years 2020 through 2024. The new revised estimates show a loss of 3,654 people between 2020 and 2021. This is much smaller loss than PRC's previous estimate (18,962). Yet, this is very unusual for Oregon since this was the first loss in population since the early 1980s.

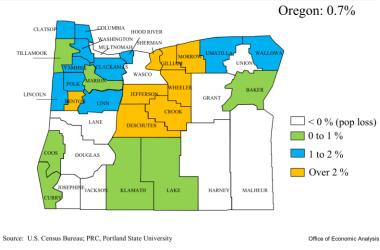
Since the loss of population during the early stage of the COVID-19 pandemic, the recovery has been slow. The estimates show Oregon population growth has remained at a low level not seen since the mid-1980s, indicating timid economic recovery in the post-pandemic years. As the strict federal immigration policy continues to be enforced and Oregon's high tech employment shows signs of stress, the population growth will be affected accordingly. The population growth is expected to show a slow positive increase in the future reaching 4.503 million in the year 2035 with an average annual rate of growth of 0.5% between 2025 and 2035.





Oregon's economic environment heavily influences the state's population growth. Its economy determines the ability to retain the existing work force as well as attract job seekers from national and international labor markets. As Oregon's total fertility rate (1.4 children per woman) remains well below the replacement level (2.1 children per woman) and number of deaths continue to rise due to aging population — long-term growth will rely entirely on net positive in-migration.



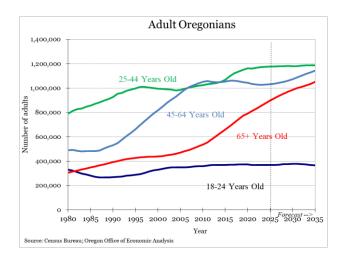


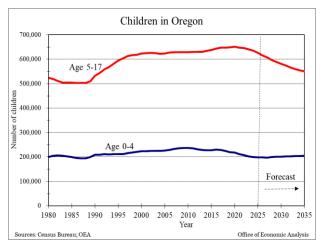
Population change by county in Oregon across recent years shows an interesting and challenging growth pattern. Population in Oregon increased by 0.7% between the 2020 Census and 2024 estimate. The county population growth ranged from a low of -1.7% in Multnomah County to a high of 17.5% in Morrow County. In general, counties in the south and southeast lost population or grew very slowly. Counties in the north experienced faster population growth. The ten counties losing population were Multnomah, Jackson, Wasco, Josephine, Grant, Union,

Malheur, Harney, Douglas and Lane in order of magnitude. The counties experiencing faster population growth exceeding 2% in recent years were Wheeler, Benton, Sherman, Jefferson, Deschutes, Gilliam, Crook and Morrow.

Working-age adults move to Oregon as long as there are favorable economic and social conditions such as: job opportunities, affordable housing and childcare, a good educational environment, personal safety, and a better quality of life that projects real and perceived positivity about the state. As a result of a sudden rise in the number of deaths and a drop in the number of births coinciding with the COVID-19 pandemic, the natural increase (number of births minus number of deaths) turned negative starting in the year 2020 and will continue through 2035 and beyond. Migration will be solely responsible for Oregon's future population growth. Without a positive net migration stream, Oregon's population will start a steady decline. Under a few scenarios, the negative natural increase may shrink or reverse itself. Such reversal can happen if women start to have more children due to behavioral or motivational factors, improved life expectancy leads to fewer deaths, or a large net in-migration contributes to an increase in the number of births.

Age structure and its change affect employment, state revenue collection and tax expenditures. The demand for public services varies by age groups. Demographics are the major budget drivers, which are modified by policy choices on service coverage and delivery. Births, deaths and migration histories of decades past remain impactful on the current age-sex structure. Growth in many age groups will show the effects of the depression era birth cohort, baby boom and their echo generations, and composition of migrants.





#### Elderly (65+)

The overall elderly population (65+) was growing at a relatively slow pace during the late 1990s and early 2000s when the depression era birth cohort entered this age group. The elderly population picked up a faster pace of growth when the baby-boom cohort started maturing into the elderly age group. This age cohort has hit the plateau of high growth rates of above 4.0% annually between 2011 and 2018. The group will experience a continuously high but diminishing rate of growth in the coming years. The average annual growth of the elderly population will be 1.6% during the 2025-2035 forecast period, which is over four times the rate of growth of the overall population.

As a sign of the massive demographic structural change of Oregon's population, the number of elderly people has exceeded the number of children under the age of 18 since 2023. To illustrate the contrast, in 2000 the elderly population numbered a little over half of the number of children in Oregon, and now the elderly outnumber the children. This is because of the decline in the fertility rate, improvement in the life expectancy, as well as the ageing of the large baby boom population. Different age groups among the elderly population show quite varied and fascinating growth trends:

- The youngest elderly group (aged 65-74), which was growing at an extremely fast pace in the recent past (averaging 5.0% annually in 2010's), will taper off to negative growth after 2026 as a sign of the end of the baby boom generation transitioning to the elderly age group. This high growth period transitioning into a net loss of the youngest elderly population resulting in a -0.7% annual average loss during the forecast period.
- The next older generation of the population, aged 75-84, has been growing rapidly for a decade after several years of slow as well as negative growth. An unprecedented fast pace of growth, exceeding 6.0% annually in this age group, has already started as the baby boom generation is maturing and the depression era birth cohort is exiting this 75-84 age group. The annual average growth rate is expected to be unusually high at 3.0% during the forecast period.
- The oldest elderly population (aged 85+) will grow at a strong rate, steadily gaining momentum
  due to the combination of cohort change, historical positive net migration and improving life
  expectancies. The average annual rate of growth for this oldest elderly group over the forecast
  horizon will be 6.5%. An unprecedented annual growth exceeding 8.0% will commence after
  2031.

# Working Age and Young Adults (18-64)

The oldest working age population, aged 45-64, has also seen a dramatic demographic change as the baby boom generation matures out of this age group and is replaced by the smaller baby-bust cohort or Gen X. As the effect of this demographic transition is combined with slowing net migration, the once fast-paced growth has tapered off to negative growth. The growth rate is beginning to reverse to positive and will see gaining momentum over the forecast horizon with a 1.0% annualized rate of change. The younger working-age population of the 25-44 age group will have slow growth of 0.1% annual average over the forecast period.

The young adult population, aged 18-24, will see very small change, averaging a loss of -0.1% annually over the forecast period. The positive growth during the early years of the forecast period will disappear due to decline in the later years. Although the slow growth of the college-age population (age 18-24) tends to ease the pressure on public spending on higher education, college enrollment typically goes up during times of a very competitive job market, high unemployment and scarcity of well-paying jobs. The older cohort also flock back to colleges to better position themselves in a tough job market.

#### School Age (5-17) and pre-School Age (0-4) Children

The growth in K-12 population (ages 5-17) was very slow during the last decade, turned negative in 2021, and is expected to decline consistently through the forecast years mainly due to the declining number of births over the years. This will translate into a decline in school enrollments. On average for the forecast period, this school-age population will decline by -1.3% annually. The growth rate for children under the age of five has remained below zero percent in the recent past and will show slight positive growth. The pre-school aged children will increase with an average annual growth rate of 0.4%. The demand for childcare services and pre-Kindergarten programs is determined by the size of this population as well as the labor force participation and economic wellbeing of legal guardians and parents.

Overall, the elderly population over age 65 will increase rapidly whereas the number of children will decline over the forecast horizon. The number of working-age adults in general will show slow growth. Hence, based solely on the demographics of Oregon, demand for public services geared towards children and young adults will likely decline or increase only at a slower pace, whereas demand for elderly care and services geared towards the older population will increase rapidly.

#### **Procedure and Assumptions**

Population forecasts by age and sex are developed using the cohort-component projection procedure. The population by single year of age and sex is projected based on the specific assumptions of vital events and migrations. The projection procedure entails the model that "survives" the initial population distribution by age and sex to the next age-sex category in the following year and then applies age-sex-specific birth and migration rates to the mid-period population.

The population by single age-sex detail from the 2020 census and the most recent estimated total population for Oregon by Population Research Center of Portland State University are the base for the

forecast. The numbers of births and deaths through 2024 are from Oregon's Center for Health Statistics. All other numbers and age-sex detail are generated by OEA.

Annual numbers of births are determined from the age-specific fertility rates projected based on Oregon's past trends and past and projected national trends. Oregon's total fertility rate is assumed to remain close to 1.4 per woman. This rate is well below the replacement level fertility of 2.1 children per woman during their reproductive life. Currently, all the states in the union are experiencing below replacement fertility levels. Such a low fertility rate means the state will experience population decline in the long run unless fertility rate improves, along with strong net positive migration to compensate for the loss due to excess of deaths over births.

Life Table survival rates are developed for the year 2020. Male and female life expectancies for the 2020-2035 period are projected based on the past three decades of trends and national projected life expectancies. After a sudden decline during the COVID pandemic, improvements in life expectancies are expected over the forecast period. At the same time, the difference between the male and female life expectancies will continue to shrink in the long run. The male life expectancy at birth was 77.3 and the female life expectancy was 81.8 in 2010. Because of the COVID-19 pandemic, the number of deaths suddenly increased, and the actual life expectancies declined. The life expectancy at birth in 2020 was 76.9 and 81.7 years for males and females, respectively. This is expected to improve to 80.6 years for men and 85.2 years for women by 2035.

Estimates and forecasts of the number of net migrations are based on the residuals from the difference between population change and natural increase (births minus deaths) in a forecast period. Migration forecasting considers employment change, unemployment rates, income/wage of Oregon and neighboring states and the nation, and Oregon's past population change and migration trends. Distribution of migrants by age and sex is based on detailed data from the American Community Survey. The role of net migration in Oregon's population growth has gained prominence as the natural increase has turned negative. Between 2025 and 2035 net migration is expected to be in the range of 17,700 to 26,500, averaging 24,000 persons annually with net migration rates ranging between 4.1 to 5.9 per thousand population.