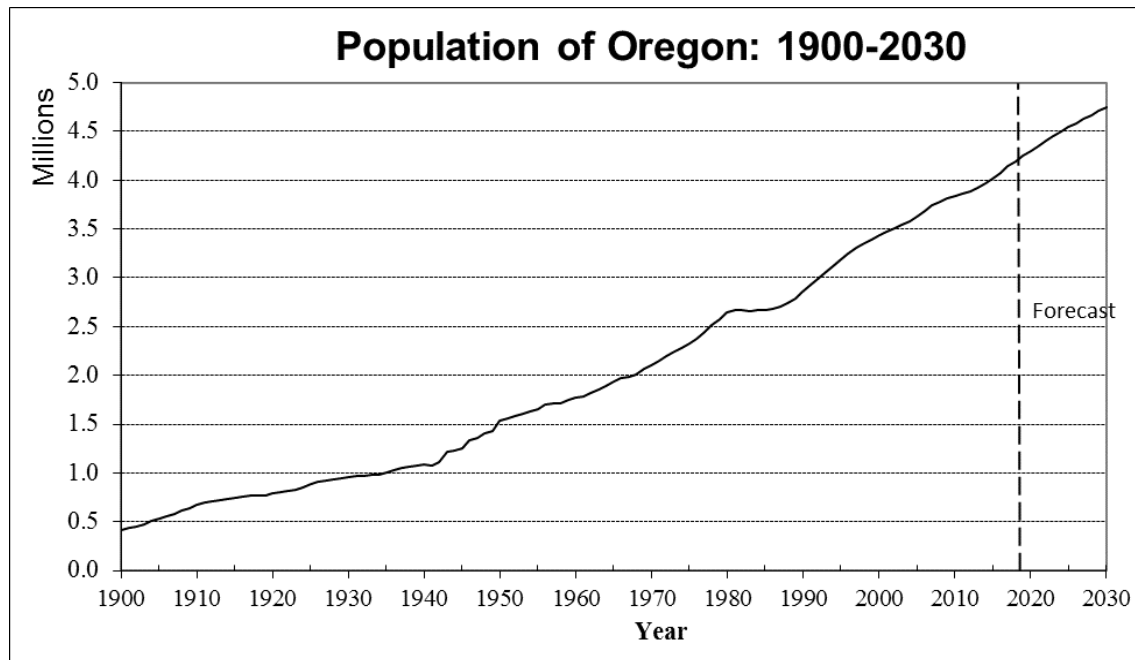


OREGON'S DEMOGRAPHIC TRENDS

Office of Economic Analysis
Department of Administrative Services
State of Oregon
July 2019

Contact: kanhaiya.L.VAIDYA@state.or.us

Oregon's population change

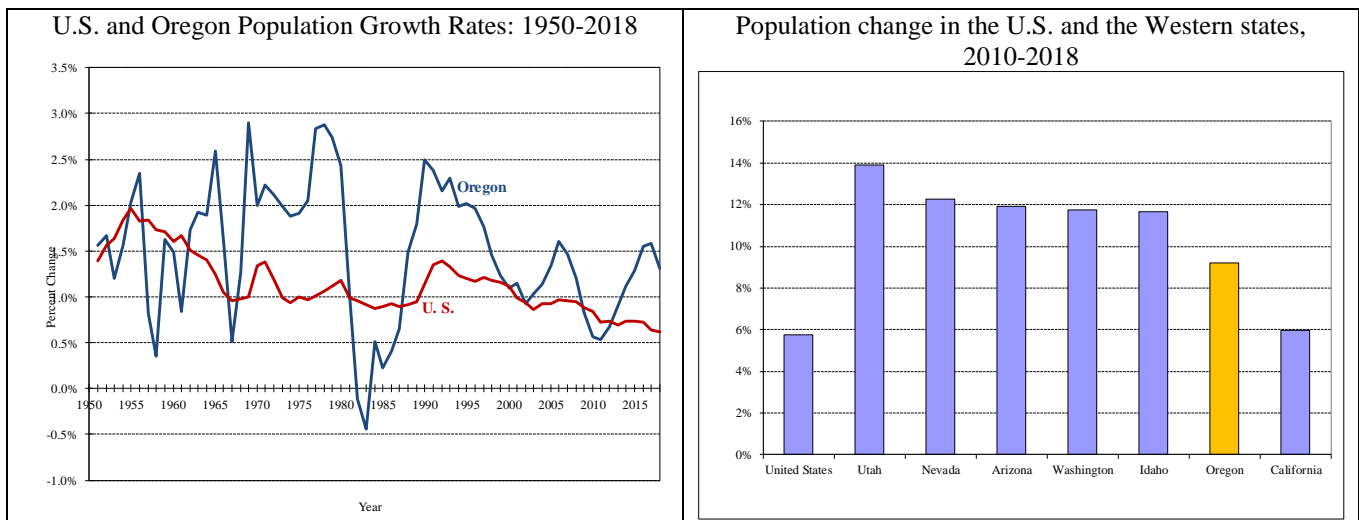


Source: U.S. Bureau of Census; and Oregon Office of Economic Analysis.

- Oregon's estimated population reached 4.195 million on July 1, 2018. This is an increase of 364,226 persons or 9.5 percent since the 2010 Census count. Population growth slowed in the years following the recession of 2009 and slow economic recovery following the recession. However, with the improving economy, population growth has picked up the speed in recent years. During the rapid economic expansion of 1990s, Oregon's population growth rate was 11th highest in the nation. That ranking dropped to 23rd between 2010 and 2013 reflecting the effect of the recent recessions. Oregon's ranking in terms of population growth rate in the nation has recovered tremendously since then. Currently, Oregon's growth rate ranks in the top 11th in the nation.
- Over the long run, Oregon has retained the distinction of being a major destination for migrants in the United States. Since 2010, 77 percent of the population growth was due to net in-migration. Oregon's population growth changes with its economic and employment outlook for the state and other competing states. The growth rate in the near future is expected to continue the path of decelerating growth. Oregon's population is expected to reach 4.744 million in 2030 with an annual average rate of growth approaching 1.0 percent.
- The population of Oregon increased by 11.8 percent during the 2000-10 decade, down from 20.0 percent increase during the preceding decade. Annual rate of growth declined from 1.8 percent during 1990s to 1.1 percent between 2000 and 2010 then to 1.1 percent between 2010 and 2018. In the last quarter century, Oregon's population growth slowed down considerably as the state's economy transitioned from boom to bust between 2009 and 2013. As the economy recovered, the annual growth rate climbed to 1.6 percent in 2016/17. A rapid

population growth like this is unsustainable in the long run. We have seen signs of slowing growth in the recent years that will continue in the future.

- High population growth rates during the decades of 70s and 90s were accompanied by economic expansion and transition in the state. The economy transitioned from traditional timber industry to manufacturing and high tech industry.
- In general higher population growth is associated with healthy economy characterized by higher employment and overall economic prosperity. Higher population growth facilitates, in general, supply side of the economy by providing much needed labor, and demand side of the economy by adding the consumers inside the state. Additionally, faster population growth also exert long-term effect on greater traffic congestion, expanding urban areas at the cost of diminishing agricultural land, greater demand for affordable housing, childcare services, and increased demand for public services, among others.

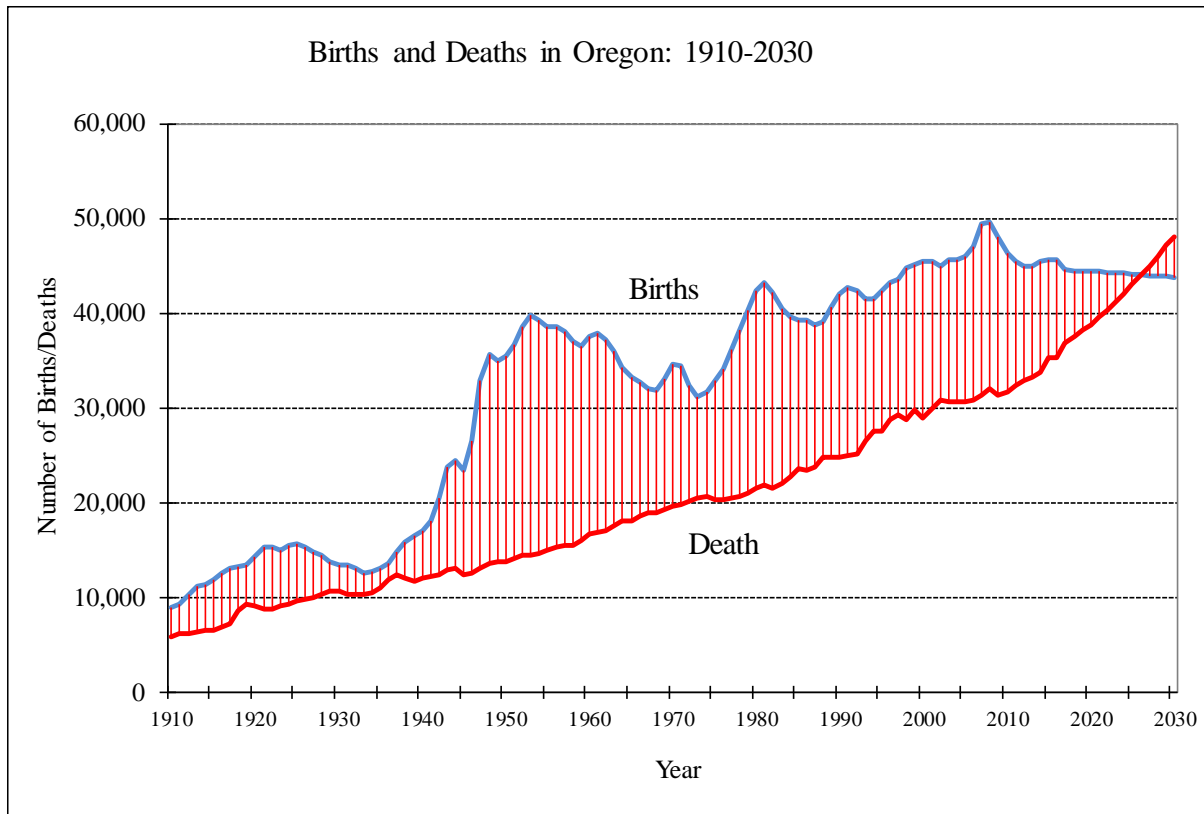


Source: U.S. Bureau of Census; and PRC/PSU.

- The chart above shows that Oregon's population, in general, has been increasing at a faster pace than the U.S. population as a whole. Between 1950 and 2018, Oregon's population increased by 174 percent, whereas U.S. population increased by 115 percent. Over a century since 1900, Oregon's population increased by tenfold, whereas U.S. population increased by fourfold.
- Oregon was hit harder by the recent recession than many other states. Since economy and migration are closely related, Oregon's population slowed down considerably due to the decline in in-migration as employment opportunities diminished and housing market collapsed. More recently, Oregon's annual population growth rate dipped below national average from 2008 through 2012. However, it has recovered to above national average since then.
- Although Oregon's population growth remains higher than U.S. rate and ranks fairly high (12th in 2010-18 period) in the national scale, growth in other western neighboring states, except California, outpaced the growth in Oregon.

- In the long run, Oregon's growth rate is expected to remain higher than the U.S. rate. However, the rate will trend towards the average for the U.S.

Components of population change



Source: U.S. Bureau of Census, Oregon Center for Health Statistics, and Oregon Office of Economic Analysis.

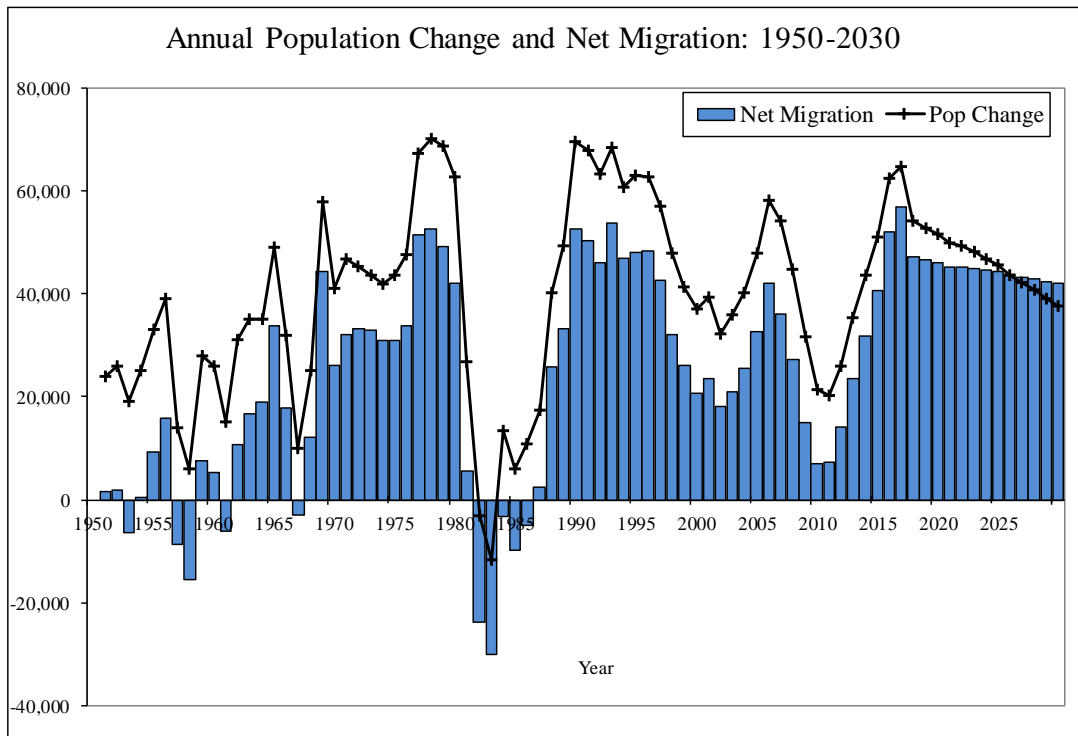
- Annual number of births in the past has fluctuated based on the fertility behavior of women and the number of women in child-bearing ages.
- Currently, about 44,500 children are born each year in Oregon. The annual number of births will approach 43,700 by 2030 as the fertility rate will slide lower despite the increase in the number of women in the child-bearing ages.
- Since 1950, the life-time average number of children per women (**Total Fertility Rate**) fluctuated from a high of 3.6 in 1960 to 1.7 in 1975. As couples choose to remain childless and women prefer to postpone childbearing to later ages because of lifestyle choices, the TFR is expected to remain slightly below 1.7 births per woman in the near future. The replacement level fertility is 2.1 children per woman – that is what it takes to replace a generation. Therefore, at the current TFR level, Oregon's population is bound to decline without supplemented by migration.

- Majority of births in Oregon occur to married women. Only about 36 percent mothers to newborn were unmarried in 2018. This out-of-wedlock births has been increasing steadily over time. About 30 percent of the mothers were unmarried in the year 2000.
- Birth to teenage mother affect physical and economic health of the baby and the mother alike. It is encouraging to note that the percentage of births to teenage mothers as well as the teenage fertility rate has been declining for decades. In 2000, 11.3 percent of all births were to teen mothers, which has declined to 4.4 percent in 2018. In the year 2000, there were 5,156 births to teen mothers. This number declined to 1,615 in 2018
- Historical knowledge of birth pattern is important and interesting because they shape the current and future age structure of the population. The huge number of births during the baby-boom period, that was preceded and again followed by smaller fertility and birth cohorts, for example, affected different familial, social and economic institutions in two extreme ways. These two extreme birth cohorts are currently responsible for shaping the old age, retirement age and older working-age population of Oregon.
- Although overall health condition has been improving and people are living longer, the number of deaths in Oregon has been increasing as the result of increased number of total as well as number of elderly populations. Currently, the number of deaths totals about 37,600 per year. As the baby boom generation age, the annual number of deaths will increase very rapidly and will exceed 48,000 by the year 2030.

Year	Male	Female	Difference (Female-Male)
1970	68.4	76.2	7.8
1980	71.4	78.8	7.4
1990	73.4	79.8	6.4
2000	75.8	80.3	4.5
2010	77.4	81.8	4.4
2020	78.3	82.5	4.2
2030	79.6	83.6	4.0

Sources: 1970 to 2000: U.S. Department of Health and Human Services, National Center for Health Statistics. 2010 through 2030: Oregon Office of Economic Analysis

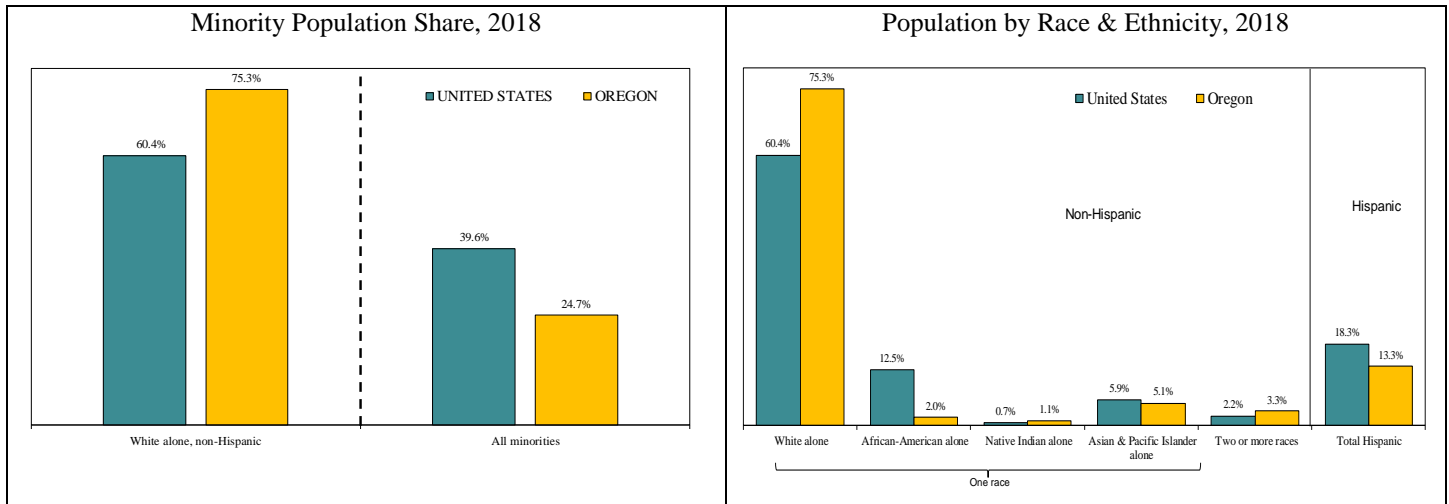
- In the past 40 years, between 1970 and 2010, life expectancy at birth in Oregon improved by 9.0 years for men and 5.6 years for women. Oregon’s life expectancy has remained slightly higher than the U.S. average. In general, women live longer than men. The life expectancies will continue to improve for both men and women. However, the rate of gain for men has been outpacing the gain for women. Consequently, the difference between women’s and men’s life expectancies has and will continue to diminish.



Source: U.S. Bureau of Census; and Oregon Office of Economic Analysis.

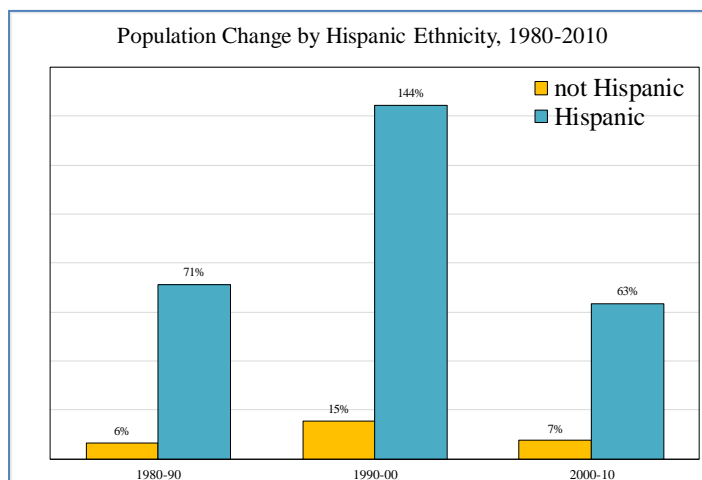
- Oregon's population change is greatly influenced by net migration. Migration in turn is affected by overall economy of the state. Because of the gloomy economic and employment situation in the state, migration flow slowed considerably between 2008 and 2013. Although the net migration did not turned negative, it came very close. Net migration volume since this recent recessionary period has bounced back quite impressively. The net migration of 56,900 in 2017 was the highest in the past 70 years.
- Currently, nearly 87 percent of population growth in Oregon is attributed to net in-migration. This shows the enormous role played by migration in our population growth and economy. For the years with positive population growth, the current ratio of net migration to population change was the highest in over 70 years. When Oregon economy was rapidly expanding during the 1990s, the average annual net migration of 41,500 accounted for nearly three-fourths of the population change. This share declined to 59 percent during the decade of 2000-10 averaging 24,800 annually. The contribution of migration in Oregon's population growth will play an enormous role once the natural increase (births minus deaths) is expected to turn negative in 2027. When it happens, then the entire increase in population will have to come from the migration component.

Race and Ethnicity



Source: U.S. Bureau of Census.

- With increasing population mainly due to in-migration, Oregon's population is getting increasing diverse in terms of race and ethnicity. Still, it is one of the least diverse states in the country. As shown in the chart above, 24.7 percent of Oregonians belonged to a minority race or ethnic group in 2018, compared to 39.6 percent in the United States.
- Of the non-Hispanic minority racial group in 2018, Asian and Pacific Islander is the largest in Oregon with 5.1 percent of the population, whereas African-American is the largest in the U.S. with 12.4 percent of the population.
- Hispanics or Latinos, regardless of race, make-up of the largest minority group in Oregon and the U.S. In 2018 accounted for 13.3 percent of Oregon's population. This is an increase from 2.5 percent 1980 and 8.0 percent in the year 2000. However, the share of Hispanic population in Oregon is still less than the share nationally. In 2018, nationally 18.3 percent of population were of Hispanic origin.

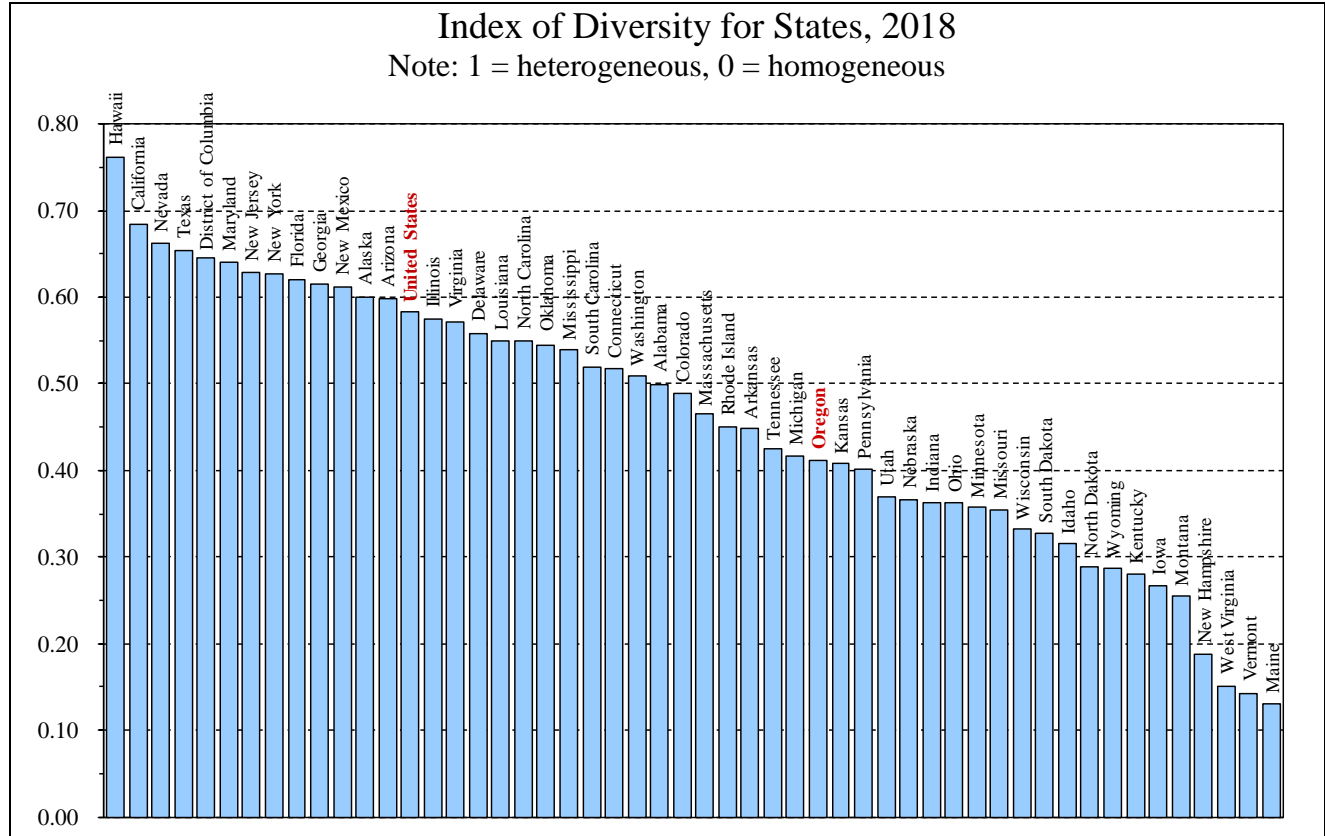


- The above chart shows the population growth by Hispanic ethnicity in Oregon for each of the three preceding decades. As shown, Hispanic population grew at much faster pace than non-Hispanic population. The decade of 1990s saw an exceptional increase in Hispanic population in Oregon. During this time, Hispanic population increased by 144 percent, compared to 15 percent increase in the non-Hispanic population. Since 1980, Hispanic population in Oregon increased by over eightfold, whereas non-Hispanic population increased by 1.3 times.
- Overall, Hispanic population in Oregon is the largest minority group and growing very rapidly. As shown in the left-side chart below, Hispanic population growth has been outpacing growth in all other racial groups. Since the year 2000, Hispanic population has doubled, and the Asian, Hawaiian and Pacific Islander (AHPI) as a group was not far behind. Since 2000, total Oregon's population increased by 22.2 percent, compared to 91.9 percent increase in AHPI and 100.0 percent increase in Hispanic populations.



Source: U.S. Bureau of Census.

- Hispanic population tends to be recent immigrants and is associated with higher fertility and larger family. Consequently, overwhelming proportion of them are children and young adults. As shown in the chart above (right), 35 percent of the Hispanic population were under the age of 18 in 2018 presenting its own challenge in K-12 education. In contrast, only 19 percent of the non-Hispanic population were under the age of 18. Nearly 79 percent of the Hispanic were under age of 45, compared to 54 percent of non-Hispanic population.
- Although minority population is increasing rapidly in Oregon adding to its diversity, the State still remains one of the less diverse in the country in terms of race and ethnicity, as shown in the following Index of Diversity chart. While Hawaii, California, and Nevada are most diverse states in the country, West Virginia, Vermont, and Maine are the least diverse states. Oregon falls in the group of 21 least diverse states.

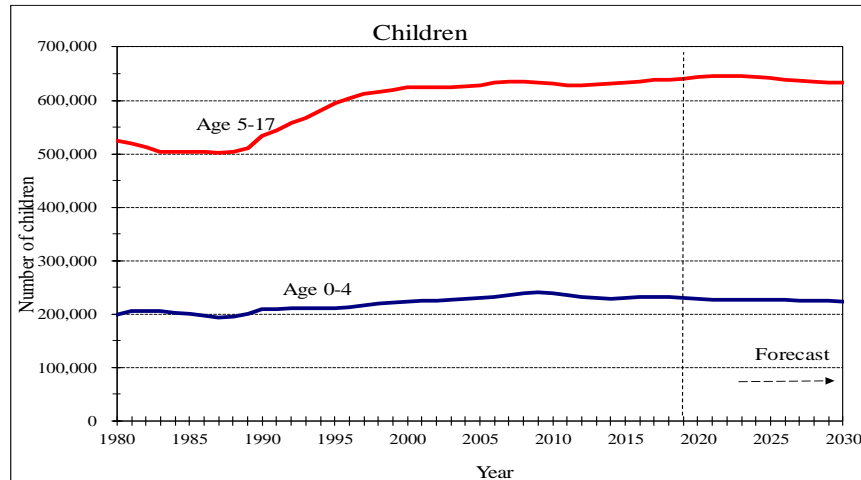


Source: U.S. Bureau of Census.

Population by Age

Children

- Rate of growth of the population of children in Oregon has been tracking well below the overall population growth rate. Main reasons for the slower growth are declining fertility rate and slower growth in the women in prime childbearing ages characterized by the baby-bust generation. The number of children under age five in 2018 was 5.5 percent of the total population, down from 7.6 percent in 1980 and 6.5 percent in 2000. The number of school-age 5-17 year old children was 15.4 percent of the population in 2018, down from 19.9 percent in 1980 and 18.2 percent in the year 2000. The percentage of children in Oregon's population has declined precipitously over the decades. This share will gradually decline over time to 4.7 percent for under age five children and to 13.3 percent for the school-age children by 2030.
- The school-age population aged 5-17 increased rapidly during the 1990s as the women of baby boom generation were becoming mothers and fertility rate recovered from the low of late 1960s and 1970s. The total number of children in Oregon has changed very little in the recent years. In the near future, the number of those children will actually decline by 2030.



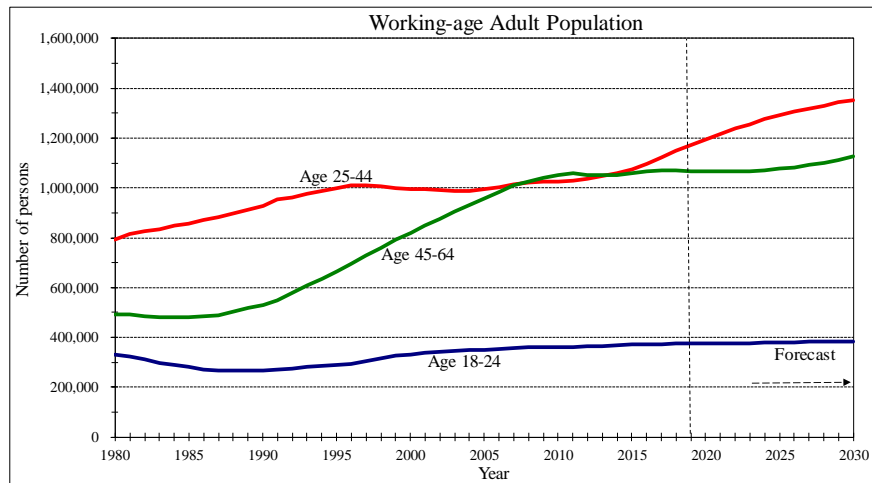
Source: U.S. Bureau of Census; and Oregon Office of Economic Analysis.

- The number of children in the population affects and is affected by social and economic behaviors of the adults. Also, the number affects budgetary, policy, and service delivery decisions. The number of children under 5 years of age requires affordable and quality daycare and Head Start services.
- In 2016, total K-12 enrollments accounted for about 96 percent of the school-age population who are enrolled in private or public schools. Of those who were enrolled, nearly 89 percent were enrolled in Oregon's public schools. The distribution of students in public, private, and home schools depends upon Oregon's economy and perception of the relative quality, value, and service of each school type.
- One of the long-term implications of the decline in the number of children is that we will have a decline in the homegrown workforce in the future. We will have to rely on in-migration to retain our existing number of workers.

Adults

- Adult population in age group 18-64 accounts for nearly 61.8 percent of the total population. This composition has changed very little since 1980 because the share of the children in the population has declined quite considerably, the percentage of elderly has increased to compensate for such the decline.
- Adults 18-64 year olds will grow at a slower pace than the overall population, thereby signaling possible labor shortage in the near future. For example, between 2018 and 2030, overall population will grow by 13.1 percent, whereas working-age adult population will increase by 10.4 percent.
- Population in age group 18-24, generally known as the college-age population, had fast paced growth during the 1990s and early 2000s mainly because of the children of baby-boomers entering this age group. However, growth has since tapered off and will see small or even negative growth at times in the future. Regardless of the growth trend of the young adult population, college enrollment typically goes up during the period of high unemployment. Young adults remain in colleges to continue their education or other adults

go back to colleges to better position themselves in the tough job market or if there is no better alternative.

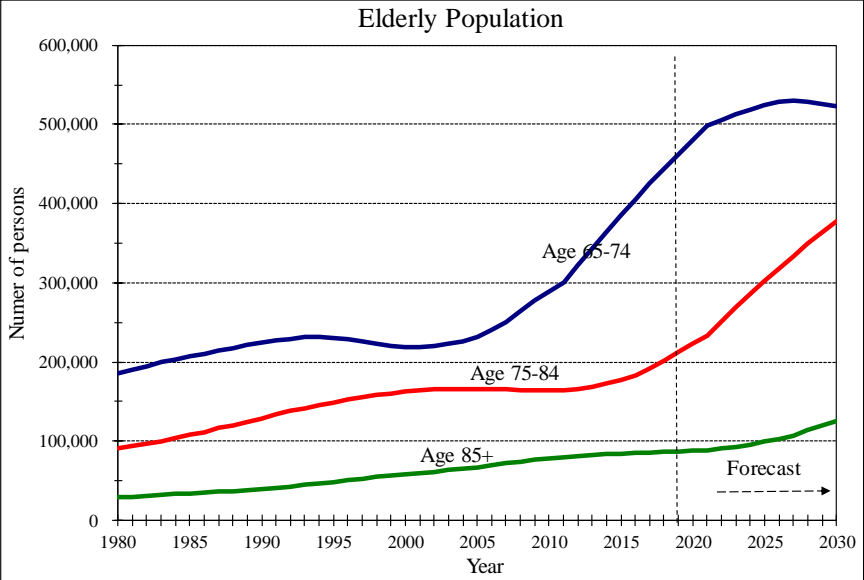
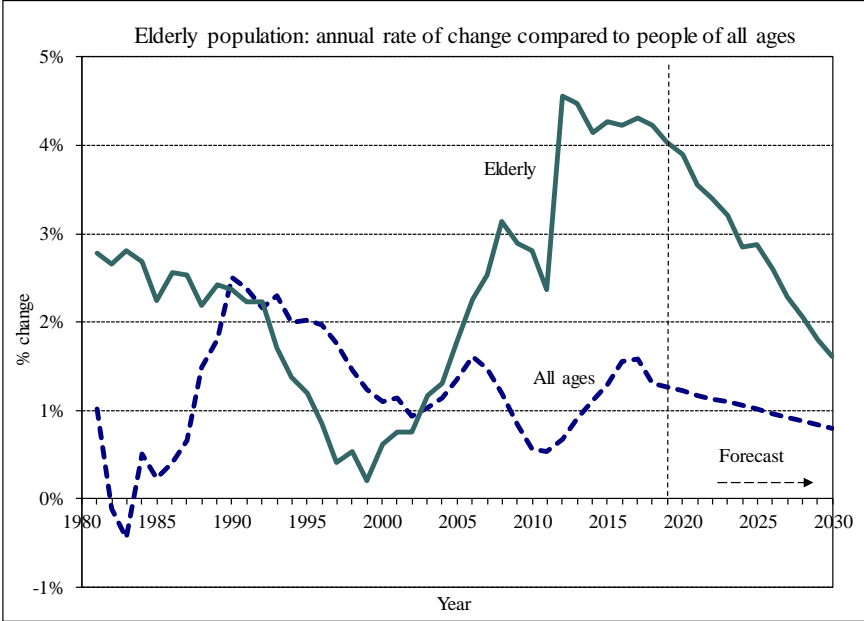


- Population in age group 25-44 has been in a growing mode after over a couple of decades of slow or even negative growth. The slow or negative growth in the past was because of the exiting baby-boomers from this cohort. However, the recent growth in the age group is due to the exit of the smaller baby-bust generation and the entry of the children of baby boomers into this age cohort. The younger adults in this age group are in early stage of career and family formation. Hence, they require good entry level jobs, affordable housing, and family friendly environment.
- Population in age group 45-64 was increasing very rapidly for a couple of decades before 2010 due to the impact of the baby-boomers entering this age cohort. However, the slow and negative growth of 25-44 age group has transitioned to this 45-64 age group as the baby-bust cohort enter this age group and the baby-boomers mature into the retirement age. This cohort has been experiencing very slow and negative growth and the trend will continue.

Elderly

- Slow growth of elderly population that began in 1995 lasted until 2003. Since then the elderly population growth is outpacing the overall population growth rate by wide margin due to the cohort change and the cumulative effect of net migration.
- The population in this age group will continue a dramatic increase as baby-boomers continue to enter the retirement age and the exit of smaller cohort born during the depression era. Beginning in 2011, the elderly population growth rate has exceeded 4 percent each year. As the high but slowing growth rate continues, there will be 40 percent more elderly in 2030 than in 2018.
- In the year 1980, 11.6 percent of the population were elderly age 65 and over. This percentage has increased to 17.5 percent in 2018 and will approach 22 percent by 2030. To simplify, about one in 10 persons were elderly in 1980. That will change to one in five in 2030.

- During the late 1990s, the youngest elderly population aged 65-74 actually declined despite a continued high net migration of people of all ages. The main reason was the depression era small birth cohort entering the retirement age. In the recent years, however, the youngest elderly population has been increasing rapidly. The depression era birth cohort matures into older age group and at the same time baby-boom cohort enters the retirement age that contribute to unusually high growth rate. At its peak in 2012, the youngest elderly grew by over 7.4 percent in one year. Between 2018 and 2030, this population will increase by 17 percent, whereas overall population will grow by 13 percent. Elderly population growth rate will taper off and turn to negative as the baby-boom cohort exit this cohort.



Source: U.S. Bureau of Census; and Oregon Office of Economic Analysis.

- The elderly population aged 75-84 was declining or growing at a very low rate during the 2000-2012 period due to the effect of entering depression era birth cohort. However, this age group has been and will continue a rapid growth trend in the future as the fast growing younger elderly from the baby-boom generation matures into this age group. Between 2018 and 2030, this population will increase by astounding 87 percent as the smaller cohort of people born during the depression era exit this age group and large baby-boom birth cohort continue to enter this age group.
- The oldest elderly population aged 85 and over is small but was growing at a very rapid pace during the past several decades as a result of aging and the life-time cumulative effect of migration. Currently, the growth rate has been slow and well below the state's overall population growth. However, this group will also see an increasingly fast growth as the baby-boom population enter this age group in just two years and at the same time people continue to live longer.
- As women live longer than men on average, sex-ratio at older age disproportionate favor one gender over the other. The females account for 54 percent of all the elderly population 65 years of age and older. However, among the oldest elderly aged 85+, 63 percent are females. In other words, there are 82 men for every 100 women for elderly aged 65 and older, compared to 59 men for every 100 women in 85 and older population.
- Oregon's population is graying. Median age of the population has increased from 30.3 years in 1980 to 39.4 years in 2018. This will increase further to 41.6 years by the year 2030. As the women live longer than men and there are disproportionate number of females at older ages, median age for women is higher than for men.

<u>Year</u>	<u>Male</u>	<u>Female</u>	<u>Total</u>
1980	29.5	31.0	30.3
1990	33.4	35.4	34.4
2000	35.2	37.6	36.4
2010	37.2	39.4	38.3
2017	38.3	40.2	39.2
2020	38.8	40.5	39.7
2030	40.9	42.3	41.6

Source: U.S. Bureau of Census; and Oregon Office of Economic Analysis.