



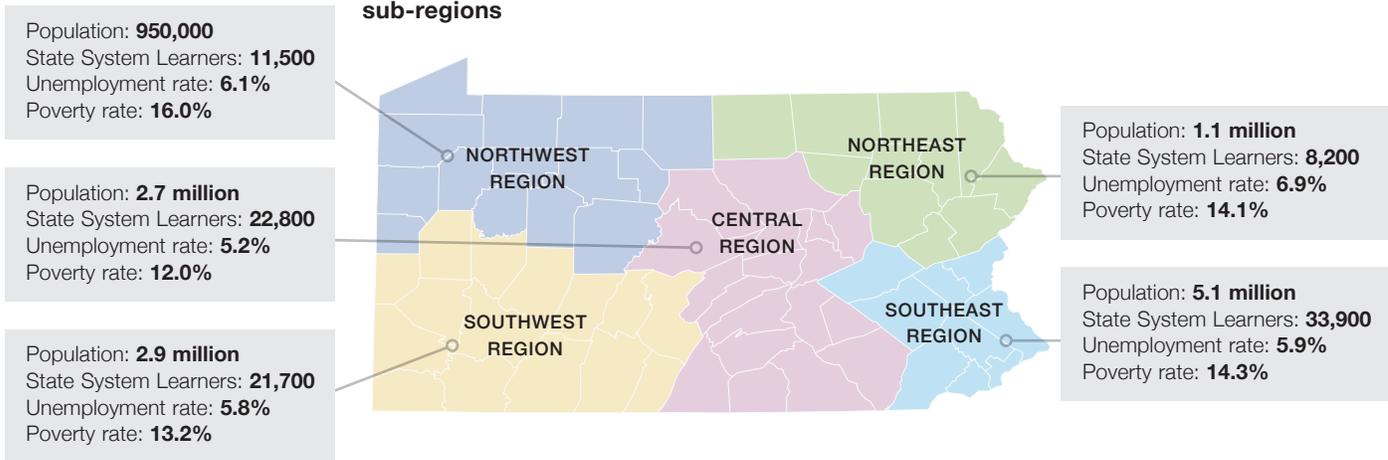
WORKFORCE CHARACTERISTICS HIGHLIGHTS

KEY FINDINGS:

PENNSYLVANIA'S SUB-REGIONS WORKFORCE CHARACTERISTIC REPORTS

The Workforce Characteristic Reports (WCR) identified the geographic coverage of Pennsylvania's sub-regions, forecasted industry growth and occupation demand for each sub-region, and identified the key demographic and educational attributes for each sub-region. This summary presents the findings for each respective sub-region: Central (CEN), Northeast (NE), Northwest (NW), Southeast (SE), and Southwest (SW).

Figure 1: Population, enrollment, and socioeconomic summary for Pennsylvania's sub-regions



Pennsylvania's sub-regions are diverse, and their workforce characteristics vary markedly.

- Pennsylvania's population is very diverse across the sub-regions. The largest and most diverse region is SE with 5.1 million people, of which 34% identified as minorities. NW is the smallest region, comprising 950,000 people, of which, 8% identified as minorities.
- Pennsylvania's 5.8% unemployment rate in 2014 was below the national average of 6.2%. However, sub-region variation in the unemployment rate indicates that NE and NW typically struggle with higher unemployment rates than other sub-regions, with both regions exceeding a 6.0% unemployment rate.
- The poverty rate in Pennsylvania in 2013 was 13.7%, which is below the national poverty rate of 15.8%. Again, some regions, such as SE and NW indicate higher poverty levels, with NW near the national poverty rate.
- SE contributes the largest share of learners in the State System, accounting for nearly 35% of State System enrollment. CEN and SW contribute 23% and 22% of State System learners, respectively.
- Notably, NW contributes an outsized share of State System learners. The region accounts for nearly 12% of State System enrollment but accounts for less than 8% of Pennsylvania's population.

6.9% to 5.2%
range of sub-region unemployment rates

16.0% to 12.0%
range of sub-region poverty rates



4% decline

in the 10- to 19-year-old cohort

8% increase

in the 25- to 34-year-old cohort

33% to 19%

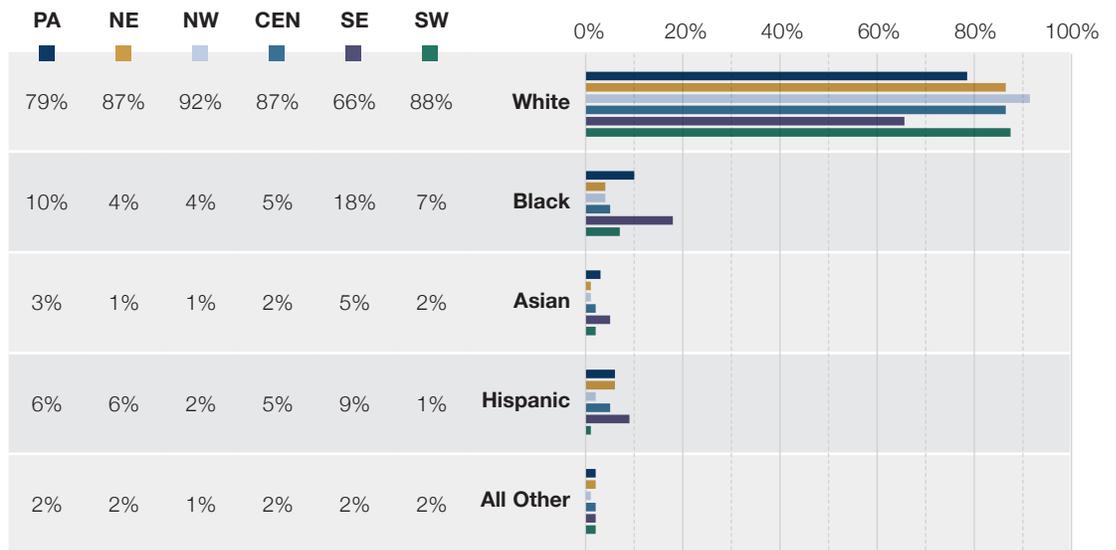
range of sub-region educational attainment of bachelor's degrees or above

2.3m to 366k

range of sub-region employment in 2014

- Traditional students (aged 18 to 22 years) comprise approximately 83% (90,966) of learners within the State System and Adult learners (aged 23 years and above) comprise about 17% (18,640) of State System learners.
- A view of the change in population by age demographic indicates a diminishing number in the traditional age cohort in the Commonwealth and a growing number of adults aged 25 to 34 years old. The 10- to 19-year-old cohort population declined by over 75,000 people between 2010 and 2014—a 4% decrease. Conversely, the 25-34-year-old cohort increased nearly 8%, or 113,000 people, over the same period. This demographic shift presents challenges and opportunities related to university recruitment strategy.
- Every region in the state exhibited the same pattern of 10 to 19-year-old cohort population declines, ranging from 1% in CEN to 8% in NE. Additionally, each region in the state exhibited the same pattern of 25-34-year-old cohort population increases, ranging from 4% in NW to 8% in SW.

Figure 2: Race/ethnicity distribution of the 25+ population for Pennsylvania's sub-regions



Pennsylvania and its regions exhibit high rates of postsecondary completions.

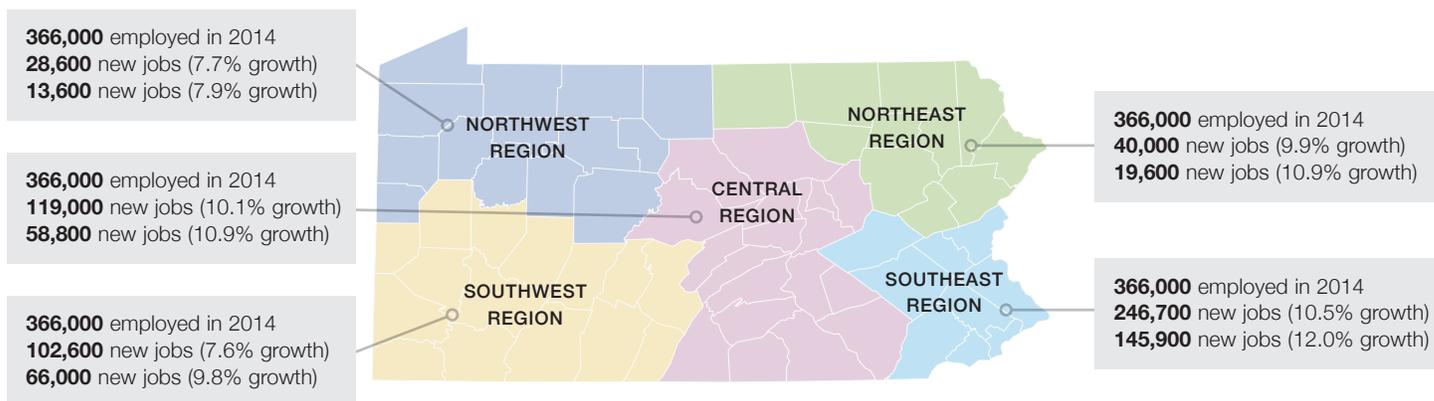
- When comparing degree completion, Pennsylvania (36%) is near the national average (37%) for the proportion of the population with an associate's degree, bachelor's degree, and master's degree or higher.
- At the regional level, SE is the most educated with 39% of its 25+ residents having an associate's degree or higher. NW shows the lowest rate of postsecondary education completions with 28% of its 25+ residents having an associate's degree or higher.
- SE also contributes the largest share of learners in the State System at 35%. CEN and SW contribute 23% and 22% of State System learners, respectively.



Growth industries will, in turn, hire people in a range of occupations.

- Some occupations are growing faster than others, creating more demand within the Pennsylvania economy. Projections indicate that occupations related to **healthcare, business, trade & transportation, education, and professional/technical services** are among the fastest growing, or will have high replacement demand due to retirement, out-migration or workforce leavers.
- In every region, skilled job growth* exceeds the growth in low-skilled jobs. Skilled job growth is the highest in SE and is projected to be 12% from 2014 to 2024, while skilled job growth in CEN and NE is projected to be nearly 11%.

Figure 5: Pennsylvania's sub-region employment and projected employment growth, 2014-2024



Key occupations within Pennsylvania show common themes as well as regional variations.

- Five key top skilled in-demand occupations were identified for each sub-region. Top skilled occupations typically require postsecondary education. While common themes emerged across the state, each region exhibits unique demand for specific skilled occupations, including:
 - **Registered nurses** in 5 regions: NE, NW, CEN, SE, SW
 - **Accountants and auditors** in 4 regions: NW, CEN, SE, SW
 - **General and operations managers** in 4 regions: NE, NW, CEN, SE
 - **Market research analysts and marketing specialists** in 4 regions: NE, CEN, SE, SW
 - **Computer systems analysts** in 3 regions: NE, SE, SW
 - **Civil engineers** in 1 region: SW
 - **Cost estimators** in 1 region: CEN
 - **Management analysts** in 1 region: NE
 - **Mechanical engineers** in 1 region: NW
 - **Medical and health services managers** in 1 region: NW

* Skilled occupations in the State System's Gap Analysis project are defined using terminology from the O*NET program. The O*NET program is the nation's primary source of occupational information. O*NET Job Zones range from 1 (lowest) to 5 (highest). To be considered skilled for the State System's Gap Analysis Project, an occupation must have an O*NET Job Zone code of 3, 4, and 5. Most occupations in Job Zone 3 require training in vocational schools, related on-the-job experience, or an associate's degree. Most occupations in Job Zone 4 require a four-year bachelor's degree, but some do not. Most occupations in Job Zone 5 require graduate school. For example, they may require a master's degree, and some require a Ph.D., M.D., or J.D.

IDENTIFYING SKILLED OCCUPATIONS

For this analysis a skilled occupation is defined as an occupation in O*NET Job Zones Three, Four or Five. Most occupations in Job Zone Three, Four, and Five require some level of postsecondary education.