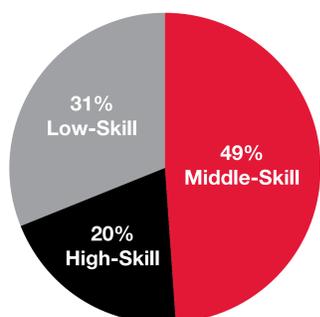




Career & Technical Education

Within the next decade nearly half of the employment opportunities in Nevada are projected to be categorized as “middle-skill” jobs—positions that require more education and training than a high school diploma but less than a four-year college degree. Despite open positions, unemployment and underemployment will persist if these middle-skill workers cannot be cultivated in sufficient numbers. Career readiness is generally assessed on three categories: academic knowledge, technical skills, and employability skills. While the first two categories are self-explanatory, the other two warrant a brief explanation. Employability skills refer to the suite of abilities seen as critical to success by employers; examples include critical thinking, adaptability, collaboration, responsibility and communications. Career and Technical Education (CTE), which in the past was alluded to as “vocational training,” is designed to address the second and third facets of career readiness.

Job openings by skill level in Nevada 2010-20



NEVADA FACTS & STATISTICS

- CTE programs in Nevada are organized into 15 career clusters and 75 distinct pathways.
- Within CTE-focused high schools, graduation rates (84 percent) were significantly higher than the overall high school graduation rate average.
- 91 percent of CTE high school graduates met performance goals for reading/language arts, while 89 percent met mathematics goals.
- 97 percent of CTE postsecondary students proceeded to the workforce, military or an apprenticeship.
- Projected demand in Nevada for middle-skill jobs through 2020 is equal to demand for high- and low-skilled employees combined.

U.S. FACTS & STATISTICS

- Apprenticeship is widely considered the oldest form of CTE in the United States, dating from colonial times.
- The first dedicated vocational school opened in 1823, immediately sparking broad acceptance of the adoption of this educational model.
- A 2006 federal act authorized federal funding for CTE nationally; however, the allocation formula does not favor Nevada, which receives among the lowest annual allocations.
- The 2006 legislation was reauthorized in 2016 as the Strengthening Career and Technical Education for the 21st Century Act.

RECENT ACTIONS IN NEVADA

- Allocations from the federal fund for FY 2017 are overseen by the Nevada Department of Education, Office of Career Readiness, Adult Learning & Education Options.
- As of academic year 2013-14, Nevada had 55,076 participants in secondary CTE programs and another 27,265 in postsecondary CTE programs. For context, California has a combined 1.9 million participants in its secondary/postsecondary CTE programs.
- In 2016, the Nevada State Board of Education approved the Nevada CTE Quality Program Standards, establishing specific responsibilities for students, teachers, counselors and administrators for maintaining effective CTE programs.

CONSIDERATIONS FOR FUTURE ACTIONS

- CTE programs have proven highly effective, both in terms of creating career-ready individuals and supporting the state’s goal of improving high school graduation rates. To build upon this success and address the current and widening middle-skill jobs gap, leadership is encouraged to explore a number of measures, including:
- Ensure the availability of adequate funding for CTE programs at both the secondary and postsecondary levels.
 - Invest in the expansion of existing CTE programs based upon projected areas of demand.
 - Increase emphasis on digital literacy skills within CTE programs.
 - Develop assessments to measure career and college readiness before 12th grade.
 - Create comprehensive CTE work-based learning methods based upon successful models.
 - Implement outreach programs that cultivate interest in CTE programs within Nevada middle schools.

STATEWIDE BENEFITS OF FUTURE ACTION

- An increased pool of credentialed, mid-skill workers will close the existing middle-skill jobs gap, creating more and better-paying jobs for Nevada residents.
- CTE is associated with higher graduation and employment rates, reducing dependence upon government assistance programs.
- Developing certified, qualified professionals with both technical and employability skills will position Nevada as an attractive locale for business investment.

IMPLICATIONS OF MAINTAINING STATUS QUO

- Given the significantly higher graduation rates among high school students in secondary CTE programs, failure to expand the use of this model will inhibit overall progress in terms of overall graduation rates.
- The fields with the greatest CTE participation are technology & communications, health science, and hospitality & tourism. To the extent that enrollment in these programs does not increase to match business demand for professionals in these fields, a persistent skills gap is likely to remain and impair economic growth.
- The impending retirement of baby boomers, coupled with technological innovation, is expected to widen the middle-skill jobs gap; a lack of employees in relevant technical positions puts Nevada at a severe economic disadvantage.

CTE Participants in Western States (Academic Year 2013-14)

	Secondary		Postsecondary	
Rank	State	Participants	State	Participants
1	CA	970,235	CA	942,427
2	WA	305,383	WA	176,248
3	UT	102,758	AZ	123,515
4	CO	96,037	OR	65,827
5	AZ	94,269	UT	65,000
6	ID	83,026	NM	53,890
7	NM	58,594	CO	51,182
8	NV	55,076	NV	27,265
9	OR	46,642	MT	14,169
10	HI	27,017	WY	13,555
11	AK	13,418	HI	9,714
12	MT	10,467	ID	7,053
13	WY	8,653	AK	7,006



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