2020

Labor Markets in New Mexico's Career and Technical Education Region J



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NS4ED

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Region J

Introduction

Career Technical Education (CTE) provides students of all ages with the academic and technical skills necessary to succeed in future careers and to become lifelong learners. In total, about 12.5 million high school and college students are enrolled in CTE across the nation. Funded by the Carl D. Perkins Career and Technical Education Act (Perkins), CTE prepares these learners for the world of work by introducing them to workplace competencies, and makes academic content accessible to students by providing hands-on experiences in various industry sectors.¹

More than 62,000 New Mexico students are enrolled in CTE programs, and more than 17,000 are "concentrators," who take two or more CTE courses. CTE Concentrators graduate high school at a rate more than 23 percentage points higher than the general student body. More than half of the state's community college students are enrolled in CTE programs, with more than 33,000 concentrating in CTE fields.

Federal legislation requires a Comprehensive Local Needs Assessment for proposed CTE programs, and the New Mexico Public Education Department commissioned this initiative to provide parameters and guidance to CTE program applicants. Our intention is to provide intelligence on regional labor markets and economic trends to inform CTE strategies that make high-quality career opportunities more available to the students we serve.

The Region

Region J comprises a number of school districts and charter schools:

- Gadsden Independent
- Hatch Valley

- Las Cruces
- State Charter-Las Montañas

Regional Education Cooperatives (REC) REC exists to provide educational services to students, staff, and families of the member districts and communities. REC's provide ancillary support and technical assistance in implementing federal and state statutes and regulations; professional development; and support for members in meeting the Public Education Department's requirements The Region is served by REC #10.

Four postsecondary institutions serve the area, including New Mexico State University. The districts lie primarily in Luna and Doña Ana Counties, both of which are within the Southwestern Workforce Region.

 $^{^1\,}https://webnew.ped.state.nm.us/bureaus/college-career-readiness/career-technical-education/$

The Key Findings

The People

- CTE Region J has seen uneven population trends over recent years, with Doña Ana County experiencing 3.5% net positive growth since 2010 and Luna County declining by 4.5%.
 Combined, the region's population has increased 2.7% since that time.
- It is notable that the population of the region is aging. The youngest age bands have all declined in recent years, while the number of those 65 years and older has increased dramatically (27.3%) since 2010.
- More than 46% of the population in the region has either a high school diploma and no college experience or some college experience and no degree.
- The percentage who hold a bachelor's degree or higher (25.2%) is significantly lower than the national average of 30.9%.

The Employers

The largest industries in the region are

- 1. Government and Government Enterprises
- 2. Health Care and Social Assistance
- 3. Retail Trade
- 4. Accommodation and Food Service
- 5. Administrative and Support and Waste Management and Remediation
- 6. Construction

One of the unique characteristics of this region is the concentration of the *Home Health Care Services* and *Services for the Elderly and Persons With Disabilities industries*. This region's workers are concentrated in the former at a rate more than three times the national average and in the latter at a rate more than double the average. Within the manufacturing sector, the Fruit & Vegetable Canning/Picking/ Drying industry employs the regional workforce at more than 10 times the national rate.

According to the New Mexico Department of Workforce Solutions, there are nine organizations in the region who employ more than 500 workers.

- Doña Ana County
- New Mexico State University
- Peak Behavioral Health
- Addus Health Care
- Walmart Supercenter

- Mountain View Regional Medical Center
- Keystone Consolidated Industries
- Memorial Medical Center
- New Mexico State University-Las Cruces

The Jobs

The occupation families with the largest projected growth include:

- 1. Personal Care and Service Occupations (1,423 new jobs)
- 2. Health Care Practitioners and Technical (913)

- 3. Health Care Support (777)
- 4. Transportation and Material Moving (559)
- 5. Office and Administrative Support (501)
- 6. Management (330)

This report also sought to identify "Quality Careers," which are projected to grow significantly in coming years in this region and which typically pay higher-than-average wages.

Several of these Quality Careers were from the Health Sciences cluster, including Registered Nurses (\$66,411, 370 new jobs), Physical Therapists (\$99,311, 97) and Radiologic Technologists (\$56,231, 28). Other occupations came from the Management cluster, including Medical and Health Services Managers (\$94,219, 46). Several were in the Business & Financial Operations cluster, including Accountants/ Auditors (\$52,407, 8), Human Resources Specialists (\$45,586, 61) and Compliance Officers (\$81,309, 19).

The Observations

This report identifies three segments of the regional economy which can serve as a starting point for conversations about the region's economic priorities.

Health Care

Ten of the region's largest-growth occupations are from the Health Care Practitioners and Technical Occupations family or the Health Care Support Occupations family. Health Care businesses employ more than 15,000 people, and many of these jobs pay higher-than-average wages. Five different pathways provide a spectrum of career opportunities:

- Therapeutic Services
- Health Informatics
- Diagnostic Services

- Biotechnology Research and Development
- Support Services

Another career, Medical and Health Services Managers is one of the region's highest-paying fields and is projected to grow by 36% in the coming years.

Business Management

A number of business and financial careers were profiled in this report, including Financial Managers, Construction Managers and Medical, Marketing Research Analysts, Human Resources Specialists and Health Services Managers. These careers are crucial to many of the region's most critical industries. Professional, Scientific and Technical Services, Hospitals and Construction.

Computer Occupations

Several careers from the IT Cluster are among the region's highest-quality careers, offering both growing demand and high income potential. Among those careers are Applications Developers, Information Security Analysts and Network Support Specialists.

Others

Other areas that were considered for this recommendation, but ultimately not included were:

- Public Administration
- Transportation and Warehousing

The People

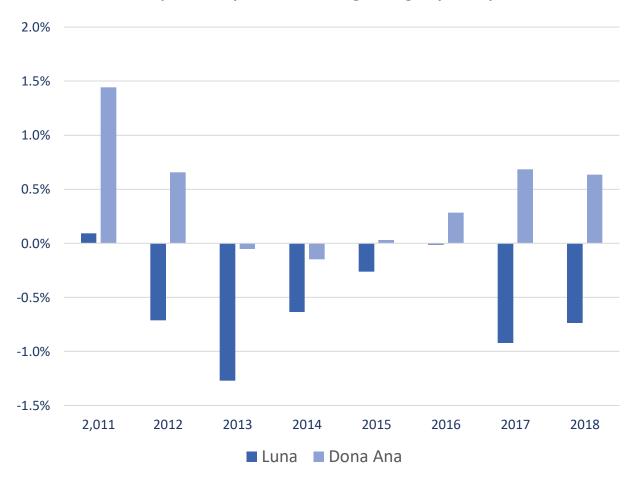
Population

There are 11,671 students enrolled in grades 9-12 across the region's five school districts. Trends in the region's population will have an obvious effect on enrollment and warrants regular analysis. CTE Region J has seen uneven population trends over recent years, with Doña Ana County experiencing 3.5% net positive growth since 2010 and Luna County declining by 4.5%. Combined, the region's population has increased 2.7% since that time.

Table 1: Population by County, 2010-2018:

Year	2010	2011	2012	2013	2014	2015	2016	2017	2018
Luna	25,082	25,105	24,926	24,607	24,448	24,382	24,379	24,148	23,963
Doña Ana	210,097	213,127	214,507	214,394	214,084	214,151	214,748	216,186	217,522

Population, by Annual Percentage Change, by County

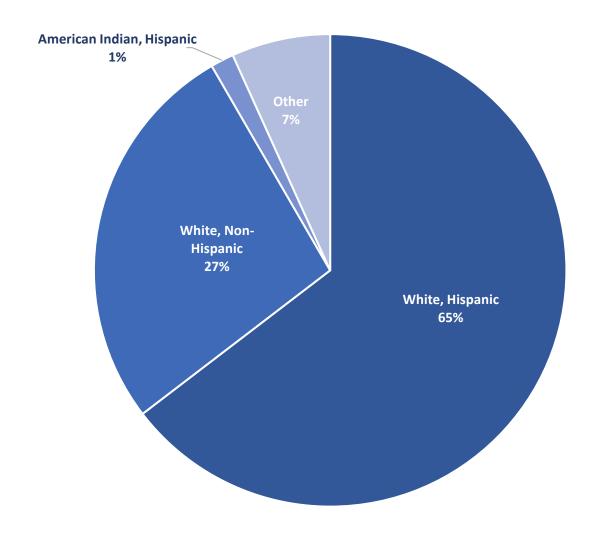


Demographics-Race and Ethnicity

Table 2: Region J Population, by Race and Ethnicity:

Race/Ethnicity	2010 Population	2018 Population	Change	% Change	2018 % of Total
White, Hispanic	146,177	156,574	10,397	7.1%	64.84%
White, Non-Hispanic	72,301	65,517	(6,784)	-9.4%	27.13%
American Indian, Hispanic	3,364	3,865	501	14.9%	1.60%
Black, Non-Hispanic	3,044	3,732	688	22.6%	1.55%
Other, Hispanic	5,035	5,787	752	14.9%	2.40%
Other	6,045	6,875	830	13.7%	2.85%

United States Census Bureau, Annual Population Estimates



Demographics-Age

It is notable that the population of the region is aging. The youngest age bands have declined in recent years, while the number of those 65 years and older has increased dramatically (27.3%) since 2010.

Table 3: Region J Population, by Age:

Age Cohort	2010 Population	2018 Population	Change	% Change	2018 % of Cohort
Under 10	34,483	32,585	(1,898)	-5.5%	13.5%
10-19	37,376	35,765	(1,611)	-4.3%	14.8%
20-29	37,360	41,712	4,352	11.6%	17.3%
30-39	26,857	28,237	1,380	5.1%	11.7%
40-49	27,788	24,653	(3,135)	-11.3%	10.2%
50-64	40,370	39,148	(1,222)	-3.0%	16.2%
65+	30,946	39,390	8,444	27.3%	16.3%

United States Census Bureau, Annual Population Estimates

Demographics-Educational Attainment

Table 4: Region J Population by Educational Attainment:

Education Level	Population				
Less than 9 th Grade	14.8%				
9 th Grade to 12 th Grade	8.5%				
High School Diploma	23.1%				
Some College	21.3%				
Associate's Degree	7.2%				
Bachelor's Degree	15.3%				
Graduate Degree or Higher	9.7%				

United States Census Bureau, American Community Survey

More than 46% of the population in the region has either a high school diploma and no college experience or some college experience and no degree.

The percentage who hold a bachelor's degree or higher (25.2%) is significantly lower than the national average of 30.9%.

The Employers

To gain perspective on the businesses who employ workers in CTE Region J, we look at data from the New Mexico Department of Workforce Solutions, in particular the *Quarterly Census of Employment and Wages*. Data from that instrument are organized according to the *North American Industry Classification System (NAICS)*, in which businesses are categorized by their primary lines of business into general industry sectors, then subdivided into more granular industry definitions. For this report, we look first at the general industry sectors, then at the detailed industries they include.

An Employment Location Quotient is an indexed value that illustrates the concentration of an industry in a particular location. An LQ of 1.0 indicates that employment in the target industry is exactly equal to the national average. An LQ of 2.0, then would indicate that employment in the target industry is double the national average.

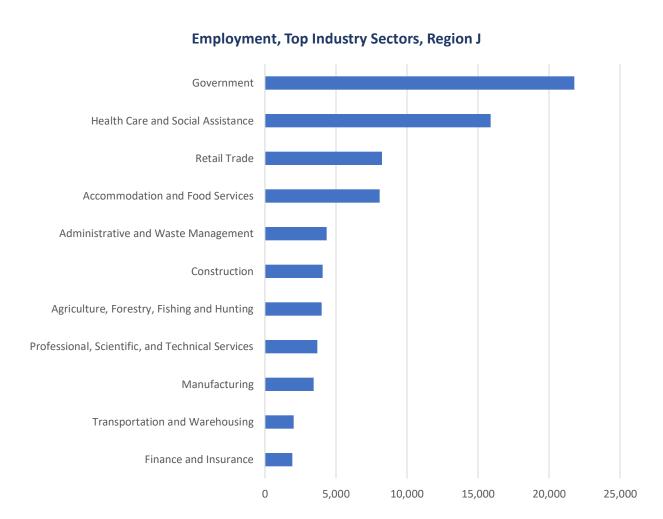


Table 5: Components of Top Industry Sectors, Region J:

Sector/Top Detailed Industries	2019 Jobs	Average Wages	Location Quotient
Government			
Education (Local Government)	5,973	\$40,241	1.37
Education (State Government)	5,502	\$35,364	3.63
Local Government, Excluding Education and Hospitals	3,968	\$42,360	1.26
Federal Government, Civilian, Excluding Postal Service	3,516	\$92,692	2.79
Health Care and Social Assistance			
Home Health Care Services	2,896	\$16,022	3.53
Services for the Elderly and Persons with Disabilities	2,641	\$17,333	2.47
General Medical and Surgical Hospitals	2,562	\$58,589	0.98
Offices of Physicians	1,872	\$68,678	1.29
Child Day Care Services	884	\$20,656	1.72
Nursing Care Facilities (Skilled Nursing Facilities)	790	\$33,591	0.90
Construction			
Residential Building Construction	599	\$39,946	1.31
Plumbing, Heating, and Air-Conditioning Contractors	594	\$42,164	0.94
Electrical Contractors and Other Wiring Installation Contractors	509	\$40,067	0.95
Site Preparation Contractors	397	\$44,163	2.02
Commercial and Institutional Building Construction	358	\$45,596	0.95
Other Heavy and Civil Engineering Construction	256	\$55,987	3.81
Agriculture, Forestry, Fishing and Hunting			
Support Activities for Crop Production	1,809	\$23,175	6.68
Crop Production	1,670	\$28,340	5.57
Animal Production	476	\$31,174	3.27

Sector/Top Detailed Industries	2019 Jobs	Average Earnings	Location Quotient
Professional, Scientific and Technical Services			
Computer Systems Design and Related Services	767	\$59,899	0.64
Engineering Services	745	\$71,983	1.36
Testing Laboratories	381	\$61,511	3.97
Accounting, Tax Preparation, Bookkeeping, and Payroll Services	287	\$36,729	0.51
Offices of Lawyers	268	\$53,199	0.46
Research-Development-Physical, Engineering, and Life Sciences	248	\$91,019	0.70
Manufacturing			
Fruit and Vegetable Canning, Pickling, and Drying	480	\$31,226	10.65
Aerospace Product and Parts	292	\$110,652	1.02
Navigational, Electromedical, and Control Instruments	290	\$63,296	1.27
All Other Wood Products	191	\$29,092	5.06
Seasoning and Dressing	189	\$39,570	8.02

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Detailed Industries by County

It is also instructive to look at detailed industries in each of the counties that make up this CTE Region. In our quest to prioritize industries and occupations, one of the most valuable pieces of intelligence we can utilize is industry employment data.

Table 6: Employment by Industry, Doña Ana County, 2019:

Doña Ana	2019 Jobs	Average Wages/ Earnings	Location Quotient	Age 45+
Local Government, Excluding Education and Hospitals	644	\$36,294	2.21	46.1%
Education (Local Government)	596	\$40,059	1.48	48.0%
Restaurants and Other Eating Places	529	\$12,196	0.97	24.0%
Support Activities for Crop Production	441	\$18,362	17.69	60.3%
Federal Government, Civilian, Excluding Postal Service	410	\$108,015	3.54	44.1%
Fruit and Vegetable Canning, Pickling, and Drying	406	\$31,252	97.96	48.8%
Home Health Care Services	368	\$15,030	4.87	55.2%
Merchandise Stores, Warehouse Clubs and Supercenters	312	\$24,690	3.14	37.2%
State Government, Excluding Education and Hospitals	258	\$52,238	2.24	42.6%
General Medical and Surgical Hospitals	242	\$52,290	1.01	48.8%

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Table 7: Employment by Industry, Luna County, 2019:

Luna	2019 Jobs	Average Wages/ Earnings	Location Quotient	Age 45+
Local Government, Excluding Education and Hospitals	644	\$36,294	2.21	46.1%
Education (Local Government)	596	\$40,059	1.48	48.0%
Restaurants and Other Eating Places	529	\$12,196	0.97	24.0%
Support Activities for Crop Production	441	\$18,362	17.69	60.3%
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The Jobs

Another instrument of the New Mexico Department of Workforce Solutions that provides valuable perspective on career opportunities in this region is the *Occupational Employment Statistics* Series. Employment and wages are estimated for more than 750 occupation categories, and to evaluate growth in demand for particular occupations, we look to the occupations with the largest growth since 2010.

Table 9: Occupation Employment, Region J, 2010-2019:

Description	2010 Jobs	2019 Jobs	2010 - 2019 Change	2010 - 2019 % Change	Annual Openings	Median Annual Earnings
Personal Care Aides	1,238	3,368	2,130	172%	572	\$19,373
Food Prep/Serving Workers, Fast Food	2,109	2,909	800	38%	546	\$19,168
Customer Service Representatives	1,225	1,875	650	53%	290	\$23,996
Registered Nurses	1,217	1,549	332	27%	112	\$66,411
Home Health Aides	720	1,052	332	46%	165	\$18,398
Cooks, Restaurant	606	861	255	42%	133	\$21,162
General and Operations Managers	969	1,136	167	17%	114	\$74,746
Sales Representatives, Services, All Other	167	319	152	91%	49	\$40,223
Construction Laborers	685	828	143	21%	101	\$30,640
Medical Assistants	538	680	142	26%	83	\$25,679
Waiters and Waitresses	1,588	1,728	140	9%	356	\$19,066
Supervisors-Food Preparation and Serving	528	661	133	25%	108	\$26,862
Nursing Assistants	649	776	127	20%	97	\$24,169
Training and Development Specialists	239	360	121	51%	43	\$30,499
Retail Salespersons	2,447	2,563	116	5%	414	\$22,779
Medical Secretaries	429	534	105	24%	67	\$25,231
Laborers Freight, Stock, and Material Movers	769	866	97	13%	124	\$23,625
Light Truck or Delivery Services Drivers	439	532	93	21%	65	\$28,185
Insurance Sales Agents	164	252	88	54%	36	\$40,601
Stock Clerks and Order Fillers	1,115	1,196	81	7%	170	\$23,509
Protective Service Workers, All Other	71	145	74	104%	36	\$32,901
Farmworkers, Ranch, & Aquacultural Animals	322	395	73	23%	77	\$21,504
Food Servers, Nonrestaurant	147	217	70	48%	37	\$19,184
Bartenders	195	262	67	34%	50	\$18,208

Many factors go into an evaluation of a career's potential, including demand and earning potential. The New Mexico Department of Workforce Solutions also projects changes in total employment for every occupation by 2026. The occupations that are projected to experience the largest growth and that pay wages above the average in Region J are categorized here as high-quality careers, and detailed occupations are grouped into general "occupation families."

Table 10: Projected Change, Occupations, 2016-2026, Region J:

High Quality Career	2016 Jobs	2026 Jobs	New Jobs	% Change	Annual Openings	Average Earnings		
Health Care Practitioners and Technical Occupations								
Registered Nurses	1,489	1,859	370	25%	124	\$66,411		
Physical Therapists	147	244	97	66%	18	\$99,311		
Speech-Language Pathologists	106	184	78	74%	15	\$81,080		
Licensed Practical and Licensed Vocational Nurses	214	284	70	33%	26	\$46,752		
Nurse Practitioners	103	157	54	52%	13	\$121,893		
Occupational Therapists	62	106	44	71%	9	\$99,316		
Radiologic Technologists	163	191	28	17%	13	\$56,231		
Respiratory Therapists	63	91	28	44%	7	\$49,150		
Surgical Technologists	70	86	16	23%	8	\$55,253		
Physician Assistants	34	49	15	44%	4	\$126,677		
Office and Administrative Support								
Supervisors-Office and Administrative Support	848	948	100	12%	108	\$44,586		
Human Resources Assistants	78	70	(8)	(10%)	8	\$36,786		
Management								
Medical and Health Services Managers	129	175	46	36%	16	\$94,219		
Financial Managers	139	170	31	22%	15	\$87,667		
Computer and Information Systems Managers	78	98	20	26%	9	\$94,804		
Education Administrators	184	201	17	9%	18	\$90,174		

High Quality Career	2016 Jobs	2026 Jobs	New Jobs	% Change	Annual Openings	Average Earnings
Business and Financial Operations						
Human Resources Specialists	193	254	61	32%	29	\$45,586
Market Research Analysts and Specialists	115	174	59	51%	21	\$50,268
Management Analysts	147	183	36	24%	19	\$67,501
Logisticians	39	66	27	69%	8	\$69,916
Compliance Officers	168	187	19	11%	18	\$81,309
Accountants and Auditors	446	454	8	2%	44	\$52,407
Computer Occupations						
Software Developers, Applications	125	185	60	48%	17	\$60,275
Software Developers, Systems Software	407	452	45	11%	38	\$89,846
Computer Systems Analysts	149	184	35	23%	16	\$67,739
Network and Computer Systems Administrators	128	140	12	9%	11	\$65,293
Computer Network Support Specialists	130	141	11	8%	13	\$50,981
Operations Research Analysts	121	131	10	8%	10	\$95,234
Construction						
Operating Engineers, Equipment Operators	231	295	64	28%	38	\$38,923
Supervisors-Construction Trades and Extraction	297	324	27	9%	36	\$52,661
Carpenters	254	276	22	9%	31	\$37,792
Plumbers, Pipefitters, and Steamfitters	207	207	0	0%	25	\$49,634
Production						
Supervisors-Production and Operating Workers	190	203	13	7%	22	\$51,688
Welders, Cutters, Solderers, and Brazers	124	136	12	10%	16	\$43,803
Power Plant Operators	22	29	7	32%	3	\$74,743
Aircraft Structure, Rigging, Systems Assemblers	24	26	2	8%	2	\$109,380

The Talent Development Ecosystem

Assets

CTE Region J is served by Regional Education Center (REC) #10. Postsecondary educational institutions in the region include New Mexico State University-Main and Doña Ana Campuses, the Massage Therapy Training Institute and the Burrell College of Osteopathic Medicine.

Awards

In 2018, the most recent academic year for which data are available, 2,349 degrees and certificates were awarded by these institutions, including 2,010 which were awarded in programs not offered as distance education.

Workforce Equilibrium

Finally, we use a crosswalk from the United States Department of Education to estimate the balance between the region's emerging supply of qualified talent and projected demand for workers with relevant skills. The difference between awards in a program and the aggregated number of openings in related occupations is quantified in this report as a "Workforce Equilibrium Value."

Ideally, the numbers representing emerging supply will be roughly equal to projected demand. Where an imbalance exists, there may be an opportunity to expand program offerings or to encourage students and jobseekers to consider careers in these fields. The educational system thus becomes a valuable factor in not only the success of individual students, but also in the economic success of the region.

Table 11: Program Awards and Openings in Related Occupations, Region J:

Description	2018 Awards	Openings- Related Occupations	2019 Jobs	Equilibrium Value
Criminal Justice/Safety Studies	243	7	91	236
Registered Nursing/Registered Nurse	187	124	1,549	63
Business/Commerce, General	182	212	2,115	(30)
Business Administration and Management, General	166	241	2,355	(75)
Liberal Arts and Sciences/Liberal Studies	164	141	1,700	23
Mechanical Engineering	121	27	299	94
Social Work	104	34	280	70
Marketing/Marketing Management, General	96	30	208	66
Industrial Engineering	95	14	148	81
Psychology, General	93	11	129	82
Biology/Biological Sciences, General	92	6	59	86
Accounting	81	56	567	26
Emergency Medical Technology/Technician (EMT Paramedic)	81	18	144	63
Education, General	80	381	4,512	(301)
Electrical and Electronics Engineering	75	34	479	41
Education/Teaching-Speech or Language Impairments	73	45	535	28
Data Processing and Data Processing Technology/Technician	70	10	103	61
Finance, General	65	52	565	13
Foreign Languages and Literatures, General	64	14	100	51
Kinesiology and Exercise Science	63	2	16	62
Hospitality Administration/Management, General	53	12	92	41
Public Health Education and Promotion	53	17	131	36
Civil Engineering, General	52	22	236	30
Computer and Information Sciences, General	51	61	644	(10)
Criminal Justice/Safety Studies	243	7	91	236
Registered Nursing/Registered Nurse	187	124	1,549	63

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