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California
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Colleges



WORKFORCE DEMAND ASSESSMENT

Low Desert Region

INLAND EMPIRE / DESERT

2024

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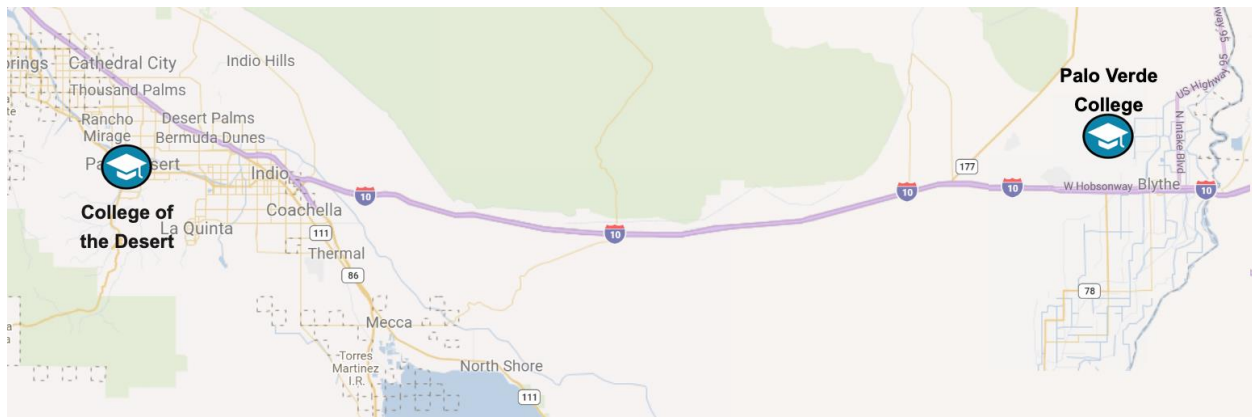
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Low Desert Subregional Overview

The Low Desert Subregion encompasses the eastern portion of Riverside County, extending from the San Jacinto mountains in the west to the Arizona state border in the east, the San Bernardino County border on the north, and the Imperial County border on the south. The Low Desert subregion comprises just over 2/3rds of Riverside County's land area but contains only 10% of the County's total population. Two community colleges and four high school districts are located within this subregion. Exhibit 1 displays a map of the subregion. See Appendix B for a list of ZIP codes associated with this subregion.¹

To assist regional community colleges with strategic planning and career education (CE) program development, the Inland Empire/Desert Region Center of Excellence (COE) conducted a series of subregional workforce demand assessments to pinpoint high-quality job opportunities for program investment. This analysis identifies occupations that show strong workforce demand and offer median hourly earnings that exceed the state's living wage standard. The occupations highlighted in this assessment may be used to calibrate or develop CE training programs designed to address the region's in-demand and high-wage job opportunities. This subregional brief also presents demographic, industry, and occupation data in the Inland Empire-San Bernardino County Metro Subregion. See A for Methodology and Data Sources used in this report.

Community colleges in the Low Desert



NOTE: The data presented in this report was derived from Lightcast's Analyst program, data set 2023.4 and U.S. Census Bureau American Community Survey tables and will be individually cited as applicable.

¹ ZIP-level data in Lightcast is based on county-level data using U.S. Bureau of Labor Statistics Quarterly Census of Employment and Wages (QCEW) dataset. It is important to note that ZIP codes are not geographical areas and are typically points on a map that may be used to approximate geographical boundaries. (kb.lightcast.io/en/articles/6957501-zip-level-employment-data)

Overview of the Inland Empire-Low Desert Subregion

Exhibit 1. Overview of the Low Desert



466,029

Population (2022)

Population decreased by 1,251 over the last 5 years and is projected to decrease by 15,427 over the next 5 years.



\$58,728

Avg. Earnings Per Job (2022)

Subregional average earnings per job are \$22,103 below the national average earnings of \$80,831 per job.



186,921

Total Subregional Employment

Jobs grew by 11,281 over the last 5 years and are projected to grow by 19,020 over the next 5 years.



16,470

Projected Job Growth (2022)

From 2017 to 2022, jobs increased by 6.4% in the Low Desert from 175,640 to 186,921. This change outpaced the national growth rate of 3.8% by 2.6%.



182,130

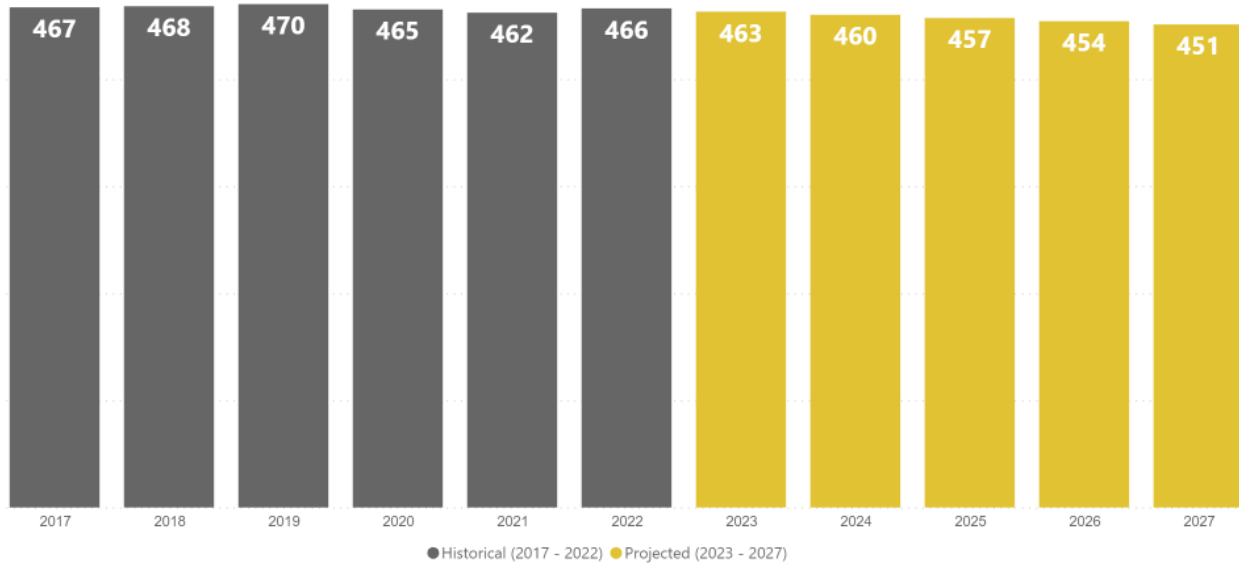
Retirement risk is high in your area. The national average for an area this size is 139,661 people 55 or older, while there are 182,130 here.

Demographics and Labor Force

Population

In 2022, the Inland Empire-Low Desert Subregion contained about 466,029 residents, or 10.0% of the region's 4.68 million residents (Exhibit 2). As of 2022 the region's population decreased by -0.27% since 2017, shrinking by 1,251. Inland Empire-Low Desert Subregion population is expected to decrease by 2.6% between 2022 and 2027, reduced by more than 12,000 residents.²

Exhibit 2. Population change, in thousands, Low Desert Region, 2017-2027



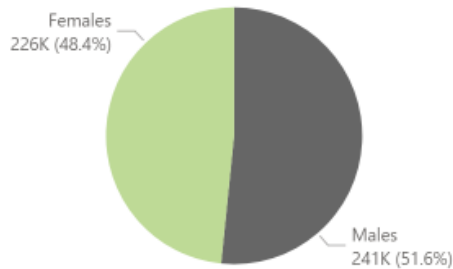
Gender

The subregion's population has more males (51.6%) than females (48.4%) residents (Exhibit 3) as compared to the region's population of male (50.3%) and female (49.7%).³

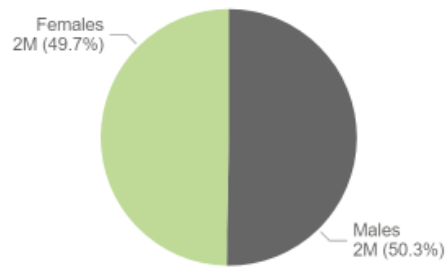
² Lightcast 2023.4 – QCEW, Non-QCEW Employees, Self-Employed

Exhibit 3. Population Gender Region to Subregion comparison, Inland Empire-Low Desert Subregion, 2022

Subregional 2022 Population by Gender



Regional 2022 Population by Gender



Age

The size of population represented in age categories may provide insight into future demand for housing, services, and educational enrollment needs. Age categories used in this report are as follows and includes 466k individuals in this cohort. (Exhibit 4 & 5)

- ◆ School age is generally 0 – 24, which represented 24.9% of the subregion’s ~466K 2022 population.
- ◆ Working-age is 25 – 64 which represented 50.2% of the subregion’s ~466K 2022 population. This group is projected to decrease slightly to 49.9 % in 2027; whereas School age category is projected to increase to 25.3%.

An interesting way to further disaggregate this cohort, as shown in Exhibit 5, is to filter the age of the working-age cohort to include between 25 and 69 years of age which equates to ~126.3K individuals. (Exhibit 4) Note that the Bureau of Labor Statistics defines individuals between ages of 25 – 54 as the “prime-working-age”.

- Early career (< 35) represents 21.5% in 2022 of the working-age cohort and is projected to decrease to 20.5% by 2027.
 - Mid-career (35 – 54) represents 41.1% in 2022 of the working-age cohort and is projected to increase to 45.2% by 2027.
 - Late career (55+) represents 37.3% of the working-age cohort and is projected to decrease to 34.3% by 2027.
- ◆ Retirement age is +65 which represented 24.9% of the subregion’s ~466K 2022 population. This group is projected to remain at 24.9% by 2027.

Exhibit 4. Working-age Distribution Comparison in Inland Empire/Desert Subregion, 2022

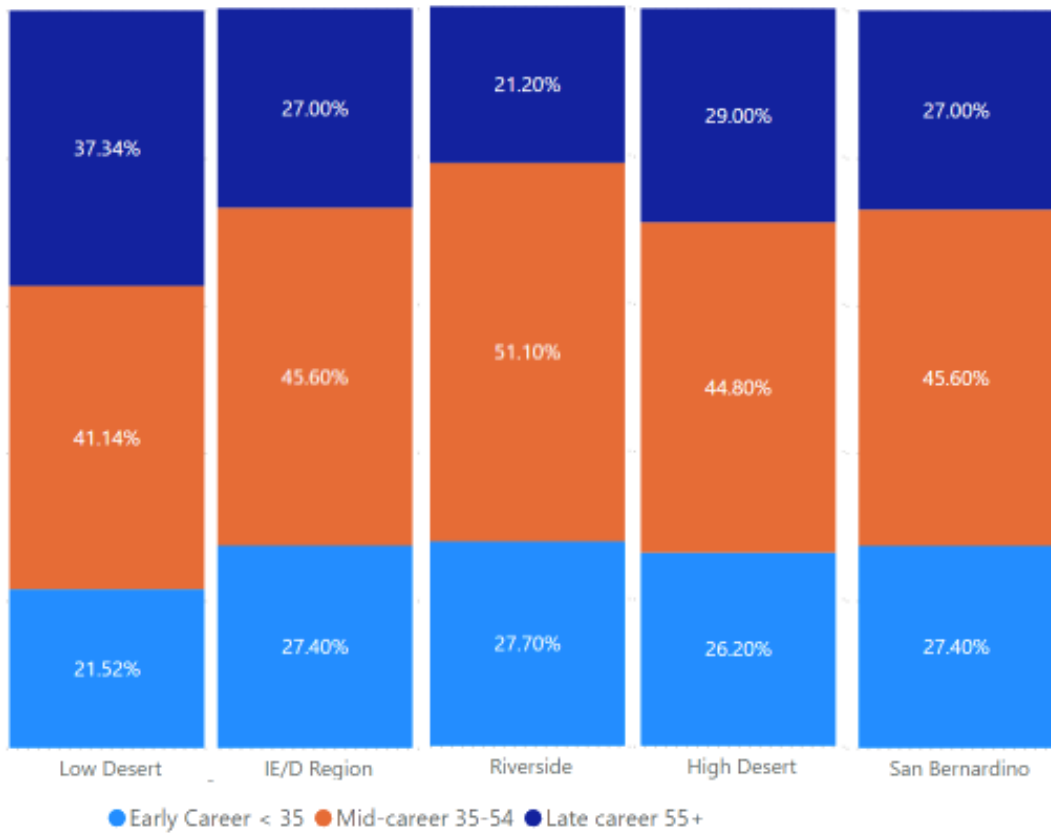
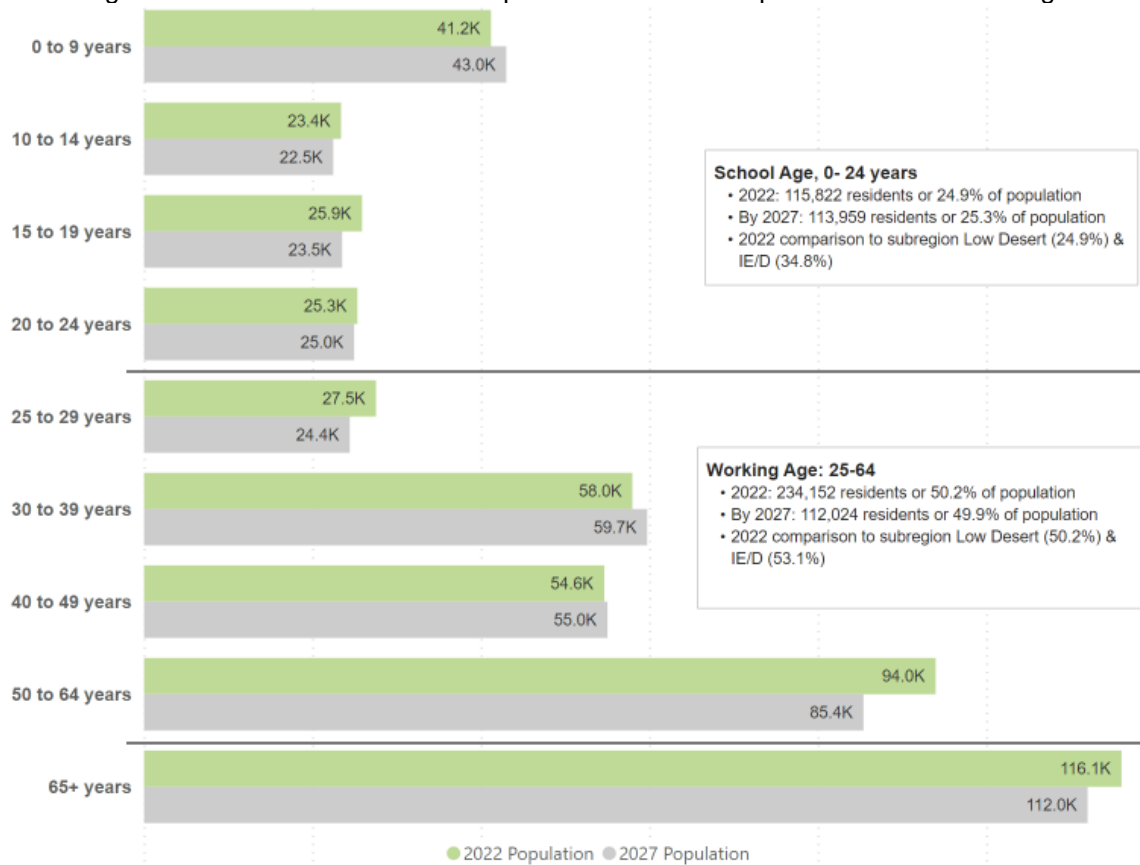


Exhibit 5 is showing the age distribution comparison between 2022 and 2027. The data shows a slight decrease (300) by 2027 in the traditional college going years (20–24-year-old) and increase (3.1) in early career (25-29 old) individuals in this subregion.

Exhibit 5. Age Distribution 2022 - 2027 comparison in Inland Empire-Low Desert Subregion



Ethnicity

The U.S. Census Bureau adheres to the U.S. Office of Management and Budget Guidelines when collecting race and ethnicity data from residents. This includes the decision to employ separate questions for race and ethnicity, as outlined in the Office of Management and Budget (OMB) 1994 directives. It's essential to acknowledge that while this approach complies with established guidelines, the Center of Excellence (COE) recognizes that this representation may not fully capture the nuanced diversity within the population.

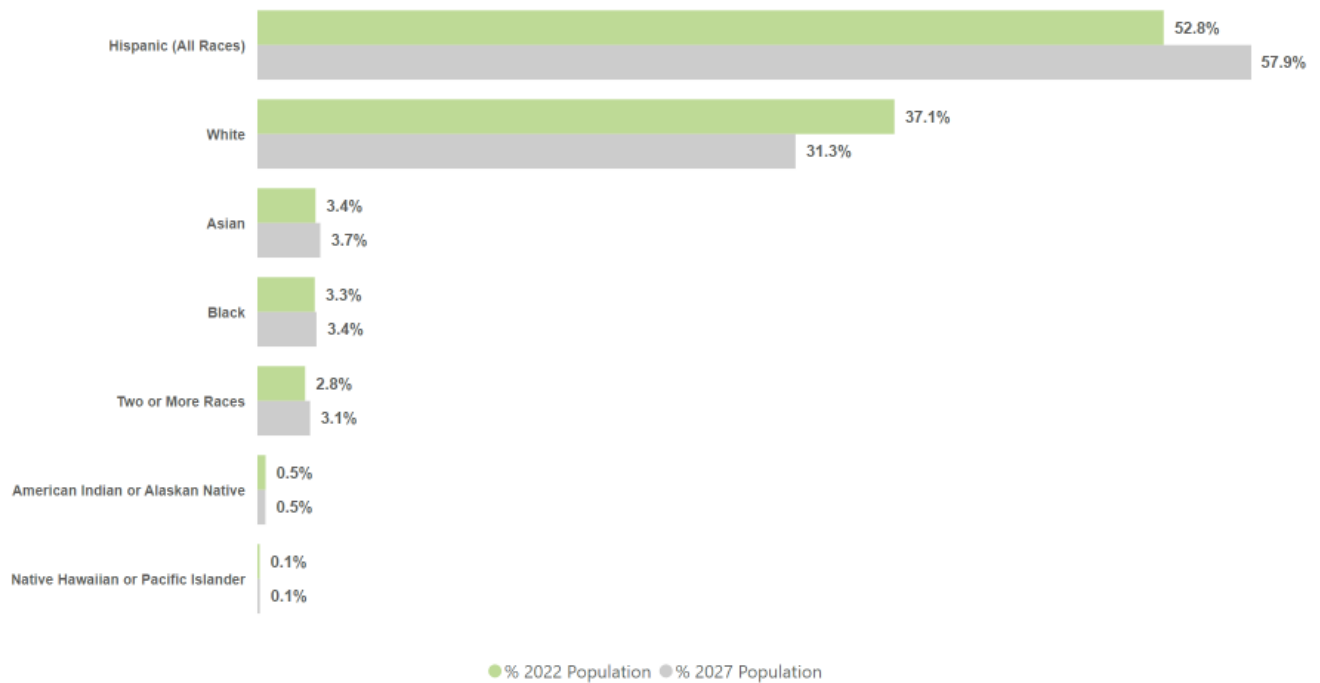
Race and ethnicity data can be interpreted in several different ways:

1. **Understanding Student Diversity:** Analyzing race and ethnicity figures helps faculty understand the demographic composition of their student body. This understanding is essential for creating inclusive learning environments and ensuring that programs are accessible and relevant to students from diverse backgrounds.
2. **Addressing Equity and Access:** Examining race and ethnicity data allows faculty to identify disparities in educational outcomes among different demographic groups. This information can inform efforts to address equity gaps by implementing targeted support services, scholarships, and outreach programs to improve access and success for underrepresented minorities.

- Fostering Community Partnerships:** Race and ethnicity data can also inform efforts to build partnerships with community organizations, employers, and other stakeholders that serve diverse racial and ethnic communities. Collaborating with these partners can help faculty better understand the needs and preferences of local communities and ensure that program offerings are responsive to the cultural and linguistic diversity of the populations they serve.

In 2022, 52.8% of the Low Desert Subregion population was Hispanic (All races), which is less than 54.7% of the population in the entire Inland Empire region. By 2027, that percentage of Hispanic individuals in the Low Desert Subregion population is projected to increase to 57.9% (Exhibit 6). By 2027, the percentage of White, Non-Hispanic individuals in the Lower Desert Subregion is expected to decrease from 37.1% to 31.3%.

Exhibit 6. Ethnicity 2022 - 2027 comparison in Inland Empire-Low Desert Subregion



Educational Attainment

Educational attainment refers to the highest level of education that residents aged 25 and older have completed. Educational attainment data can be leveraged in several ways:

- Identifying Target Demographics:** Analyzing educational attainment data helps faculty understand the educational background of their potential student base. This information can guide them in tailoring program offerings to meet the needs and aspirations of specific demographic groups, such as first-generation college students or adult learners returning to education.

2. **Informing Curriculum Development:** Understanding the educational levels of the local population helps faculty design curricula that build upon existing knowledge and skills. Programs can be structured to provide foundational education for those with lower levels of educational attainment while offering advanced coursework and enrichment opportunities for more academically prepared students.
3. **Addressing Workforce Needs:** Educational attainment data can highlight areas where there is a need for workforce development initiatives. Faculty can develop programs that provide training and credentials aligned with the educational requirements of high-demand industries, thereby increasing employment opportunities for graduates, and contributing to economic growth in the community.

Exhibit 7. Educational Attainment comparison in Inland Empire-Low Desert Subregion, 2022

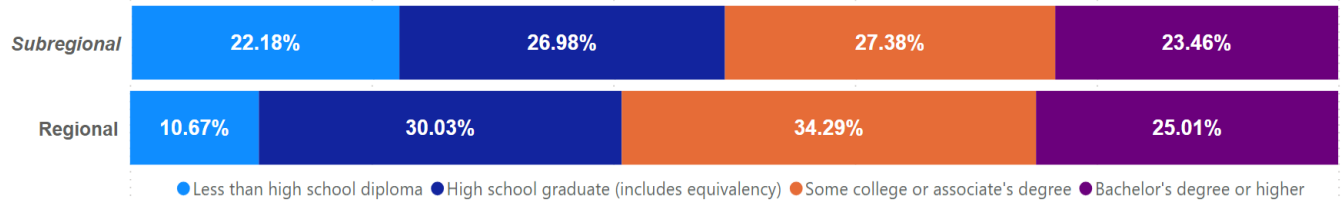
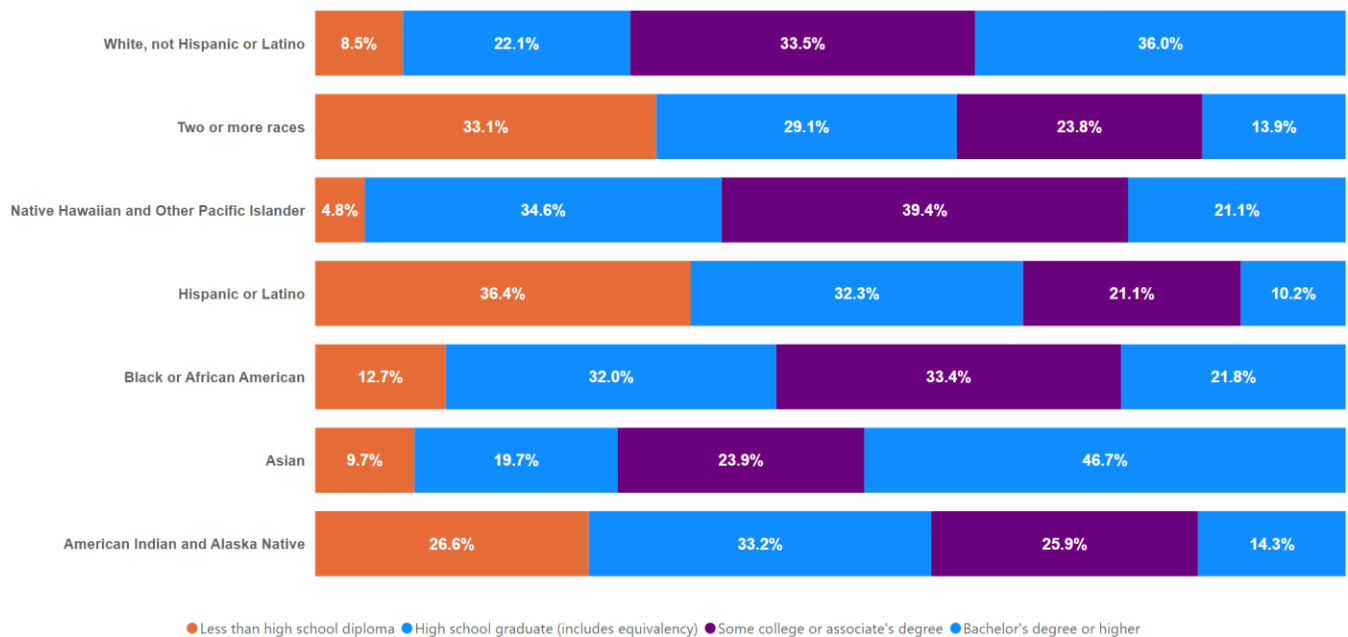


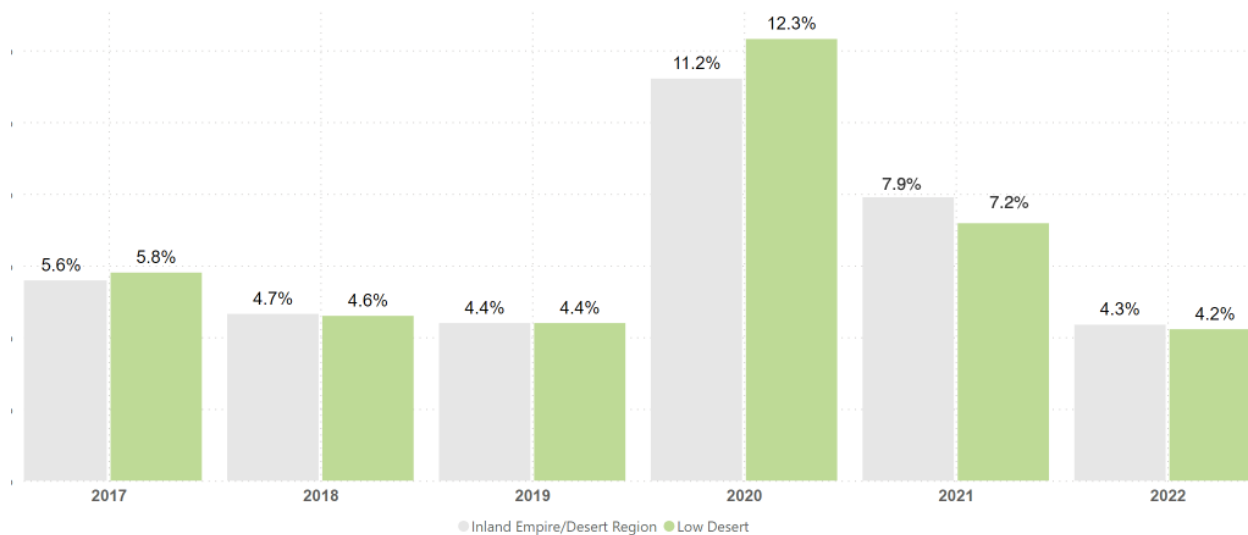
Exhibit 8. Educational Attainment Race & Ethnicity Distribution in Inland Empire-Low Desert Subregion, 2022



Labor Force and Unemployment Rate

Labor force data reflects the employment status of people based on where they reside. The labor force is the total of employed residents or those that are unemployed and are seeking work. The unemployment rate represents the number of unemployed individuals as a share of the total labor force. Exhibit 9 displays city-level unemployment rates for those cities that have population greater than 25k and contain community college main campuses. Higher city-level unemployment compared to regional figures can impact students' abilities to find work due to localized labor market dynamics, limited job accessibility, transportation constraints, industry concentration, local policies, network effects, and cost of living considerations. Understanding these factors is essential for community college faculty to effectively support their students in navigating the job market and achieving successful employment outcomes.

Exhibit 9. Unemployment rate for Inland Empire-Low Desert Subregion, 2017-2022



Subregional Industries

Industries are groups of employer establishments and categorized by their primary business activity using a North American Industry Classification System (NAICS). NAICS codes are a standardized classification system used to categorize businesses and industries for the purpose of collecting, analyzing, and publishing statistical data. These codes are based on the economic activities of businesses and are used for various purposes, including economic analysis, policymaking, and business research.

In the subregion, industry employers reported 187,090 total jobs in 2022, or about 10.0% of the Inland Empire/Desert Region's total employment (nearly 1.87 million jobs) (Exhibit 10). Over the next five years, the subregion's industry employment is projected to grow by 10.1% which is slightly slower than the greater region's projected job growth of 10.8%. The subregion is projected to contribute 9.4% of the region's net job growth over the next five years. Over the past five years, from 2017 to 2022, subregional employment rose by 6.4%, a net increase of over 11,271 jobs.

Exhibit 10. Historical and projected job trend in Inland Empire-Low Desert Subregion, 2017-2027

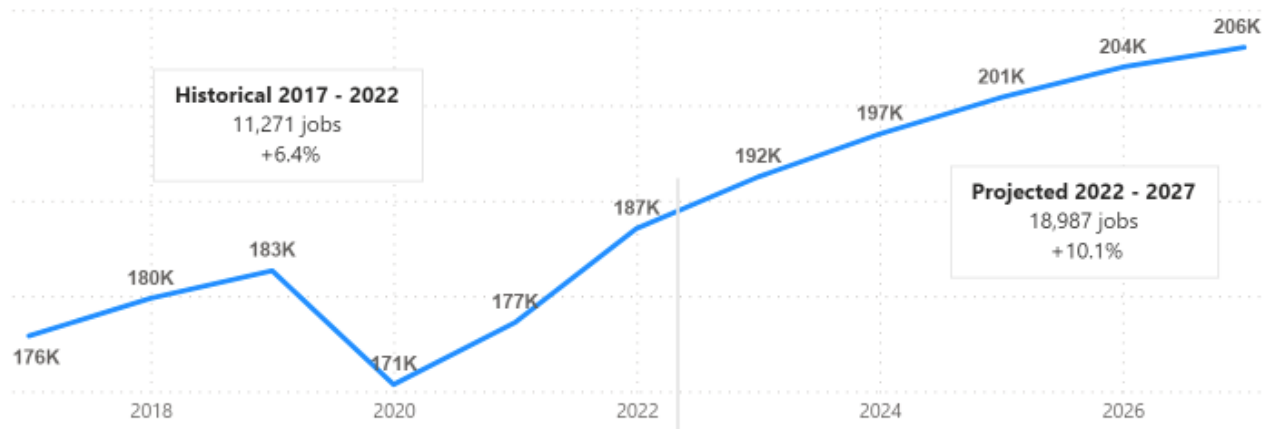
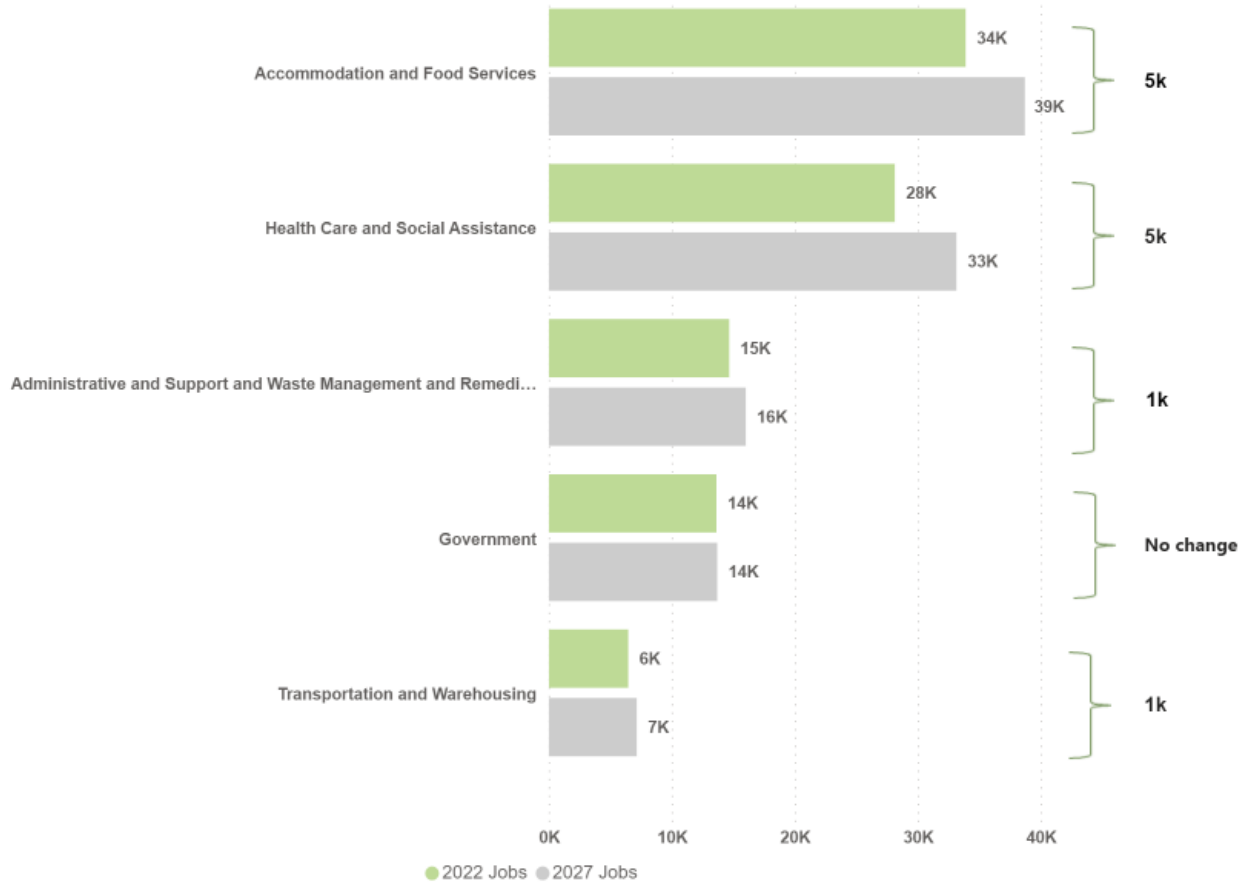


Exhibit 11 is reporting on the industries with the highest number of jobs reported in 2023 and includes 2027 projection and percentage of change. Each industry job is counted, whether full-time or part-time, usually where the business conducts its payroll activity. The labor force is the total count of residents working (employed) or seeking work (unemployed). The unemployment rate represents the number of unemployed individuals expressed as a percent of the total labor force.

In 2022, the top 5 industries that are producing the greatest number of jobs are shown as compared to the job number projection for 2027. The 2027 top industry project growth is Health Care and Social Assistance (44.4%) and Accommodation and Food Services (24.0%) both producing a total of 10k jobs into the market over the next 5 years.

The top 5 industries adding jobs to the subregion are Transportation & Warehousing, Health Care and Social Assistance, Accommodation and Food Services, Administrative/Support/Waste Management & Remediation and Government. These industries are projected to contribute 75.4% of the subregion’s job growth through 2027.

Exhibit 11. Job numbers by Industry & Projected Percentage Change in Inland Empire-Low Desert Subregion, 2022-2027



Industry Groups

The previous section described the employment share of the region's major industry sectors. NAICS codes facilitate a detailed analysis of subindustries within these major sectors. This analysis provides a clearer picture of industry activity that drives that regional economy.

Exhibit 12 provides a sample of high-quality industry groups for this subregion. High-quality industries are those that are growing faster than the region overall (at or above 9.0% growth), have average per-job earnings above the living wage standard (\$53,518 annually), and have a high location quotient at or above 1.2. A location quotient reflects the concentration of an industry in an area compared to the nation overall. Highly concentrated industries, those with a high location quotient, often describe the type of business activity an area is "known for." (See Appendix B for terms and definitions)

In 2022, over 17,000 jobs in these industry groups met the high-quality industry group definition and account for 9.1% of subregional employment (187,492). These industry groups are projected to contribute 16.6% of the subregional job growth through 2027.

Exhibit 12. High-quality industry groups that are growing faster than the region in Inland Empire-Low Desert Subregion, 2022-2027

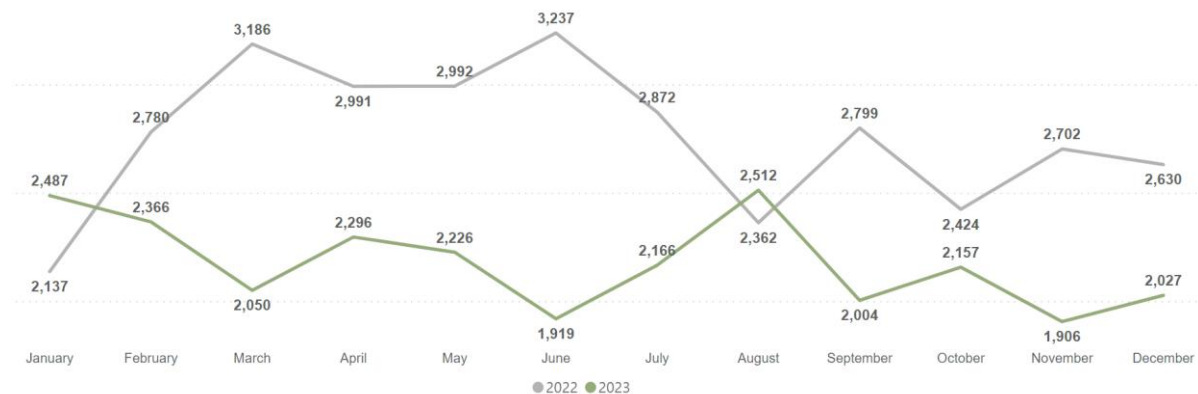
NAICS Sector Description	2022 Jobs	2022 - 2027 Change	Growth Rate	Location Quotient	Average Earnings per Job
Construction					
Plumbing, Heating, and Air-Conditioning Contractors (238220)	2,141	333	15.6%	1.44	\$75,297
Poured Concrete Foundation and Structure Contractors (238110)	905	114	12.6%	2.81	\$75,618
New Housing For-Sale Builders (236117)	343	69	20.1%	3.31	\$183,515
Roofing Contractors (238160)	378	68	18.0%	1.25	\$71,540
Masonry Contractors (238140)	391	55	14.1%	1.94	\$66,193
Water and Sewer Line and Related Structures Construction (237110)	275	47	17.1%	1.22	\$104,627
Tile and Terrazzo Contractors (238340)	428	47	11.0%	4.11	\$60,980
Glass and Glazing Contractors (238150)	233	42	18.2%	2.49	\$78,877
Flooring Contractors (238330)	300	37	12.5%	1.85	\$57,130
Structural Steel and Precast Concrete Contractors (238120)	197	35	17.7%	1.88	\$78,718
Health Care and Social Assistance					
Child and Youth Services (624110)	460	138	29.9%	1.78	\$55,187
All Other Outpatient Care Centers (621498)	534	127	23.7%	1.98	\$70,090
HMO Medical Centers (621491)	855	105	12.3%	3.77	\$143,379
Offices of All Other Miscellaneous Health Practitioners (621399)	289	73	25.2%	1.32	\$59,666
Diagnostic Imaging Centers (621512)	144	33	22.7%	1.47	\$77,266
Family Planning Centers (621410)	139	18	12.7%	3.79	\$75,538
Transportation and Warehousing					
General Warehousing and Storage (493110)	2,537	338	13.3%	1.29	\$60,918
Postal Service (491110)	28	16	56.2%	1.64	\$58,744
Manufacturing					
Ready-Mix Concrete Manufacturing (327320)	234	43	18.2%	2.06	\$84,971
Small Arms Ammunition Manufacturing (332992)	43	39	89.0%	3.07	\$89,334
Confectionery Manufacturing from Purchased Chocolate (311352)	58	30	50.8%	1.62	\$78,794
Frozen Specialty Food Manufacturing (311412)	117	29	25.2%	1.62	\$91,962
Musical Instrument Manufacturing (339992)	82	24	28.8%	5.54	\$55,163
Bottled Water Manufacturing (312112)	27	23	85.8%	1.30	\$89,412
Cookie and Cracker Manufacturing (311821)	75	23	31.3%	1.75	\$63,390
Metal Can Manufacturing (332431)	99	23	22.9%	3.99	\$134,475
Frozen Fruit, Juice, and Vegetable Manufacturing (311411)	114	18	15.6%	3.41	\$93,598
Dog and Cat Food Manufacturing (311111)	79	11	13.5%	2.01	\$73,816
Tortilla Manufacturing (311830)	36	7	20.8%	1.56	\$64,640

Job Posting Information

Job posting data can provide insights into employer demand and is different dataset versus the historical job data we retrieve from BLS Quarterly Census of Employment and Wages (QCEW). The job posting data is collected from scraping online job boards such as LinkedIn, Indeed, Glassdoor and many others. Please note that online job postings do not equal labor market demand, demand is represented by annual job openings. While not perfect, Lightcast leverages machine learning and other AI technologies as well as government data sourced from the Job Openings and Labor Turnover Survey (JOLTS), a monthly survey conducted by the Bureau of Labor Statistics (BLS), to enrich, deduplicate and aggregate this information to make it a meaningful dataset.

The following data was filtered to include jobs where the advertised educational requirement was High school or GED or associate degree as well as excluded jobs posted by staffing companies and internships.

Exhibit 13. Job Posting Overview for all cities in this subregion, March 2023 – February 2024



Businesses

In 2023, over 4,260 businesses in the Low Desert Subregion posted a total of 26,116 unique job postings. Exhibit 14, lists the top 21 businesses with the greatest number of unique online job postings in this subregion.

Company Name	Unique Postings (Jan 2022 - Dec 2023)	Company Name	Unique Postings (Jan 2022 - Dec 2023)
Eisenhower Health	2109		
Marriott International	1184	Walgreens Boots Alliance	402
Tenet Healthcare	1160	CareInHomes	389
Eisenhower Medical Center	1090	Allied Universal	376
Spa Resort Casino	867	Omni Hotels & Resorts	372
Desert Regional Medical Center	799	Agua Caliente Casino Resort & Spa	365
Palm Health Resources	686	Walmart	322
Spotlight 29 Casino	578	Hilton	313
Fantasy Springs Resort Casino	572	Renaissance Indian Wells Resort & Spa	312
Hyatt	444	CompHealth	170
The Ritz-carlton, Rancho Mirage	430	Pilot Company	170

Occupational Overview

An occupation is a collection of jobs, and job titles, which perform similar work tasks and share similar work knowledge, skills, and abilities. Employees who perform essentially the same tasks are classified in the same occupation, whether or not they are in the same industry. It's important to note that some occupations are concentrated in a few industries (e.g., police officers are only employed in government), whereas other occupations are found in most industries (e.g., information technology workers and maintenance workers).⁴

Inland Empire/Desert community colleges currently offer programs that train for occupations associated with the 10 CCCCO. The following sections discuss current employment and future demand for high-quality occupations related to regional training programs that align with the CCCCO sectors. For each sector, existing programs and programs not currently offered by community colleges in the subregion have been identified. The occupations listed for each sector meet the high-quality job designation, i.e., occupations that are both in-demand (at least 100 annual job openings) and high-wage (\$25.73 and higher).⁵

In this study, occupational employment in the subregion was analyzed in terms of each occupation's educational requirements, i.e., the entry-level education level needed to enter employment, such as a high school diploma; community college coursework, a degree, or certificate; or a bachelor's degree. Employers report typical entry-level educational requirements at the national level, and alternative paths to securing employment may exist depending on employer preferences and state licensing requirements.

California Community Colleges provide education and training that generally prepares workers to enter community-college-level jobs. These jobs typically require an education beyond a high school diploma but less than a four-year degree. Most community-college-level jobs offer a higher pay rate than jobs requiring less education, making them an excellent fit for community college students on a CE pathway who want to enter in-demand careers that offer a living wage.

High-school-level jobs illuminate possibilities open to those choosing to enter the workforce after securing a high school diploma or G.E.D., or jobs typically open to those who choose to work while attending college.

Bachelor's-level jobs require a four-year degree from a college or university. This assessment does not include occupations that typically require an education beyond a

⁴ "Concepts and Definitions," U.S. Bureau of Labor Statistics, 2022, accessed on August 8, 2022, <https://www.bls.gov/cps/definitions.htm>.

⁵ Note the [UW self-sufficiency standard](#) is currently used by the CO and other COEs as the self-sufficiency wage criteria for labor market assessment reports. Also note that this hourly rate was last updated by UW in 2021 and does not account for significant increases in the cost of living in the Inland Empire in the last three years and at \$14.00 is below the State of California minimum wage of \$16.00. For these reasons, the COE will provide an averaged living wage calculation from MIT in the analysis below as an additional reference point. MIT estimates, the living wage for an adult with no kids living in 2024 is \$26.30 in San Bernardino County and \$25.17 in San Bernadino County.

bachelor's degree, such as physicians, lawyers, and most scientists; however, other occupations may be included when the number of jobs that require a community college degree are low or non-existent in the report.

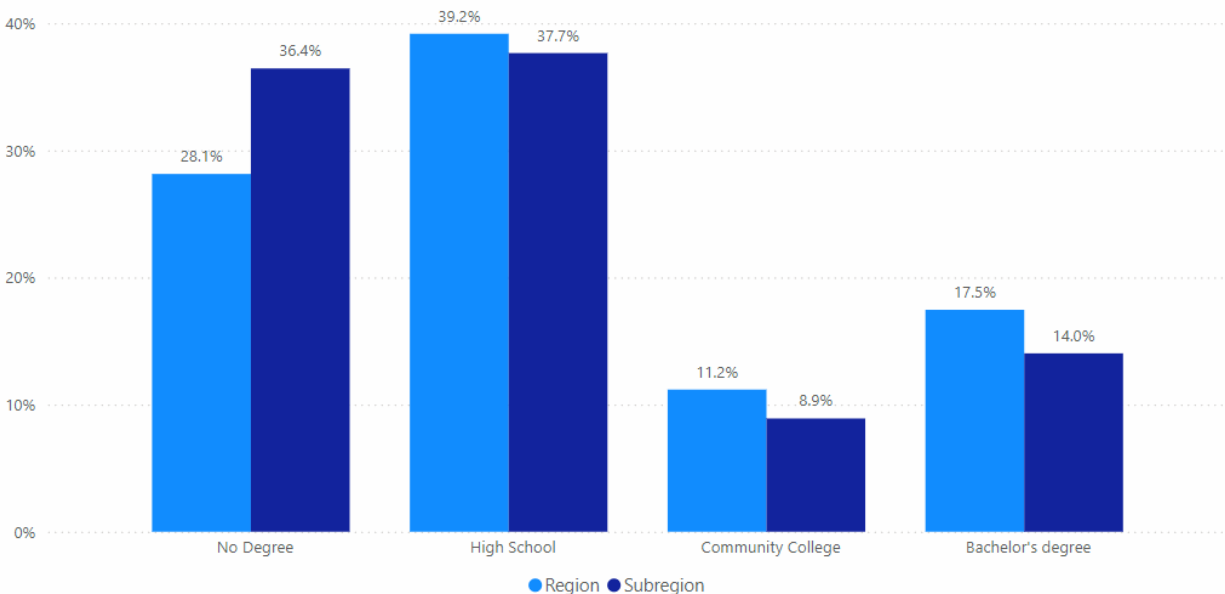
Also excluded are those occupations that do not typically require formal education to enter employment. Military occupations (in 2022 there were approximately 42 regional military jobs in the region) were also excluded from the following sections of this assessment. Definitions for education levels are available in Appendix B.

Of the over 187,400 jobs in the subregion in 2022, 55.1% are included in the following reports. A crosswalk file, which associates TOP codes to occupations and sectors was used to produce the following sector specific reports. This data source included 476 occupations, of which 451 were mapped to sectors. Also included in this crosswalk dataset was 410 TOP codes, of which 272 were mapped to sectors.

Please be aware that the job demand figures presented in the following reports may not encompass total demand. It is recommended that you collaborate with the COE to assess occupations aligned with your specific program requirements.

Exhibit 15 includes 103,351 jobs as a result of the above crosswalk and displays the share of jobs by entry level educational requirements.

Exhibit 15. Share of jobs by education level, Low Desert, and Inland Empire/Desert Region, 2022



Advanced Manufacturing

The CCCCCO advanced manufacturing sector aligns with the CDE manufacturing and product development sector. One college in the Inland Empire-Low Desert subregion currently uses one program code for their advanced manufacturing programs (Exhibit 16).

Exhibit 16. Programs offered by community colleges in the subregion.

Programs Offered:

0956.50 - Welding Technology

However, the advanced manufacturing program in the subregion does not currently prepare students for employment in any high-quality occupations. High-quality occupations have at least 100 annual job openings and offer a median hourly wage of \$25.74 at the regional level.

Community College Programs Not Offered

In the subregion, 25 programs in the advanced manufacturing sector are currently not offered (Exhibit 17).

Exhibit 17. Programs not offered by community colleges in the subregion.

Programs Not Offered:

0924.00 - Engineering Technology, General (requires Trigonometry)
0934.00 - Electronics and Electric Technology
0934.10 - Computer Electronics
0934.20 - Industrial Electronics
0934.80 - Laser and Optical Technology
0935.10 - Appliance Repair
0936.00 - Printing and Lithography
0943.00 - Instrumentation Technology
0945.00 - Industrial Systems Technology and Maintenance
0950.00 - Aeronautical and Aviation Technology
0950.40 - Aircraft Electronics (Avionics)
0950.50 - Aircraft Fabrication
0953.30 - Electrical, Electronic, and Electro-Mechanical Drafting
0953.40 - Mechanical Drafting
0953.60 - Technical Illustration
0954.20 - Plastics and Composites
0954.30 - Petroleum Technology
0956.00 - Manufacturing and Industrial Technology
0956.30 - Machining and Machine Tools
0956.70 - Industrial and Occupational Safety and Health
0956.80 - Industrial Quality Control
0957.30 - Surveying
0961.00 - Optics
1303.30 - Fashion Production
1920.00 - Ocean Technology

Occupational Training Opportunities

There are six programs that community colleges are not currently offering in the subregion that align with high-quality, growing occupations:

- 0934.00 - Electronics and Electric Technology
- 0934.10 - Computer Electronics
- 0945.00 - Industrial Systems Technology and Maintenance
- 0950.00 - Aeronautical and Aviation Technology
- 0956.00 - Manufacturing and Industrial Technology
- 0956.70 - Industrial and Occupational Safety and Health

In 2022, there were over 1,560 high-quality advanced manufacturing jobs in the subregion (Exhibit 18).

By 2027, annual job opening projections:

- There are 18 high-school-level job openings projected annually for this occupational group in the subregion; over 360 job openings are projected annually in the greater region.
- There are more than 140 community college-level job openings projected annually for this occupational group in the subregion; over 1,670 job openings are projected annually in the greater region.
- There are 14 bachelor's degree-level job openings projected annually for this occupational group in the subregion; over 250 job openings are projected annually in the greater region.

Exhibit 18. High-quality occupations without training programs in the subregion.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Industrial Machinery Mechanics	High School	163	18	365	\$29.80
Aircraft Mechanics and Service Technicians	Community College	71	6	238	\$36.35
Architectural and Civil Drafters	Community College	85	10	101	\$29.29
Automotive Service Technicians and Mechanics	Community College	1,065	121	1,211	\$25.88
Electrical and Electronics Repairers, Commercial and Industrial Equipment	Community College	54	6	121	\$30.13
Architectural and Engineering Managers	Bachelor's degree	69	6	113	\$74.96
Occupational Health and Safety Specialists	Bachelor's degree	58	8	143	\$40.30

Advanced Transportation and Logistics

The CCCC CO advanced transportation and logistics sector aligns with the CDE transportation sector. Two colleges in the Inland Empire-Low Desert subregion currently use two program codes for their advanced transportation and logistics programs (Exhibit 19).

Exhibit 19. Programs offered by community colleges in the subregion.

Programs Offered:

0948.00 - Automotive Technology

0948.40 - Alternative Fuels and Advanced Transportation Technology

Advanced transportation and logistics programs in the subregion prepare students for employment in one high-quality community-college-level occupation and one high-quality high school-level occupation. High-quality occupations have at least 100 annual job openings and offer a median hourly wage of \$25.74 at the regional level.

In 2022, there were over 1,580 high-quality transportation and logistics jobs in the subregion related to subregional training programs (Exhibit 18).

By 2027, annual job opening projections:

- There are more than 55 high-school-level job openings projected annually for this occupational group in the subregion; over 650 job openings are projected annually in the greater region.
- There are more than 120 community college-level job openings projected annually for this occupational group in the subregion; over 1,210 job openings are projected annually in the greater region.

Exhibit 18. Education level, projected demand, and earnings for high-quality occupations, 2022 - 2027

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
First-Line Supervisors of Mechanics, Installers, and Repairers	High School	526	58	655	\$36.86
Automotive Service Technicians and Mechanics	Community College	1,065	121	1,211	\$25.88

Community College Programs Not Offered

In the subregion, 17 programs in the advanced transportation and logistics sector are currently not offered (Exhibit 19).

Exhibit 19. Programs not offered by community colleges in the subregion.

Programs Not Offered:

0510.00 - Logistics and Materials Transportation
0947.00 - Diesel Technology
0947.20 - Heavy Equipment Maintenance
0947.30 - Heavy Equipment Operation
0947.40 - Railroad and Light Rail Operations
0947.50 - Truck and Bus Driving
0948.30 - Motorcycle, Outboard and Small Engine Repair
0948.50 - Recreational Vehicle Service
0949.00 - Automotive Collision Repair
0949.10 - Upholstery Repair - Automotive
0950.10 - Aviation Airframe Mechanics
0950.20 - Aviation Powerplant Mechanics
0959.00 - Marine Technology
3020.00 - Aviation and Airport Management and Services
3020.10 - Aviation and Airport Management
3020.20 - Piloting
3020.30 - Air Traffic Control

Occupational Training Opportunities

There are seven programs that community colleges are not currently offering in the subregion that align with high-quality, growing occupations:

- 0947.00 - Diesel Technology
- 0947.40 - Railroad and Light Rail Operations
- 0948.50 - Recreational Vehicle Service
- 0949.00 - Automotive Collision Repair
- 0950.10 - Aviation Airframe Mechanics
- 3020.00 - Aviation and Airport Management and Services
- 3020.20 - Piloting

In 2022, there were more than 1,720 high-quality advanced transportation and logistics jobs in the subregion (Exhibit 20).

By 2027, annual job opening projections:

- There are more than 190 high-school-level job openings projected annually for this occupational group in the subregion; 3,300 job openings are projected annually in the greater region.
- There are 6 community college-level job openings projected annually for this occupational group in the subregion; over 230 job openings are projected annually in the greater region.
- There are 3 bachelor's degree-level job openings projected annually for this occupational group in the subregion; over 130 job openings are projected annually in the greater region.

Exhibit 20. High-quality occupations without training programs in the subregion.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Automotive Body and Related Repairers	High School	155	21	236	\$27.60
Bus and Truck Mechanics and Diesel Engine Specialists	High School	286	33	482	\$27.90
First-Line Supervisors of Transportation and Material Moving Workers, Except Aircraft Cargo Handling Supervisors	High School	450	63	1,322	\$29.62
Mobile Heavy Equipment Mechanics, Except Engines	High School	167	17	244	\$30.82
Operating Engineers and Other Construction Equipment Operators	High School	397	45	494	\$36.94
Transportation, Storage, and Distribution Managers	High School	179	20	522	\$39.44
Aircraft Mechanics and Service Technicians	Community College	71	6	238	\$36.35
Airline Pilots, Copilots, and Flight Engineers	Bachelor's degree	23	3	134	\$135.55

Finally, the below occupations are currently being served by existing programs offered in the subregion AND could also be served by the above programs that are not offered in the subregion. If one or more of the above programs are not currently offered in the subregion and are of interest, the COE can perform a full Labor Market Analysis (LMA) on the occupations below to analyze if additional education capacity is needed (Exhibit 21).

Exhibit 21. High-quality occupations with training programs in the subregion but aligned to training programs not offered.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
First-Line Supervisors of Mechanics, Installers, and Repairers	High School	526	58	655	\$36.86
Automotive Service Technicians and Mechanics	Community College	1,065	121	1,211	\$25.88

Agriculture, Water, and Environmental Technologies

The CCCCOC agriculture, water, and environmental technologies sector aligns with the CDE agriculture and natural resources sector. Two colleges in the Inland Empire-Low Desert subregion currently offer seven programs in the agriculture, water, and environmental technologies sector (Exhibit 22).

Exhibit 22. Programs offered by community colleges in the subregion.

Programs Offered:

- 0101.00 - Agriculture Technology and Sciences, General
- 0103.00 - Plant Science
- 0109.00 - Horticulture
- 0109.40 - Turfgrass Technology
- 0112.00 - Agriculture Business, Sales and Service
- 0115.00 - Natural Resources
- 0303.00 - Environmental Technology

Agriculture, water, and environmental technologies programs in the subregion prepare students for employment in two high-quality high school-level occupations. High-quality occupations have at least 100 annual job openings and offer a median hourly wage of \$25.74 at the regional level.

In 2022, there were over 1,410 high-quality agriculture, water, and environmental technologies jobs in the subregion related to subregional training programs (Exhibit 23).

By 2027, annual job opening projections:

- There are more than 160 high-school-level job openings projected annually for this occupational group in the subregion; 1,850 job openings are projected annually in the greater region.
- There are no community college-level job openings projected annually for this occupational group in the greater region.

Exhibit 23. Education level, projected demand, and earnings for high-quality occupations, 2022 – 2027

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
First-Line Supervisors of Landscaping, Lawn Service, and Groundskeeping Workers	High School	675	78	328	\$26.17
Sales Representatives, Wholesale and Manufacturing, Except Technical and Scientific Products	High School	736	86	1,528	\$29.84

Community College Programs Not Offered

In the subregion, sixteen programs in the agriculture, water, and environmental technologies sector are currently not offered (Exhibit 24).

Exhibit 24. Programs not offered by community colleges in the subregion.

Programs Not Offered:

0102.00 - Animal Science
0102.10 - Veterinary Technician (Licensed)
0102.20 - Artificial Inseminator (Licensed)
0102.30 - Dairy Science
0102.40 - Equine Science
0103.10 - Agricultural Pest Control Adviser and Operator (Licensed)
0104.00 - Viticulture, Enology and Wine Business
0109.10 - Landscape Design and Maintenance
0109.20 - Floriculture / Floristry
0109.30 - Nursery Technology
0113.00 - Food Processing and Related Technologies
0114.00 - Forestry
0115.10 - Parks and Outdoor Recreation
0115.20 - Wildlife and Fisheries
0116.00 - Agricultural Power Equipment Technology
0199.00 - Other Agriculture and Natural Resources

Occupational Training Opportunities

There are two programs that community colleges are not currently offering in the subregion that align with high-quality, growing occupations:

- 0109.10 - Landscape Design and Maintenance
- 0116.00 - Agricultural Power Equipment Technology

In 2022, there were 170 high-quality agriculture, water, and environmental technologies jobs in the subregion (Exhibit 25).

By 2027, annual job opening projections:

- There are 17 high school-level job openings projected annually for this occupational group in the subregion; over 240 job openings are projected annually in the greater region.
- There are no community college-level job openings projected annually for this occupational group in the greater region.

Exhibit 25. High-quality occupation without training programs in the subregion.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Mobile Heavy Equipment Mechanics, Except Engines	High School	167	17	244	\$30.82

Finally, the below occupation is currently being served by existing programs offered in the subregion AND could also be served by the above programs that are not offered in the subregion. If one or more of the above programs are not currently offered in the subregion and are of interest, the COE can perform a full Labor Market Analysis (LMA) on the occupations below to analyze if additional education capacity is needed (Exhibit 26).

Exhibit 26. High-quality occupations with training programs in the subregion but aligned to training programs not offered.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
First-Line Supervisors of Landscaping, Lawn Service, and Groundskeeping Workers	High School	675	78	328	\$26.17

Business and Entrepreneurship

The CCCCO business and entrepreneurship sector aligns with both CDE Business and Finance and Marketing, Sales, and Services sectors. Two colleges in the Inland Empire-Low Desert subregion currently use six program codes for their business and entrepreneurship programs (Exhibit 27).

Exhibit 27. Programs offered by community colleges in the subregion.

Programs Offered:

0501.00 - Business and Commerce, General

0502.00 - Accounting

0505.00 - Business Administration

0506.30 - Management Development and Supervision

0506.40 - Small Business and Entrepreneurship

0509.00 - Marketing and Distribution

Business and entrepreneurship programs in the subregion prepare students for employment in five high-quality high-school-level occupations and fourteen high-quality bachelor's degree-level occupations. High-quality occupations have at least 100 annual job openings and offer a median hourly wage of \$25.74 at the regional level.

In 2022, there were over 9,870 high-quality business and entrepreneurship jobs in the subregion related to subregional training programs (Exhibit 28).

By 2027, annual job opening projections:

- There are more than 280 high-school-level job openings projected annually for this occupational group in the subregion; over 3,740 job openings are projected annually in the greater region.
- There are no community college-level job openings projected annually for this occupational group in the greater region.
- There are more than 770 bachelor's degree-level job openings projected annually for this occupational group in the subregion; over 8,700 job openings are projected annually in the greater region.

Exhibit 28. Education level, projected demand, and earnings for high-quality occupations, 2022 - 2027

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
First-Line Supervisors of Mechanics, Installers, and Repairers	High School	526	58	655	\$36.86
First-Line Supervisors of Office and Administrative Support Workers	High School	1,378	149	1,763	\$30.34
First-Line Supervisors of Production and Operating Workers	High School	271	31	553	\$29.58
Payroll and Timekeeping Clerks	High School	218	23	248	\$26.95
Transportation, Storage, and Distribution Managers	High School	179	20	522	\$39.44
Accountants and Auditors	Bachelor's degree	1,016	102	958	\$37.36
Computer and Information Systems Managers	Bachelor's degree	154	15	237	\$77.28
Construction Managers	Bachelor's degree	759	71	644	\$41.10
Cost Estimators	Bachelor's degree	343	37	370	\$35.61
General and Operations Managers	Bachelor's degree	2,261	257	2,550	\$48.75
Human Resources Managers	Bachelor's degree	97	10	142	\$61.26
Human Resources Specialists	Bachelor's degree	472	55	834	\$30.82
Industrial Production Managers	Bachelor's degree	87	7	147	\$47.04
Logisticians	Bachelor's degree	84	10	266	\$34.58
Management Analysts	Bachelor's degree	570	58	735	\$40.41
Market Research Analysts and Marketing Specialists	Bachelor's degree	495	62	728	\$29.79
Marketing Managers	Bachelor's degree	171	18	208	\$58.58
Sales Managers	Bachelor's degree	599	53	644	\$46.18
Social and Community Service Managers	Bachelor's degree	199	24	242	\$33.15

Community College Programs Not Offered

In the subregion, seventeen programs in the business and entrepreneurship sector are currently not offered (Exhibit 29).

Exhibit 29. Programs not offered by community colleges in the subregion.

Programs Not Offered:

- 0502.10 - Tax Studies
- 0504.00 - Banking and Finance
- 0506.00 - Business Management
- 0508.00 - International Business and Trade
- 0509.10 - Advertising
- 0509.20 - Purchasing
- 0509.40 - Sales and Salesmanship
- 0509.70 - E-Commerce (Business emphasis)
- 0511.00 - Real Estate
- 0511.10 - Escrow
- 0512.00 - Insurance
- 0514.10 - Legal Office Technology
- 0518.00 - Customer Service
- 0599.00 - Other Business and Management
- 1255.00 - Mortuary Science
- 1262.00 - Massage Therapy
- 3007.00 - Cosmetology and Barbering

Occupational Training Opportunities

There are eight programs that community colleges are not currently offering in the subregion that align with high-quality, growing occupations:

- 0502.10 - Tax Studies
- 0504.00 - Banking and Finance
- 0506.00 - Business Management
- 0509.20 - Purchasing
- 0509.40 - Sales and Salesmanship
- 0509.70 - E-Commerce (Business emphasis)
- 0511.00 - Real Estate
- 0512.00 - Insurance

In 2022, there were over 3,510 high-quality business and entrepreneurship jobs in the subregion (Exhibit 30).

By 2027, annual job opening projections:

- There are more than 230 high-school-level job openings projected annually for this occupational group in the subregion; over 2,010 job openings are projected annually in the greater region.
- There are no community college-level job openings projected annually for this occupational group in the greater region.
- There are more than 120 bachelor's degree-level job openings projected annually for this occupational group in the subregion; over 1,340 job openings are projected annually in the greater region.

Exhibit 30. High-quality occupations without training programs in the subregion.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Claims Adjusters, Examiners, and Investigators	High School	84	8	101	\$38.08
First-Line Supervisors of Non-Retail Sales Workers	High School	323	29	324	\$31.75
Property, Real Estate, and Community Association Managers	High School	600	57	355	\$29.59
Real Estate Brokers	High School	358	36	198	\$39.09
Sales Representatives of Services, Except Advertising, Insurance, Financial Services, and Travel	High School	890	107	1,039	\$27.58
Buyers and Purchasing Agents	Bachelor's degree	253	26	387	\$30.50
Financial Managers	Bachelor's degree	472	48	507	\$63.05
Loan Officers	Bachelor's degree	264	26	163	\$30.08
Personal Financial Advisors	Bachelor's degree	204	18	122	\$38.22
Sales Representatives, Wholesale and Manufacturing, Technical and Scientific Products	Bachelor's degree	69	8	170	\$39.78

Finally, the below occupations are currently being served by existing programs offered in the subregion AND could also be served by the above programs that are not offered in the subregion. If one or more of the above programs are not currently offered in the subregion and are of interest, the COE can perform a full Labor Market Analysis (LMA) on the occupations below to analyze if additional education capacity is needed (Exhibit 31).

Exhibit 31. High-quality occupations with training programs in the subregion but aligned to training programs not offered.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
First-Line Supervisors of Office and Administrative Support Workers	High School	1,378	149	1,763	\$30.34
Transportation, Storage, and Distribution Managers	High School	179	20	522	\$39.44
Accountants and Auditors	Bachelor's degree	1,016	102	958	\$37.36
Construction Managers	Bachelor's degree	759	71	644	\$41.10
Cost Estimators	Bachelor's degree	343	37	370	\$35.61
General and Operations Managers	Bachelor's degree	2,261	257	2,550	\$48.75
Human Resources Managers	Bachelor's degree	97	10	142	\$61.26
Human Resources Specialists	Bachelor's degree	472	55	834	\$30.82
Industrial Production Managers	Bachelor's degree	87	7	147	\$47.04
Logisticians	Bachelor's degree	84	10	266	\$34.58
Management Analysts	Bachelor's degree	570	58	735	\$40.41
Market Research Analysts and Marketing Specialists	Bachelor's degree	495	62	728	\$29.79
Marketing Managers	Bachelor's degree	171	18	208	\$58.58
Sales Managers	Bachelor's degree	599	53	644	\$46.18
Social and Community Service Managers	Bachelor's degree	199	24	242	\$33.15

Education and Human Development

The CCCCO education and human development sector aligns with CDE education, child development, and family services sector. Two colleges in the Inland Empire-Low Desert subregion currently use four program codes for their education and human development programs (Exhibit 32).

Exhibit 32. Programs offered by community colleges in the subregion.

Programs Offered:

0802.00 - Educational Aide (Teacher Assistant)
1305.00 - Child Development/Early Care and Education
1305.20 - Children with Special Needs
1305.80 - Child Development Administration and Management

Education and human development programs in the subregion prepare students for employment in four high-quality bachelor's degree-level occupations. High-quality occupations have at least 100 annual job openings and offer a median hourly wage of \$25.74 at the regional level.

In 2022, there were over 1,590 high-quality education and human development jobs in the subregion related to subregional training programs (Exhibit 33).

By 2027, annual job opening projections:

- There are no community college-level job openings projected annually for this occupational group in the greater region.
- There are more than 130 bachelor's degree-level job openings projected annually for this occupational group in the subregion; over 2,460 job openings are projected annually in the greater region.

Exhibit 33. Education level, projected demand, and earnings for high-quality occupations, 2022 - 2027

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Child, Family, and School Social Workers	Bachelor's degree	308	33	454	\$29.56
Elementary School Teachers, Except Special Education	Bachelor's degree	1,065	83	1,658	\$46.56
Special Education Teachers, Kindergarten and Elementary School	Bachelor's degree	137	11	217	\$40.69
Special Education Teachers, Secondary School	Bachelor's degree	83	7	133	\$53.44

Community College Programs Not Offered

In the subregion, fourteen programs in the education and human development sector are currently not offered (Exhibit 34).

Exhibit 34. Programs not offered by community colleges in the subregion.

Programs Not Offered:

0802.10 - Educational Aide (Teacher Assistant), Bilingual
0809.00 - Special Education
0835.60 - Coaching
0836.00 - Recreation
0836.10 - Recreation Assistant
0850.10 - Sign Language Interpreting
0860.00 - Educational Technology
0899.00 - Other Education
1305.40 - Preschool Age Children
1305.50 - The School Age Child
1305.60 - Parenting and Family Education
1305.70 - Foster and Kinship Care
1305.90 - Infants and Toddlers
1308.00 - Family Studies

Occupational Training Opportunities

There are six programs that community colleges are not currently offering in the subregion that align with high-quality, growing occupations:

- 0802.10 - Educational Aide (Teacher Assistant), Bilingual
- 0809.00 - Special Education
- 0836.10 - Recreation Assistant
- 0850.10 - Sign Language Interpreting
- 0860.00 - Educational Technology
- 1308.00 - Family Studies

In 2022, there were over 3,520 high-quality education and human development jobs in the subregion (Exhibit 35).

By 2027, annual job opening projections:

- There are no community college-level job openings projected annually for this occupational group in the greater region.
- There are more than 370 bachelor's degree-level job openings projected annually for this occupational group in the subregion; over 4,320 job openings are projected annually in the greater region.

Exhibit 35. High-quality occupations aligned with training programs not offered in the subregion.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
General and Operations Managers	Bachelor's degree	2,261	257	2,550	\$48.75
Interpreters and Translators	Bachelor's degree	81	11	111	\$27.67
Middle School Teachers, Except Special and Career/Technical Education	Bachelor's degree	162	14	278	\$48.89
Personal Financial Advisors	Bachelor's degree	204	18	122	\$38.22
Secondary School Teachers, Except Special and Career/Technical Education	Bachelor's degree	573	43	856	\$50.72
Training and Development Specialists	Bachelor's degree	246	28	407	\$27.18

Finally, the below occupations are currently being served by existing programs offered in the subregion AND could also be served by the above programs that are not offered in the subregion. If one or more of the above programs are not currently offered in the subregion and are of interest, the COE can perform a full Labor Market Analysis (LMA) on the occupations below to analyze if additional education capacity is needed (Exhibit 36).

Exhibit 36. High-quality occupations with training programs in the subregion but aligned to training programs not offered.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Elementary School Teachers, Except Special Education	Bachelor's degree	1,065	83	1,658	\$46.56
Special Education Teachers, Kindergarten and Elementary School	Bachelor's degree	137	11	217	\$40.69
Special Education Teachers, Secondary School	Bachelor's degree	83	7	133	\$53.44

Energy, Construction, and Utilities

The CCCC energy, environment, and utilities sector aligns with the CDE building and construction trades sector; energy, environment, and utilities sector; and engineering and architecture sector. In the Inland Empire-Low Desert subregion, two colleges currently utilize seven energy, construction, and utilities program codes (Exhibit 37).

Exhibit 37. Programs offered by community colleges in the subregion.

Programs Offered:

0201.00 - Architecture and Architectural Technology
0946.00 - Environmental Control Technology
0946.10 - Energy Systems Technology
0952.00 - Construction Crafts Technology
0953.00 - Drafting Technology
0957.00 - Civil and Construction Management Technology
0957.20 - Construction Inspection

Energy, construction, and utilities programs in the subregion prepare students for employment in four high-quality high-school-level occupations, one high-quality community college-level occupation, and two high-quality bachelor's degree-level occupations. High-quality occupations have at least 100 annual job openings and offer a median hourly wage of \$25.74 at the regional level.

In 2022, there were over 2,610 high-quality energy, construction, and utilities jobs in the subregion related to subregional training programs (Exhibit 38).

By 2027, annual job opening projections:

- There are more than 180 high-school-level job openings projected annually for this occupational group in the subregion; over 2,160 job openings are projected annually in the greater region.
- There are 10 community college-level job openings projected annually for this occupational group in the subregion; over 100 job openings are projected annually in the greater region.
- There are more than 75 bachelor's degree-level job openings projected annually for this occupational group in the subregion; 750 job openings are projected annually in the greater region.

Exhibit 38. Education level, projected demand, and earnings for high-quality occupations, 2022 - 2027

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Construction and Building Inspectors	High School	117	16	204	\$37.79
First-Line Supervisors of Construction Trades and Extraction Workers	High School	899	97	945	\$36.47
First-Line Supervisors of Mechanics, Installers, and Repairers	High School	526	58	655	\$36.86
Industrial Machinery Mechanics	High School	163	18	365	\$29.80
Architectural and Civil Drafters	Community College	85	10	101	\$29.29
Architectural and Engineering Managers	Bachelor's degree	69	6	113	\$74.96
Construction Managers	Bachelor's degree	759	71	644	\$41.10

Community College Programs Not Offered

In the subregion, sixteen programs in the energy, construction, and utilities sector are currently not offered (Exhibit 39).

Exhibit 39. Programs not offered by community colleges in the subregion.

Programs Not Offered:

- 0299.00 - Other Architecture and Environmental Design
- 0934.40 - Electrical Systems and Power Transmission
- 0935.00 - Electro-Mechanical Technology
- 0952.10 - Carpentry
- 0952.20 - Electrical
- 0952.30 - Plumbing, Pipefitting and Steamfitting
- 0952.40 - Glazing
- 0952.50 - Mill and Cabinet Work
- 0952.60 - Masonry, Tile, Cement, Lath and Plaster
- 0952.70 - Painting, Decorating, and Flooring
- 0952.80 - Drywall and Insulation
- 0952.90 - Roofing
- 0953.10 - Architectural Drafting
- 0953.20 - Civil Drafting
- 0956.40 - Sheet Metal and Structural Metal
- 0958.00 - Water and Wastewater Technology
- 2102.10 - Public Works

Occupational Training Opportunities

There are nine programs that community colleges are not currently offering in the subregion that align with high-quality, growing occupations:

- 0934.40 – Electrical Systems and Power Transmission
- 0935.00 – Electro-Mechanical Technology
- 0952.10 – Carpentry
- 0952.20 – Electrical
- 0952.30 – Plumbing, Pipefitting and Steamfitting
- 0952.40 – Glazing
- 0953.10 – Architectural Drafting
- 0956.40 – Sheet Metal and Structural Metal
- 0958.00 – Water and Wastewater Technology

In 2022, there were more than 4,450 high-quality energy, construction, and utilities jobs in the subregion (Exhibit 40).

By 2027, annual job opening projections:

- There are more than 480 high-school-level job openings projected annually for this occupational group in the subregion; over 4,580 job openings are projected annually in the greater region.
- There are 6 community college-level job openings projected annually for this occupational group in the subregion; over 120 job openings are projected annually in the greater region.

Exhibit 40. High-quality occupations aligned with training programs not offered in the subregion.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Carpenters	High School	2,637	270	2,072	\$28.05
Electrical Power-Line Installers and Repairers	High School	80	8	137	\$47.27
Electricians	High School	701	86	1,191	\$28.36
Glaziers	High School	99	15	123	\$27.07
Plumbers, Pipefitters, and Steamfitters	High School	591	71	620	\$27.67
Security and Fire Alarm Systems Installers	High School	91	14	122	\$27.78
Sheet Metal Workers	High School	122	16	153	\$30.18
Water and Wastewater Treatment Plant and System Operators	High School	79	9	163	\$37.49
Electrical and Electronics Repairers, Commercial and Industrial Equipment	Community College	54	6	121	\$30.13

Finally, the below occupations are currently being served by existing programs offered in the subregion AND could also be served by the above programs that are not offered in the subregion. If one or more of the above programs are not currently offered in the subregion and are of interest, the COE can perform a full Labor Market Analysis (LMA) on the occupations below to analyze if additional education capacity is needed (Exhibit 41).

Exhibit 41. High-quality occupations with training programs in the subregion but aligned to training programs not offered.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
First-Line Supervisors of Construction Trades and Extraction Workers	High School	899	97	945	\$36.47
First-Line Supervisors of Mechanics, Installers, and Repairers	High School	526	58	655	\$36.86
Architectural and Civil Drafters	Community College	85	10	101	\$29.29

Health

The CCCC health sector aligns with the CDE health science and medical technology sector. In the Inland Empire-Low Desert subregion, two colleges currently utilize ten health program codes (Exhibit 42).

Exhibit 42. Programs offered by community colleges in the subregion.

Programs Offered:

1201.00 - Health Occupations, General
1205.10 - Phlebotomy
1221.00 - Pharmacy Technology
1228.00 - Athletic Training and Sports Medicine
1230.10 - Registered Nursing
1230.20 - Licensed Vocational Nursing
1230.30 - Certified Nurse Assistant
1250.00 - Emergency Medical Services
1306.00 - Nutrition, Foods, and Culinary Arts
2104.40 - Alcohol and Controlled Substances

Health programs in the subregion prepare students for employment in one high-quality high-school-level occupation, one high-quality community-college-level occupation, and two high-quality bachelor's degree-level occupations. High-quality occupations have at least 100 annual job openings and offer a median hourly wage of \$25.74 at the regional level.

In 2022, there were over 4,290 high-quality health jobs in the subregion related to subregional training programs (Exhibit 43).

By 2027, annual job opening projections:

- There are 60 high-school-level job openings projected annually for this occupational group in the subregion; over 290 job openings are projected annually in the greater region.
- There are more than 70 community college-level job openings projected annually for this occupational group in the subregion; over 870 job openings are projected annually in the greater region.
- There are more than 260 bachelor's degree-level job openings projected annually for this occupational group in the subregion; over 3,100 job openings are projected annually in the greater region.

Exhibit 43. Education level, projected demand, and earnings for high-quality occupations, 2022 - 2027

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Chefs and Head Cooks	High School	378	60	295	\$27.08
Licensed Practical and Licensed Vocational Nurses	Community College	759	76	873	\$30.36
Registered Nurses	Bachelor's degree	2,845	223	2,616	\$58.62
Substance Abuse, Behavioral Disorder, and Mental Health Counselors	Bachelor's degree	313	43	485	\$28.09

Community College Programs Not Offered

In the subregion, 39 programs in the health sector are currently not offered (Exhibit 44).

Exhibit 44. Programs not offered by community colleges in the subregion.

Programs Not Offered:

0514.20 - Medical Office Technology	1222.00 - Physical Therapist Assistant
1205.00 - Medical Laboratory Technology	1223.00 - Health Information Technology
1205.10 - Phlebotomy	1223.10 - Health Information Coding
1206.00 - Physicians Assistant	1224.00 - School Health Clerk
1208.10 - Clinical Medical Assisting	1225.00 - Radiologic Technology
1208.30 - Health Facility Unit Coordinator	1226.00 - Radiation Therapy Technician
1209.00 - Hospital Central Service Technician	1230.00 - Nursing
1210.00 - Respiratory Care/Therapy	1230.80 - Home Health Aide
1211.00 - Polysomnography	1239.00 - Psychiatric Technician
1212.00 - Electro-Neurodiagnostic Technology	1240.00 - Dental Occupations
1213.00 - Cardiovascular Technician	1240.30 - Dental Laboratory Technician
1214.00 - Orthopedic Assistant	1261.00 - Community Health Care Worker
1215.00 - Electrocardiography	1299.00 - Other Health Occupations
1217.00 - Surgical Technician	1306.20 - Dietetic Services and Management
1218.00 - Occupational Therapy Technology	1306.60 - Dietetic Technology
1219.00 - Optical Technology	1309.00 - Gerontology
1220.00 - Speech/Language Pathology and Audiology	2104.40 - Alcohol and Controlled Substances
1221.00 - Pharmacy Technology	

Occupational Training Opportunities

There are seven programs that community colleges are not currently offering in the subregion that align with high-quality, growing occupations:

- 1202.00 - Hospital and Health Care Administration
- 1210.00 - Respiratory Care/Therapy
- 1214.00 - Orthopedic Assistant
- 1225.00 - Radiologic Technology
- 1230.00 - Nursing
- 1239.00 - Psychiatric Technician
- 1240.00 - Dental Occupations

In 2022, there were over 1,040 high-quality health jobs in the subregion (Exhibit 45).

By 2027, annual job opening projections:

- There are more than 60 community college-level job openings projected annually for this occupational group in the subregion; over 790 job openings are projected annually in the greater region.
- There are more than 40 bachelor's degree-level job openings projected annually for this occupational group in the subregion; over 560 job openings are projected annually in the greater region.

Exhibit 45. High-quality occupations without training programs in the subregion.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Dental Hygienists	Community College	130	14	166	\$47.19
Physical Therapist Assistants	Community College	68	13	182	\$37.00
Psychiatric Technicians	Community College	105	13	148	\$31.54
Radiologic Technologists and Technicians	Community College	172	14	156	\$45.54
Respiratory Therapists	Community College	159	12	143	\$37.99
Medical and Health Services Managers	Bachelor's degree	409	48	562	\$59.13

Finally, the below occupations are currently being served by existing programs offered in the subregion AND could also be served by the above programs that are not offered in the subregion. If one or more of the above programs are not currently offered in the subregion and are of interest, the COE can perform a full Labor Market Analysis (LMA) on the occupations below to analyze if additional education capacity is needed (Exhibit 46).

Exhibit 46. High-quality occupations with training programs in the subregion but aligned to training programs not offered.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Licensed Practical and Licensed Vocational Nurses	Community College	759	76	873	\$30.36
Registered Nurses	Bachelor's degree	2,845	223	2,616	\$58.62

Information and Communication Technologies/Digital Media (ICT/DM)

The CCCC information and communication technologies/digital media (ICT/DM) sector aligns with the CDE arts, media, and entertainment sector and the information and communication technologies sector. Two colleges in the Inland Empire-Low Desert subregion currently utilize 15 ICT/DM program codes (Exhibit 47).

Exhibit 47. Programs offered by community colleges in the subregion.

Programs Offered:

0514.00 - Office Technology/Office Computer Applications
0602.00 - Journalism
0604.00 - Radio and Television
0604.20 - Television (including combined TV/Film/Video)
0612.20 - Film Production
0614.00 - Digital Media
0614.60 - Computer Graphics and Digital Imagery
0699.00 - Other Media and Communications
0701.00 - Information Technology, General
0702.00 - Computer Information Systems
0702.10 - Software Applications
0708.10 - Computer Networking
1005.00 - Commercial Music
1012.00 - Applied Photography
1030.00 - Graphic Art and Design

ICT/DM programs in the subregion prepare students for employment in two high-quality high school-level occupations and six high-quality bachelor's degree-level occupations. High-quality occupations have at least 100 annual job openings and offer a median hourly wage of \$25.74 at the regional level.

In 2022, there were more than 2,740 high-quality ICT/DM jobs in the subregion related to subregional training programs (Exhibit 48).

By 2027, annual job opening projections:

- There are more than 170 high-school-level job openings projected annually for this occupational group in the subregion; over 2,100 job openings are projected annually in the greater region.
- There are no community college-level job openings projected annually for this occupational group in the greater region.
- There are more than 100 bachelor's degree-level job openings projected annually for this occupational group in the subregion; over 1,280 job openings are projected annually in the greater region.

Exhibit 48. Education level, projected demand, and earnings for high-quality occupations, 2022 - 2027

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Executive Secretaries and Executive Administrative Assistants	High School	263	28	340	\$33.46
First-Line Supervisors of Office and Administrative Support Workers	High School	1,378	149	1,763	\$30.34
Computer and Information Systems Managers	Bachelor's degree	154	15	237	\$77.28
Computer Occupations, All Other	Bachelor's degree	206	18	302	\$36.36
Computer Systems Analysts	Bachelor's degree	156	13	210	\$48.96
Graphic Designers	Bachelor's degree	292	31	252	\$26.52
Network and Computer Systems Administrators	Bachelor's degree	105	8	134	\$44.40
Writers and Authors	Bachelor's degree	190	23	146	\$26.32

Community College Programs Not Offered

In the subregion, 21 programs in the ICT/DM sector are currently not offered (Exhibit 49).

Exhibit 49. Programs not offered by community colleges in the subregion.

Programs Not Offered:

- 0604.10 - Radio
- 0604.30 - Broadcast Journalism
- 0607.00 - Technical Communication
- 0610.00 - Mass Communications
- 0614.10 - Multimedia
- 0614.20 - Electronic Game Design
- 0614.30 - Website Design and Development
- 0614.40 - Animation
- 0614.50 - Desktop Publishing
- 0707.00 - Computer Software Development
- 0707.10 - Computer Programming
- 0707.20 - Database Design and Administration
- 0707.30 - Computer Systems Analysis
- 0708.00 - Computer Infrastructure and Support
- 0708.20 - Computer Support
- 0709.00 - World Wide Web Administration
- 0709.10 - E-Commerce (Technology emphasis)
- 0799.00 - Other Information Technology
- 0934.30 - Telecommunications Technology
- 1013.00 - Commercial Art
- 2206.10 - Geographic Information Systems

Occupational Training Opportunities

There are seven programs that community colleges are not currently offering in the subregion that align with high-quality, growing occupations:

- 0604.30 – Broadcast Journalism
- 0614.30 – Website Design and Development
- 0707.00 - Computer Software Development
- 0707.10 – Computer Programming
- 0708.00 – Computer Infrastructure and Support
- 0709.10 – E-Commerce (Technology emphasis)
- 0934.30 – Telecommunications Technology

In 2022, there were over 370 high-quality ICT/DM jobs in the subregion (Exhibit 50).

By 2027, annual job opening projections:

- There are 8 high-school-level job openings projected annually for this occupational group in the subregion; over 130 job openings are projected annually in the greater region.
- There are more than 30 community college-level job openings projected annually for this occupational group in the subregion; over 470 job openings are projected annually in the greater region.

Exhibit 50. High-quality occupations without training programs in the subregion.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Telecommunications Line Installers and Repairers	High School	70	8	136	\$30.45
Computer User Support Specialists	Community College	228	21	326	\$29.25
Telecommunications Equipment Installers and Repairers, Except Line Installers	Community College	77	10	151	\$30.08

Finally, the below occupations are currently being served by existing programs offered in the subregion AND could also be served by the above programs that are not offered in the subregion. If one or more of the above programs are not currently offered in the subregion and are of interest, the COE can perform a full Labor Market Analysis (LMA) on the occupations below to analyze if additional education capacity is needed (Exhibit 51).

Exhibit 51. High-quality occupations with training programs in the subregion but aligned to training programs not offered.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
First-Line Supervisors of Office and Administrative Support Workers	High School	1,378	149	1,763	\$30.34
Computer and Information Systems Managers	Bachelor's degree	154	15	237	\$77.28
Computer Occupations, All Other	Bachelor's degree	206	18	302	\$36.36
Computer Systems Analysts	Bachelor's degree	156	13	210	\$48.96
Graphic Designers	Bachelor's degree	292	31	252	\$26.52
Network and Computer Systems Administrators	Bachelor's degree	105	8	134	\$44.40
Writers and Authors	Bachelor's degree	190	23	146	\$26.32

Public Safety

The CCCC public safety sector aligns with the CDE public services sector. Two colleges in the Inland Empire-Low Desert subregion currently utilize four public safety program codes (Exhibit 52).

Exhibit 52. Programs offered by community colleges in the subregion.

Programs Offered:

2105.00 - Administration of Justice

2105.10 - Corrections

2133.00 - Fire Technology

2133.50 - Fire Academy

Public safety programs in the subregion prepare students for employment in three high-quality high school-level occupations and one high-quality community college-level occupation. High-quality occupations have at least 100 annual job openings and offer a median hourly wage of \$25.74 at the regional level.

In 2022, there were more than 910 high-quality public safety jobs in the subregion related to subregional training programs (Exhibit 53).

By 2027, annual job opening projections:

- There are more than 70 high-school-level job openings projected annually for this occupational group in the subregion; over 1,350 job openings are projected annually in the greater region.
- There are more than 20 community college-level job openings projected annually for this occupational group in the subregion; over 380 job openings are projected annually in the greater region.

Exhibit 53. Education level, projected demand, and earnings for high-quality occupations, 2022 - 2027

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Correctional Officers and Jailers	High School	262	26	441	\$42.42
Detectives and Criminal Investigators	High School	71	7	128	\$53.18
Police and Sheriff's Patrol Officers	High School	385	39	787	\$48.44
Firefighters	Community College	201	21	385	\$31.07

Community College Programs Not Offered

In the subregion, six programs in the public safety sector are currently not offered (Exhibit 54).

Exhibit 54. Programs not offered by community colleges in the subregion.

Programs Not Offered:

- 2105.10 - Corrections
- 2105.20 - Probation and Parole
- 2105.30 - Industrial and Transportation Security
- 2105.40 - Forensics, Evidence, and Investigation
- 2133.10 - Wildland Fire Technology
- 2199.00 - Other Public and Protective Services

Occupational Training Opportunities

There are three programs that community colleges are not currently offering in the subregion that align with high-quality, growing occupations:

- 2105.10 – Corrections
- 2105.40 - Forensics, Evidence, and Investigation
- 2133.10 – Wildland Fire Technology

In 2022, there were over 300 high-quality public safety jobs in the subregion (Exhibit 55).

By 2027, annual job opening projections:

- There are no community college-level job openings projected annually for this occupational group in the greater region.
- There are more than 30 bachelor’s degree-level job openings projected annually for this occupational group in the subregion; over 450 job openings are projected annually in the greater region.

Exhibit 55. High-quality occupation without training programs in the subregion.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Child, Family, and School Social Workers	Bachelor's degree	308	33	454	\$29.56

Finally, the below occupations are currently being served by existing programs offered in the subregion AND could also be served by the above programs that are not offered in the subregion. If one or more of the above programs are not currently offered in the subregion and are of interest, the COE can perform a full Labor Market Analysis (LMA) on the occupations below to analyze if additional education capacity is needed (Exhibit 56).

Exhibit 56. High-quality occupations with training programs in the subregion but aligned to training programs not offered.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Correctional Officers and Jailers	High School	262	26	441	\$42.42
Detectives and Criminal Investigators	High School	71	7	128	\$53.18
Police and Sheriff's Patrol Officers	High School	385	39	787	\$48.44
Firefighters	Community College	201	21	385	\$31.07

Retail, Hospitality, and Tourism

The CCCC retail, hospitality, and tourism sector aligns with the CDE fashion and interior design sector and the hospitality, tourism, and recreation sector. Two colleges in the Inland Empire-Low Desert currently utilize four retail, hospitality, and tourism program codes (Exhibit 57).

Exhibit 57. Programs offered by community colleges in the subregion.

Programs Offered:

- 0506.50 - Retail Store Operations and Management
- 1301.10 - Consumer Services
- 1306.30 - Culinary Arts
- 1307.00 - Hospitality

Retail, hospitality, and tourism programs in the subregion prepare students for employment in two high-quality high school-level occupations and one high-quality bachelor's degree-level occupation. High-quality occupations have at least 100 annual job openings and offer a median hourly wage of \$25.74 at the regional level.

In 2022, there were over 3,520 high-quality retail, hospitality, and tourism jobs in the subregion related to subregional training programs (Exhibit 58).

By 2027, annual job opening projections:

- There are more than 160 high-school-level job openings projected annually for this occupational group in the subregion; over 1,330 job openings are projected annually in the greater region.
- There are no community college-level job openings projected annually for this occupational group in the greater region.
- There are more than 250 bachelor's degree-level job openings projected annually for this occupational group in the subregion; 2,550 job openings are projected annually in the greater region.

Exhibit 58. Education level, projected demand, and earnings for high-quality occupations, 2022 - 2027

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
Chefs and Head Cooks	High School	378	60	295	\$27.08
Sales Representatives of Services, Except Advertising, Insurance, Financial Services, and Travel	High School	890	107	1,039	\$27.58
General and Operations Managers	Bachelor's degree	2,261	257	2,550	\$48.75

Community College Programs Not Offered

In the subregion, 17 programs in the retail, hospitality, and tourism sector are currently not offered (Exhibit 59).

Exhibit 59. Programs not offered by community colleges in the subregion.

Programs Not Offered:

0509.60 - Display
0514.40 - Office Management
0516.00 - Labor and Industrial Relations
0606.00 - Public Relations
0835.70 - Aquatics and Lifesaving
0959.10 - Diving and Underwater Safety
1301.00 - Family and Consumer Sciences, General
1302.00 - Interior Design and Merchandising
1303.00 - Fashion
1303.10 - Fashion Design
1303.20 - Fashion Merchandising
1307.10 - Restaurant and Food Services and Management
1307.20 - Lodging Management
1307.30 - Resort and Club Management
3008.00 - Dry Cleaning
3009.00 - Travel Services and Tourism
3020.40 - Flight Attendant

Occupational Training Opportunities

There are seven programs that community colleges are not currently offering in the subregion that align with high-quality, growing occupations:

- 0509.60 – Display
- 0514.40 - Office Management
- 0516.00 - Labor and Industrial Relations
- 1301.00 - Family and Consumer Sciences, General
- 1302.00 - Interior Design and Merchandising
- 1303.20 - Fashion Merchandising
- 3020.40 - Flight Attendant

In 2022, there were more than 4,720 high-quality public safety jobs in the subregion (Exhibit 60).

By 2027, annual job opening projections:

- There are more than 320 high-school-level job openings projected annually for this occupational group in the subregion; over 4,930 job openings are projected annually in the greater region.
- There are no community college-level job openings projected annually for this occupational group in the greater region.
- There are more than 180 bachelor's degree-level job openings projected annually for this occupational group in the subregion; over 2,610 job openings are projected annually in the greater region.

Exhibit 60. High-quality occupations without training programs in the subregion.

Description	Entry level Education	Subregion 2022 Jobs	Subregion 2022 - 2027 Avg. Annual Openings	Regional 2022 - 2027 Avg. Annual Openings	Regional Median Hourly Earnings
First-Line Supervisors of Non-Retail Sales Workers	High School	323	29	324	\$31.75
First-Line Supervisors of Office and Administrative Support Workers	High School	1,378	149	1,763	\$30.34
First-Line Supervisors of Transportation and Material Moving Workers, Except Aircraft Cargo Handling Supervisors	High School	450	63	1,322	\$29.62
Sales Representatives, Wholesale and Manufacturing, Except Technical and Scientific Products	High School	736	86	1,528	\$29.84
Buyers and Purchasing Agents	Bachelor's degree	253	26	387	\$30.50
Compliance Officers	Bachelor's degree	202	20	319	\$34.02
Interior Designers	Bachelor's degree	145	19	114	\$31.68
Market Research Analysts and Marketing Specialists	Bachelor's degree	495	62	728	\$29.79
Marketing Managers	Bachelor's degree	171	18	208	\$58.58
Secondary School Teachers, Except Special and Career/Technical Education	Bachelor's degree	573	43	856	\$50.72

Appendix A: Methodologies and Data Sources

This report focuses on occupations identified through the Bureau of Labor Statistics (BLS) Standard Occupational Classification (SOC) System that are cross walked to California Community Colleges Taxonomy of Programs (TOP) codes. These occupations are most relevant for students who enroll in community college career education training programs (CE). This report analyzes occupations related to the 10 sectors designated by the California Community Colleges Chancellor's Office (CCCCO) with a typical entry-level education requirement of either high school, community college, or a bachelor's degree. The subregional analysis by sector allows for a comprehensive evaluation of where high-quality jobs exist and where colleges may invest in CE programs to address labor market demand.

A program inventory was conducted for each CCCCCO sector, examining programs offered by community colleges in the region. Education levels, current employment (2022 job count), projected occupational demand (annual job openings), and earnings associated with occupations in each sector are included in the assessment. For each sector, occupations that meet the high-quality job definition are highlighted, i.e., occupations that are both in-demand and have high wages. For this study, an occupation is considered in-demand if it has 100 or more regional annual job openings over the next five years. Occupations are considered high wage if their median hourly wage meets or exceeds \$25.74 per hour, the MIT living wage standard for a single adult in California. Further information on MIT Living Wage Standard Methodology is available on their website.⁶

Labor market data in this report is sourced from Lightcast 2023.4. The community college program inventory was sourced from the Chancellor's Office Curriculum Inventory (COCI 2.0) and each community college's course catalog. Each college verified the program inventory to ensure the college offerings were current and accurate. Each sector contains a list of existing program offerings and programs currently not offered by community colleges in the subregion.

⁶ While the [UW self-sufficiency standard](#) is currently used by the CO and other COEs, the self-sufficiency standard was last updated by UW in 2021, does not account for significant increases in the cost of living in the Inland Empire the last three years, and is below the State of California minimum wage of \$16.00. For these reasons, the COE will provide an alternative living wage calculation from MIT in the analysis below as an additional reference point. MIT estimates, the living wage for an adult with no kids living in 2024 is \$26.30 in Riverside County and \$25.17 in San Bernadino County.

Appendix B: Zip codes used in this subregional report

Population and Projected Population with change, Inland Empire- Low Desert Subregion, 2022-2027

Zip Code and Area	2022 Population	2027 Population	Projected % Change
92202 Indio	2,269	2,403	5.88%
92236 Coachella	42,700	45,146	5.73%
92254 Mecca	8,582	8,990	4.75%
92274 Thermal	8,740	8,943	2.33%
92258 North Palm Springs	363	371	2.14%
92240 Desert Hot Springs	41,022	41,516	1.20%
92201 Indio	64,577	65,266	1.07%
92225 Blythe	21,161	21,238	0.37%
92276 Thousand Palms	8,744	8,734	-0.12%
92234 Cathedral City	53,991	53,834	-0.29%
92226 Blythe	1,455	1,448	-0.50%
92282 Whitewater	1,349	1,340	-0.66%
92203 Indio	36,565	35,766	-2.18%
92255 Palm Desert	2,193	2,143	-2.28%
92247 La Quinta	1,601	1,564	-2.29%
92248 La Quinta	1,657	1,597	-3.61%
92239 Desert Center	150	145	-3.66%
92261 Palm Desert	2,193	2,057	-6.22%
92262 Palm Springs	25,356	23,776	-6.23%

92253 La Quinta	34,463	32,266	-6.38%
92263 Palm Springs	2,292	2,126	-7.23%
92241 Desert Hot Springs	7,614	6,790	-10.82%
92260 Palm Desert	27,474	24,430	-11.08%
92264 Palm Springs	18,914	16,709	-11.66%
92270 Rancho Mirage	17,835	15,047	-15.63%
92211 Palm Desert	25,777	21,284	-17.43%
92210 Indian Wells	5,453	4,460	-18.22%
92235 Cathedral City	1,540	1,214	-21.13%

Appendix C: Terms & Definitions

Labor Market Definitions

Industry Employment is a count of jobs in a given geography. Businesses operating within the same industry produce similar goods and services and share comparable production processes for creating these goods and services. The North American Industry Classification System (NAICS) is the federal system used to classify all business establishments into specific industries. Staffing patterns show the distribution of occupational employment and demand for each industry. For example, Community Colleges employ faculty, but the institutions also hire a variety of administrators and support staff to maintain operations.

The same is true for most industries. Regional educational institutions should be aware of the types of industries in their area to help inform the needed industry-specific occupational skills that may be required by local employers.

A **location quotient** quantifies how concentrated a particular industry, cluster, occupation, or demographic group is in a region compared to the nation. It can reveal what makes a particular region “unique.” A high location quotient (1.2 times or greater concentration in the local region compared to the nation) reveals industries that are highly represented and make the area unique. Conversely, industries with a low location quotient account for a smaller share of jobs than the national average, indicating that while job seekers may find work in these industries, they are more likely to find a higher concentration of these jobs elsewhere in the nation.

An occupation is a set of activities or tasks employees are paid to perform. Employees that perform essentially the same tasks are in the same occupation, whether or not they work in the same industry. Some occupations are concentrated in a few particular industries; other occupations are found in many industries. For example, jobs for registered nurses are concentrated in the healthcare industry sector, but educational industries may also employ these jobs. The Standard Occupational Classification (SOC) System classifies 775 detailed occupations according to the tasks and duties of each job.

Annual Job Openings are calculated by the sum of projected growth and replacement jobs ($\text{Growth} + \text{Replacements} = \text{Openings}$). Growth captures the changes in the total number of workers employed in an occupation, while replacement jobs are estimates of workers permanently leaving an occupation and needing to be replaced by new hires. A combination of both numbers indicates the total openings for the time frame.

High-Quality Occupation Definition: The analysis identified high-quality occupations that show relatively strong workforce demand (100+ regional annual job openings) and offer a median hourly wage that is higher than the California living wage standard (\$25.74 per hour). As a result, the occupations highlighted in this report can be used to calibrate training programs to address regional in-demand jobs that pay self-sustaining earnings.

Education Definitions

- **No-degree-level:** Occupations that require no formal education.
- **High-school-level:** Occupations that require a high school diploma or equivalent.
- **Community-college-level:** Occupations that mostly require some college, a postsecondary certificate, or an associate degree. These are occupations relevant to community college training.
- **Bachelor's-degree-level:** Occupations that mostly require a bachelor's degree. These occupations are mostly trained by four-year colleges and universities.
- **Advanced-degree-level:** Occupations that typically require education and training beyond a bachelor's degree.

Demographic Definitions⁷

White: includes all individuals who identify with one or more nationalities or ethnic groups originating in Europe, the Middle East, or North Africa. Examples of these groups include, but are not limited to, German, Irish, English, Italian, Lebanese, Egyptian, Polish, French, Iranian, Slavic, Cajun, and Chaldean.

Black or African American: includes all individuals who identify with one or more nationalities or ethnic groups originating in any of the black racial groups of Africa. Examples of these groups include, but are not limited to, African American, Jamaican, Haitian, Nigerian, Ethiopian, and Somali.

American Indian or Alaska Native: includes all individuals who identify with any of the original peoples of North and South America (including Central America) and who maintain tribal affiliation or community attachment. It includes people who identify as "American Indian" or "Alaska Native" and includes groups such as the Navajo Nation, Blackfeet Tribe, Mayan, Aztec, Native Village of Barrow Inupiat Traditional Government, and Nome Eskimo Community.

Asian: includes all individuals who identify with one or more nationalities or ethnic groups originating in the Far East, Southeast Asia, or the Indian subcontinent. Examples of these groups include, but are not limited to, Chinese, Filipino, Asian Indian, Vietnamese, Korean, and Japanese. The category also includes groups such as Pakistani, Cambodian, Hmong, Thai, Bengali, Mien, etc.

Native Hawaiian and Pacific Islander: includes all individuals who identify with one or more nationalities or ethnic groups originating in Hawaii, Guam, Samoa, or other Pacific Islands. Examples of these groups include, but are not limited to, Native Hawaiian, Samoan, Chamorro, Tongan, Fijian, and Marshallese.

Hispanic, Latino, or Spanish origin: includes all individuals who identify with one or more nationalities or ethnic groups originating in Mexico, Puerto Rico, Cuba, Central,

























⁷ This report uses race and ethnicity data from Lightcast collected by the U.S. Census Bureau through the American Community Survey. The terms in this document, including white, Hispanic, and Black, adhere to the terms and definitions the Census Bureau uses in collecting its data. For definitions, please refer to <https://www.census.gov/topics/population/race/about.html>.

and South America, and other Spanish cultures. Examples of these groups include, but are not limited to, Mexican or Mexican American, Puerto Rican, Cuban, Salvadoran, Dominican, Colombian, Guatemalan, Honduran, Spaniard, Ecuadorian, Peruvian, and Venezuelan.

Appendix D: Sector Crosswalk Used for Program Inventory

A program inventory study was conducted for each CCCCO sector, examining each college with related programs that align with CDE sectors. The CDE developed Career Education (CE) Model Curriculum Standards for grades 7 through 12 that categorize courses and programs into 15 industry sectors. The CE model sectors are not to be confused with the NAICS employment industry sectors discussed in the previous section of this report or with the CCCCO sectors. The CE model provides a useful way to classify postsecondary CE offerings and connect career pathways from high school to college. The relationship between the CDE and CCCCO sectors is illustrated below.

Exhibit C1. Crosswalk showing CCCCO priority and emerging sector alignment with CDE sectors

CCCO Priority and Emerging Sectors		CDE Industry Sectors	
	Advanced Manufacturing	Manufacturing and Product Development	
	Advanced Transportation	Transportation	
	Agriculture, Water & Environmental Technologies	Agriculture and Natural Resources	
	Business & Entrepreneurship	Business and Finance	
		Marketing, Sales, and Services	
	Education & Human Development	Education, Child Development, and Family Services	
	Energy, Construction & Utilities	Building and Construction Trades	
		Energy, Environment, and Utilities	
		Engineering and Architecture	
	Health	Health Science and Medical Technology	
	Information & Communication Technologies (ICT)/Digital Media	Arts, Media, and Entertainment	
		Information and Communication Technologies	
	Public Safety	Public Services	
	Retail, Hospitality & Tourism	Fashion and Interior Design	
		Hospitality, Tourism, and Recreation	