WORKFORCE INTELLIGENCE NETWORK

Research. Engagement. Solutions.

LABOR MARKET REPORT WIN REGION

Q2 2022 April - June 2022

INTRODUCTION

WIN Region Q2 2022



About This Report

The Workforce Intelligence Network for Southeast Michigan (WIN) partnership is a collaboration of Michigan Works! Agencies (MWAs) and community colleges across a 19-county region in Michigan. The counties in the WIN partnership include Clinton, Eaton, Genesee, Hillsdale, Huron, Ingham, Jackson, Lapeer, Lenawee, Livingston, Macomb, Monroe, Oakland, St. Clair, Sanilac, Shiawassee, Tuscola, Washtenaw, and Wayne, along with the city of Detroit.

The WIN data and research team analyzes job posting data at the occupation level within eleven customized occupation groups built using specific Standard Occupational Classification (SOC) codes to provide more contextualized information. Occupation groups combine data for jobs with similar skillsets, educational attainment, and experience requirements, which provides a more in-depth snapshot of the current labor market when compared to traditional industry data based upon North American Industry Classification System (NAICS) codes. Occupation outlook sections utilize these metrics to identify and display the top in-demand jobs, entry-level requirements, and earning potential.

WIN produces a quarterly 19-county region report using data from all eleven occupation groups, as well as a quarterly report for the city of Detroit that focuses on five occupation groups related to the Detroit labor market. County reports are produced annually and focus on five occupation groups that are reflective of the labor market specific to each county.

This report highlights labor market information and real-time job posting data for the WIN Region, including a workforce overview that identifies key components of the area's labor market such as labor force status, demographic, and commuting data. WIN's analysis of online job postings, a proxy for employer demand, is a pioneering method for tracking the labor market's health. This data is used to provide real-time demand and job posting information for both employers and job seekers. This report analyzes the second quarter 2022 labor market information from the WIN Region for all eleven occupation groups.

For more information about the southeast Michigan labor market, custom occupation groups, and workforce-related data projects, please visit www.WINintelligence.org or contact the data and research team directly at research@WINintelligence.org. For more information about job seeker resources and our partners, please visit www.micareertraining.org.

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ANNUAL STATE OF THE LABOR MARKET

WIN Region

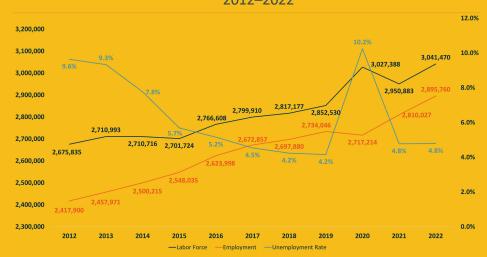
During the second quarter of 2022, southeast Michigan's labor force, employment figures, and unemployment figures all slightly decreased from Q1 2022. The number of unemployed workers decreased by 8.4 percent, with the size of the labor force decreasing by 0.6 percent and the number of employed individuals decreasing by 0.2 percent. These trends demonstrate decreased hiring rates as the upward of progression of pandemic-induced economic recovery tapers off.

All eleven occupation groups experienced growth in employer demand since Q1 2022, with Registered Nurses topping the list as the most highly demanded occupation in Q2 2022, accounting for 19,739 job postings. Customer Service occupations also continue to be in high demand throughout southeast Michigan.

Annual Labor Market Information

The labor force in southeast Michigan continues to grow in 2022, increasing by 3.1 percent (90,589 individuals) over 2021. Employment growth tracked proportionately to the labor force, with an increase of 3.1 percent (5,733 workers) during the second quarter of 2022. The unemployment rate, however, remained stable at 4.8 percent year-over-year.

Annual Labor Force, Employment, Unemployment Rate 2012–2022

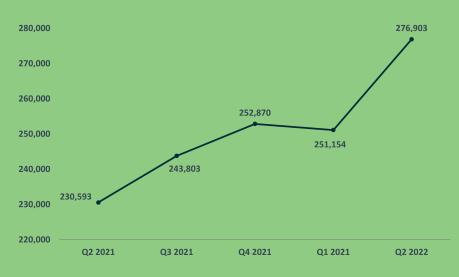


Data: BLS | Analysis: Workforce Intelligence Network

Quarterly Employer Demand Overview

Job posting data from Q2 2022 shows an increase in employer demand throughout southeast Michigan. Postings increased by 10.3 percent (25,749)postings) from Q1 2022, and year-over-year data reveals an increase of 20.1 percent (46,310 postings). Employer demand within revealed consistent growth Q2 also month-over-month.

Average Quarterly Posting Analysis WIN Region O2 2021 - O2 2022



QUARTERLY WORKFORCE INDICATORS

Key Findings

12%

Increase in employer demand, a gain of 48,920 job postings from Q1 2022

Bachelor's Degree

Most in-demand minimum education level during Q2 2022.

In Q2 2022, employment totaled

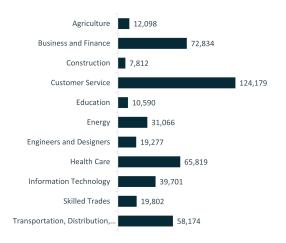
2,898,752

an increase of 5,984 workers since 01 2022

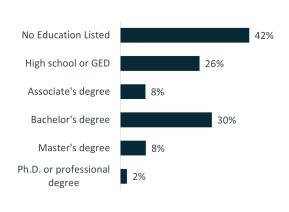
During Q2 2022, there were 457,489 unique job postings, a 12.0 percent (48,920 postings) increase over the 408,569 postings made during Q1 2022. More than half of the occupation groups this quarter experienced an increase in postings, indicating steady job demand in the region. The Customer Service occupation group had the greatest demand with 111,502 unique postings. The top posted job titles include Registered Nurses, Maintenance Technicians, Customer Service Representatives, Medical Assistants, and CDL-A Truck Drivers. More information about in-demand job postings can be found on page 7.

Of the 457,489 unique postings in the WIN Region during Q2 2022, 25.8 percent (118,032 postings) required a high school diploma or equivalent, 29.8 percent (16,332 postings) required a college degree, and 10.0 percent (45,748 postings) required an advanced degree.

Top 11 Posting Occupation Groups O2 2022



In-Demand Education Levels Q2 2022



The quarterly labor market in southeast Michigan slightly decreased in both the labor force and employment. During Q2 2022, labor force figures were 0.6 percent lower (18,772 individuals) and employment is 0.2 percent lower (5,984 individuals) than in Q1 2022. The unemployment rate decreased to 4.6 percent in Q2 2022, a 0.4 percentage point decrease from Q1 2022. Despite these decreases, both the labor force and the employment figures show annual growth of 4.0 percent in the labor force and 3.8 percent in the employment from Q2 2021. For more information about this year's unemployment rate and other labor market indicators, see page 4.

Quarterly Labor Market Data

	2nd Quarter 2021	3rd Quarter 2021	4th Quarter 2021	1st Quarter 2022	2nd Quarter 2022	Change from 1st Quarter 2022	Percent Change from 1st Quarter 2022	Change from 2nd Quarter 2021	Percent Change from 2nd Quarter 2021
Labor Force	2,921,033	2,978,065	2,997,528	3,050,856	3,032,084	-18,772	-0.6%	111,051	3.8%
Employment	2,780,975	2,831,276	2,868,100	2,898,752	2,892,768	-5,984	-0.2%	111,793	4.0%
Unemployment	140,058	146,789	129,428	152,105	139,316	-12,789	-8.4%	-742	-0.5%
Unemployment Rate	4.8%	4.9%	4.3%	5.0%	4.6%	-0.4%	na	-0.2%	na

LABOR FORCE, EMPLOYMENT, AND UNEMPLOYMENT

The southeast Michigan labor force observed steady growth throughout the second quarter of 2022 as individuals return to the job market. The total labor force increased by 90,587 individuals (3.1 percent) over 2021, while employment in the 19-county area increased by 85,733 workers (3.1 percent). With increases in both the labor force and employment, the number of unemployed individuals also increase (4,854) while the unemployment rate remained consistent at 4.8 percent.

Annual Labor Market Data 2011-2022

	2011 Annual	2012 Annual	2013 Annual	2014 Annual	2015 Annual	2016 Annual	2017 Annual	2018 Annual	2019 Annual	2020 Annual	2021 Annual	2022 YTD	Change from 2021	Percent Change 2021
Labor Force	2,674,603	2,675,835	2,710,993	2,710,716	2,701,724	2,766,608	2,799,910	2,817,177	2,852,530	3,027,388	2,950,883	3,041,470	90,587	3.1%
Employment	2,382,010	2,417,900	2,457,971	2,500,215	2,548,035	2,623,998	2,672,857	2,697,880	2,734,046	2,717,214	2,810,027	2,895,760	85,733	3.1%
Unemployment	292,593	257,935	253,021	210,500	153,690	142,610	127,053	119,297	118,484	310,174	140,856	145,710	4,854	3.4%
Unemployment Rate	10.9%	9.6%	9.3%	7.8%	5.7%	5.2%	4.5%	4.2%	4.2%	10.2%	4.8%	4.8%	0.0%	n/a

Data: Bureau of Labor Statistics

CENSUS 2020 LABOR FORCE DEMOGRAPHICS

During 2020, the most recent census year, there were about 3,116,877 people in the labor force, either working or looking for work in the 19county WIN Region. The highest unemployment rates in 2020 were seen in those aged 24 years old or accounting for younger, unemployment rate of 33.2 percent for males and 27.1 percent for females. Overall, males in the region have a slightly higher unemployment rate than females, with 6.7 percent and 6.0 percent respectively. Black or African American job seekers have a difficult time finding employment, facing an unemployment rate of 11.2 percent. Native Hawaiian or Pacific Islander job seekers also face difficulty, with an unemployment rate of 7.9 percent. Asian job seekers have the lowest unemployment rate of 4.5 percent.

Civi	lian Labor Forc	e by Demogra	phic Group	
Demographic Group	Civilian Labor	Total	Total	Unemployment
Demographic Group	Force	Employment	Unemployment	Rate
Total Population 16 +	3,116,877	2,918,637	197,940	6.4%
Sex				
Male 16+	1,623,443	1,515,228	108,215	6.7%
16-19	67,168	52,905	14,263	21.2%
20-24	164,173	144,609	19,564	11.9%
25-54	1,022,463	965,404	57,059	5.6%
55-64	281,665	268,361	13,304	4.7%
65 Plus	87,974	83,949	4,025	4.6%
Female 16+	1,493,434	1,403,409	89,725	6.0%
16-19	70,792	59,240	11,552	16.3%
20-24	160,491	143,144	17,347	10.8%
25-54	925,515	876,667	48,548	5.2%
55-64	260,866	251,407	9,459	3.6%
65 Plus	75,770	72,951	2,819	3.7%
Race				
White	2,306,489	2,193,107	113,382	4.9%
Black/African American	548,570	487,159	61,411	11.2%
Native American	9,351	8,892	459	4.9%
Asian	1,309,088	1,250,455	58,633	4.5%
Native Hawaiian/Pacific			757/77	
Islander	935	861	74	7.9%
Some Other Race	34,286	31,516	2,770	8.1%
Two or More Races	84,156	76,338	7,818	9.3%
Ethnicity				
Hispanic	124,675	114,845	9,830	7.9%

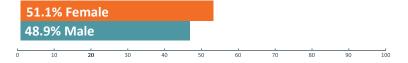
Data: American Community Survey 5-Year Es mates | Analysis: Workforce Intelligence Network

POPULATION DEMOGRAPHICS

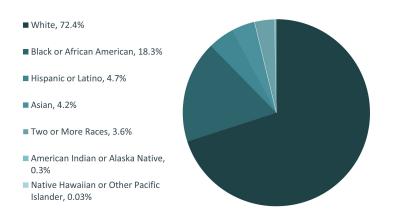
2020 Census Population

According to the data from the Census Bureau's ACS Five Year estimates, during 2020, 6,217,483 people were living in the 19-county WIN Region. The sex of the populace was split almost evenly, with 51.1 percent identifying as female, and the other 48.9 percent identifying as male. A majority of the population identified as white (72.4 percent) with the second largest number of individuals identifying as Black or African American (18.3 percent). The region has a strong middle-aged population between the ages of 25-54, for the accounting 38.4 percent of total population. The region's population skews older with 30.4 percent over the age of 55 as compared to 13.2 percent between the ages of 14-25.

Population Gender Demographics



Population Race Demographics



Population Age Demographics

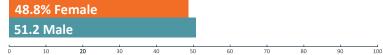


Data: American Community Survey 5-Year Estimates | Analysis: Workforce Intelligence Network

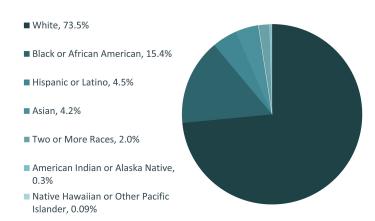
2022 Current Workforce

While the Census Bureau data lags by about two years, Emsi predictive modeling to estimate workforce information. In Q2 2022, there were a total of 2,609,524 individuals working in southeast Michigan. A slight majority were male (51.2 percent or 1,336,626 workers), while 48.8 percent (1,272,897 workers) of the workforce was female. Most of those working in the region were white, accounting for 73.5 percent of the workforce, African American or black workers accounted for 15.4 percent of the workforce. Those identifying as Hispanic or Latino accounted for 4.5 percent. Only 12.8 percent of workers were under the age of 25 compared to 23.5 percent over the age of 55, indicating an aging workforce in southeast Michigan.

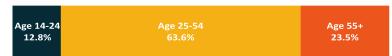
Workforce Gender Demographics



Workforce Race and Ethnicity Demographics



Workforce Age Demographics

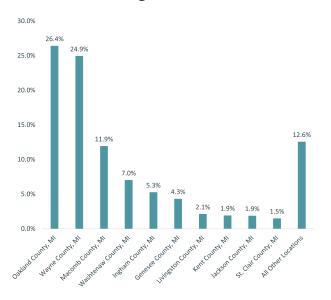


Data: Emsi | Analysis: Workforce Intelligence Network

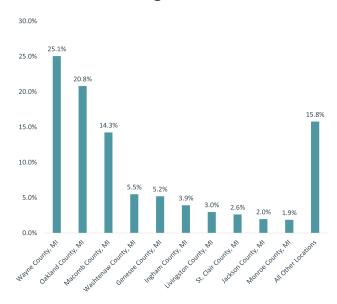
REGIONAL COMMUTING PATTERNS

According to the most recent OnTheMap data set available from the Census Bureau, during 2019, the region's workforce consisted of 2,591,658 residents and 2,588,567 employed workers. 92.2 percent of residents (2,390,564 workers) lived and worked within the 19-county region, while the remaining 201,094 residents (7.8 percent) traveled from outside of the region for work. Of the employed individuals, 198,003 workers (7.6 percent) lived outside of the region's borders and commuted in. From this information, we can see that southeast Michigan is a net exporter of labor, with more workers leaving the area for employment than inwardly commuting.

Where Michigan Residents Work



Where Michigan Workers Live



Source: U.S. Census OnTheMap, 2019
Analysis: Workforce Intelligence Network

Source: U.S. Census OnTheMap, 2019
Analysis: Workforce Intelligence Networ

Job Postings by City

1. Detroit: 73,846 Postings

2. Lansing: 32,212 Postings

3. Ann Arbor: 28,264 Postings

4. Troy: 19,210 Postings

5. Warren: 15,161 Postings

6. Southfield: 13,975 Postings

7. Dearborn: 12,805 Postings

8. Livonia: 12,428 Postings

9. Auburn Hills: 10,671 Postings

10. Farmington: 10,424 Postings



TOP POSTED JOBS

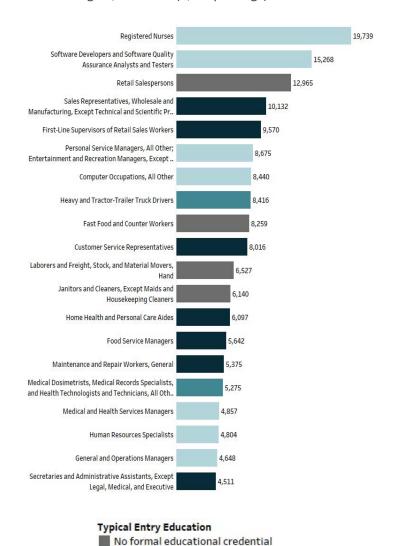
Top Posted Jobs: Q2 2022

Registered Nurses was the highest in-demand occupation in the second guarter of 2022, with 19,739 online job postings, this corresponds to the high demand for healthcare workers in general. Of the top ten overall indemand occupations, only two require a bachelor's degree for entry. Software Developers, Software Quality Assurance Analysts, and Testers (15,268 postings) and Retail Salespersons (12,965 postings) are also highly demanded in Q2. Rounding out the remaining top five posted jobs are Sales Representatives, Wholesale and Manufacturing, Except Technical and Scientific Products (10,132postings) Sales Supervisors of Retail (9,570postings) and Personal Service Managers, All Other; Entertainment and Recreation Managers, Except Gambling; and Managers, All Other (8,675postings).

Top Posted Entry-Level Jobs: Q2 2022

There were 116,384 online job ads open to individuals with zero to two years of previous work experience. Entry-level jobs such as Registered Nurses (9,227 postings) and First-Line Supervisors of Retail Sales Workers (3,433 postings) represent the top posted occupations for this experience level, and many reflect the overall top jobs. Over half of the top 20 occupations require candidates to have no formal education or a high school diploma, coupled with short to moderate-term on-the-job training. Many applicants for these entry level occupations, regardless of the education requirement, could benefit from taking some coursework to develop the skills requested in job postings.

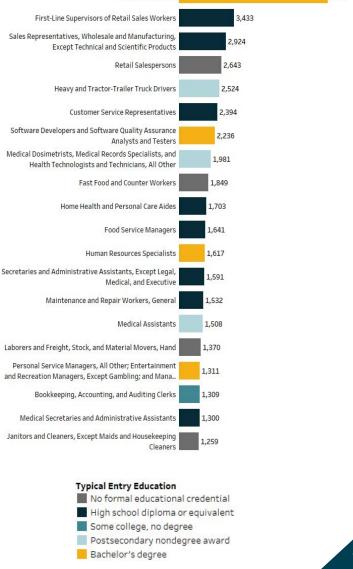
Registered Nurses



High school diploma or equivalent

Postsecondary nondegree award

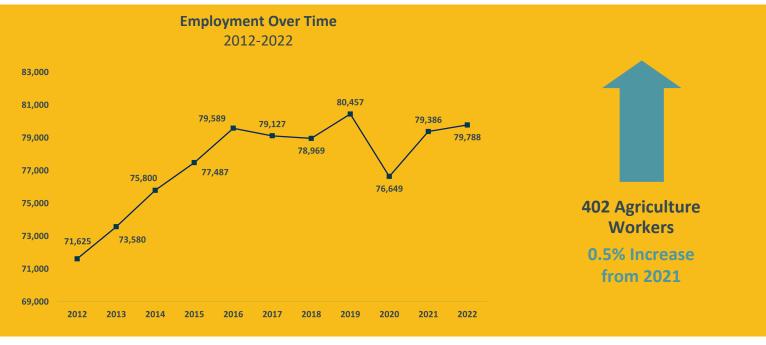
Bachelor's degree



9,227

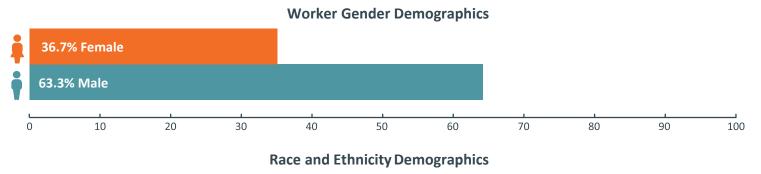
AGRICULTURE OCCUPATION GROUP

WIN's agriculture occupation group brings together occupations that require knowledge of farming, livestock, the environment, and natural sciences. Occupations range from Farm Workers, Environmental Engineers, Meat Butchers, or Recreation Workers. There are approximately 10,700 openings for these positions each year in Southeast Michigan.



Agriculture Worker Demographics

According to 2022 Emsi data, the 79,788 workers in agriculture occupations are not very diverse. A large majority of workers are white (76.7 percent), male (63.3 percent), and between the ages of 25 and 54 (63.8 percent). Only 36.7 percent of agriculture workers identify as female, while 13.1 percent of workers were under the age of 25, compared to 23.2 percent of workers are age 55 or older.



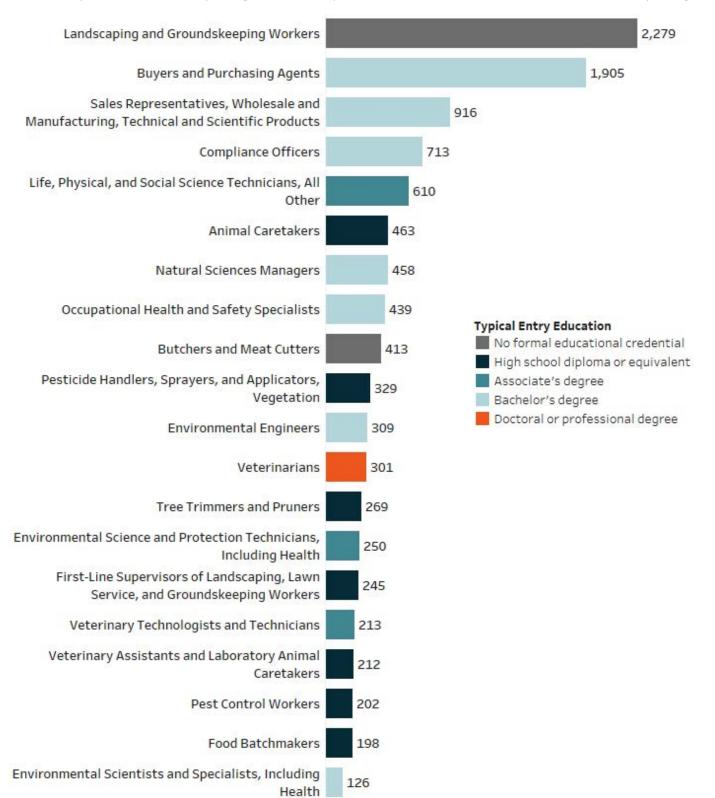
76.6 % White | 10.9% Hispanic or Latino | 7.3% Black or African-American



AGRICULTURE OCCUPATION GROUP

Top Posted Jobs

Agriculture postings totaled 12,098 ads during Q2 2022, an increase of 2,375 postings or 24.4 percent since Q1 2022. With 2,279 online job postings, Landscaping and Groundskeeping Workers is the top demanded occupation this quarter. Buyers and Purchasing Agents (1,905 postings) and Sales Representatives, Wholesale and Manufacturing, Technical and Scientific Products (916 postings) were also in high demand. Other top posted occupations include Compliance Officers (713 postings) and Life, Physical, and Social Science Technicians, All Other (610 postings).



AGRICULTURE OCCUPATION GROUP

Wage Overview

Of the top posted agriculture jobs, five of the top ten occupations in Q2 offer median wages of more than \$25 per hour. The top posted job, Landscaping and Groundskeeping Workers, offers median hourly earnings of \$ \$15.17, which translates to annual earnings of approximately \$31,554. With such a broad array of skillsets represented, agriculture wages tend to scale with education and experience.

Wage Overview for Top Posted Agriculture Jobs in Q2 2022

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
37-3011	Landscaping and Groundskeeping Workers	\$11.09	\$12.77	\$15.17	\$18.51	\$22.12
13-1028	Buyers and Purchasing Agents	\$20.15	\$25.23	\$32.94	\$43.27	\$53.49
41-4011	Sales Representatives, Wholesale and Manufacturing, Technical and Scientific Products	\$26.09	\$35.37	\$51.26	\$69.41	\$84.06
13-1041	Compliance Officers	\$19.69	\$26.89	\$35.75	\$46.24	\$51.13
19-4099	Life, Physical, and Social Science Technicians, All Other	\$13.49	\$16.19	\$19.35	\$25.03	\$30.93
39-2021	Animal Caretakers	\$10.02	\$10.70	\$11.80	\$13.84	\$16.5 <mark>6</mark>
11-9121	Natural Sciences Managers	\$32.47	\$45.67	\$56.58	\$73.21	\$93.11
19-5011	Occupational Health and Safety Specialists	\$23.04	\$28.18	\$36.36	\$45.53	\$53.52
51-3021	Butchers and Meat Cutters	\$10.38	\$11.66	\$14.92	\$18.42	\$21.82
37-3012	Pesticide Handlers, Sprayers, and Applicators, Vegetation	\$14.33	\$16.09	\$18.01	\$19.95	\$22.34

In-Demand Technical Skills

- Landscaping
- Purchasing
- Irrigation (Landscaping and Agriculture)
- Selling Techniques
- Auditing

In-Demand Education Level*

High School Diploma: 21.4%
Associate Degree: 5.9%
Bachelor's Degree: 32.3%
Master's Degree: 6.1%

*Not all job postings indicate the required educational attainment level, therefore the percentages found here may not add up to 100 percent

In-Demand Foundational Skills

- Communications
- Management
- Valid Driver's License
- Sales
- Customer Service

Top Posting Employers

- TruGreen
- University Of Michigan
- State of Michigan
- The Davey Tree Expert Company
- Banfield Pet Hospital
- Kroger
- Michigan State University
- General Dynamics
- Comerica
- PetCo

In-Demand Certifications

- Bachelor of Science in Business
- Commercial Driver's License (CDL)
- Bachelor of Science in Business Administration
- Doctor of Veterinary Medicine (DVM/VMD)
- Pesticide Applicator License

Job Postings by City

1. Detroit: 1,654 Postings

2. Ann Arbor: 858 Postings

3. Lansing: 825 Postings

J. Lansing. 625 Fostings

4. Troy: 519 Postings

5. Auburn Hills: 408 Postings

6. Livonia: 348 Postings

7. Warren: 346 Postings

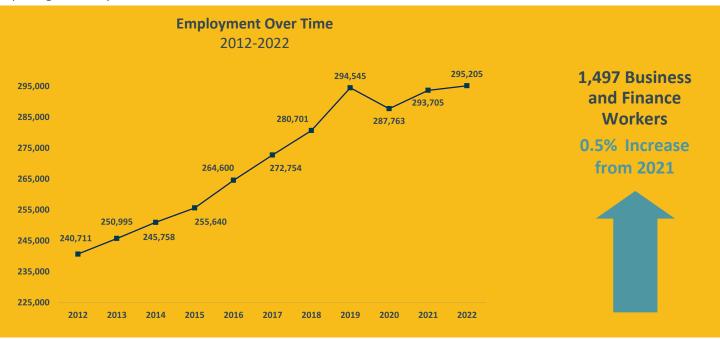
8. Southfield: 338 Postings

9. Farmington: 283 Postings

10. Novi: 268 Postings

BUSINESS AND FINANCE OCCUPATION GROUP

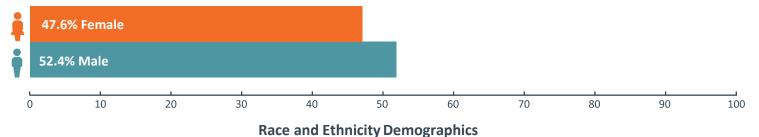
Jobs in the business and finance occupation group can be found in nearly every type of establishment/firm throughout the region. These workers need strong mathematical and accounting abilities along with project management and planning skills. Workers in this occupation group are in high demand in southeast Michigan, with about 21,000 job openings annually.



Business and Finance Worker Demographics

The business and finance occupation group is somewhat diverse in respect to its nearly 295,205 workers. Almost half the working population identify as female (47.6 percent), however 80.6 percent of workers identified as white, indicating much less diversity with respect to race than gender. Only 4.6 percent of the working population in business and finance is under the age of 25, compared to 24.9 percent age 55 and older. In some ways, this indicates an aging business and finance workforce, though it also reflects the consistent need for a bachelor's degree in these occupations.

Worker Gender Demographics



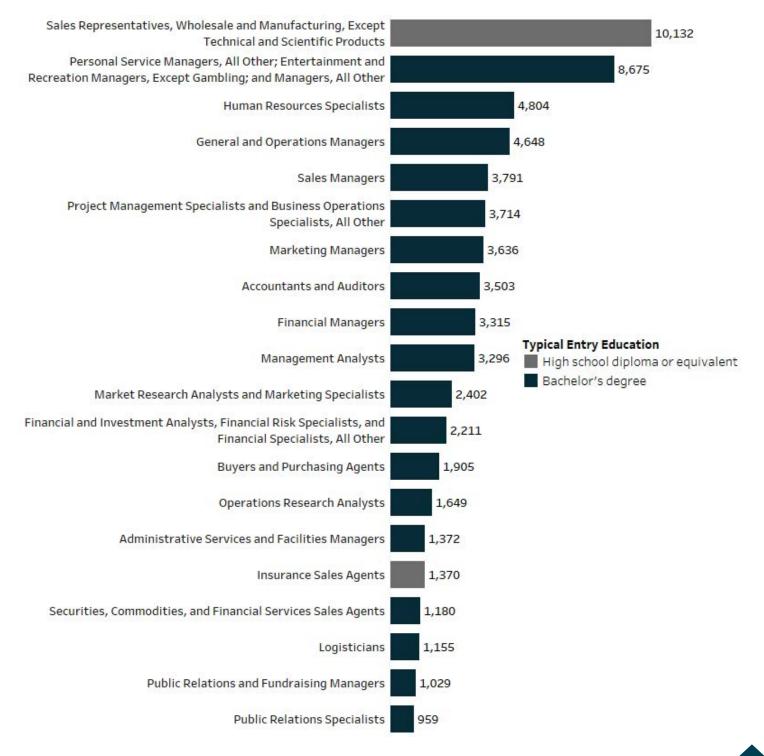
80.6% White | 10.5% Black or African-American | 4.1% Asian



BUSINESS AND FINANCE OCCUPATION GROUP

Top Posted Jobs

There were 72,834 business and finance postings during Q2 2022, an increase of 8,359 postings or 12.9 percent since Q1 2022. Sales Representatives, Wholesale and Manufacturing, Except Technical and Scientific Products is the top indemand occupation, with 10,132 postings. Personal Service Managers, All Other; Entertainment and Recreation Managers, Except Gambling; and Managers, All Other (8,675 postings) is the second highest demanded occupation, while Human Resources Specialists (4,804 postings), General and Operations Managers (4,648 postings), and Sales Managers (3,791 postings) round out the top demanded occupations.



BUSINESS AND FINANCE OCCUPATION GROUP

Wage Overview

Most business and finance related jobs offer high wages, providing a lucrative opportunity for job seekers willing to attain the necessary education. The top posted business and finance job, Sales Representatives, Wholesale and Manufacturing, Except Technical and Scientific Products, offers median hourly wages of \$32.15, translating to annual earnings of approximately \$66,873. All the top business occupations offer median wages over \$29 per hour, and most prefer a bachelor's degree for entry.

Wage Overview for Top Posted Business and Finance Jobs in Q2 2022

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
41-4012	Sales Representatives, Wholesale and Manufacturing, Except Technical and Scientific Products	\$14.63	\$20.63	\$32.15	\$47.92	\$64.47
11-9198	Personal Service Managers, All Other; Entertainment and Recreation Managers, Except Gambling; and Managers, All Other	\$29.40	\$40.40	\$54.50	\$69.22	\$86.47
13-1071	Human Resources Specialists	\$17.66	\$22.48	\$29.56	\$38.29	\$48.21
11-1021	General and Operations Managers	\$21.30	\$32.58	\$52.19	\$79.79	\$110.79
11-2022	Sales Managers	\$37.71	\$51.73	\$68.23	\$85.80	\$122.21
13-1198	Project Management Specialists and Business Operations Specialists, All Other	\$20.61	\$27.03	\$35.94	\$47.25	\$59.73
11-2021	Marketing Managers	\$35.69	\$48.59	\$64.31	\$81.30	\$110.21
13-2011	Accountants and Auditors	\$22.33	\$27.19	\$34.45	\$44.56	\$57.47
11-3031	Financial Managers	\$38.49	\$47.68	\$62.00	\$79.73	\$113.52
13-1111	Management Analysts	\$26.51	\$32.87	\$41.70	\$52.99	\$66.99

In-Demand Technical Skills

- Marketing
- Finance
- Accounting
- Auditing
- Project Management

In-Demand Foundational Skills

- Communications
- Management
- Sales
- Leadership
- Customer Service

Top Posting Employers

- Deloitte
- University Of Michigan
- Facebook
- Robert Half
- CBRE Group
- Kelly Services
- TruGreen
- State of Michigan
- General Motors
- PricewaterhouseCoopers

In-Demand Certifications

- Master of Business Administration (MBA)
- Bachelor of Science in Business
- Certified Public Accountant
- Project Management Professional Certification
- Bachelor of Science in Business Administration

Job Postings by City

Detroit: 17,724 Postings
 Lansing: 8,235 Postings

3. Ann Arbor: 5,187 Postings

4. Troy: 4,313 Postings

5. Southfield: 3,149 Postings

6. Auburn Hills: 2,310 Postings

7. Warren: 1,946 Postings

8. Farmington: 1,862 Postings

9. Dearborn: 1,860 Postings

10. Livonia: 1,838 Postings

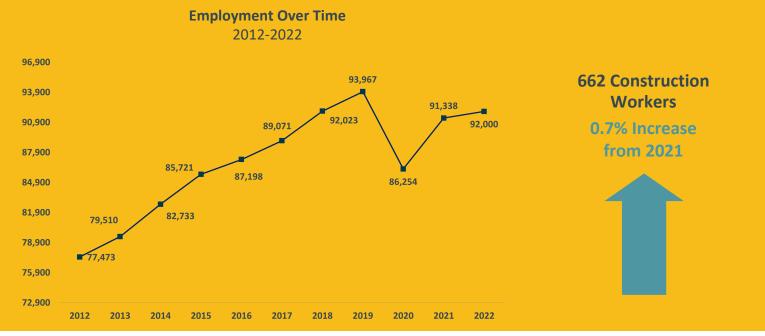
In-Demand Education Level*

High School Diploma: 15.4%
Associate Degree: 6.7%
Bachelor's Degree: 60.4%
Master's Degree: 13.7%

*Not all job postings indicate the required educational attainment level, therefore the percentages found here may not add up to 100 percent

CONSTRUCTION OCCUPATION GROUP

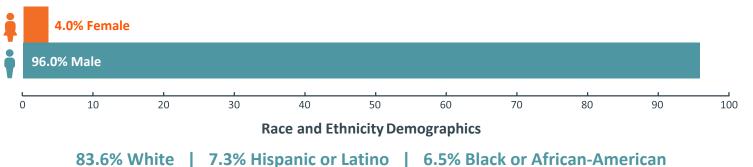
Jobs in the WIN construction occupation group are associated with the skilled trades, engineering, management, and planning. Many construction employers are slowly adopting online job search methods, so online job ads may not provide a complete picture of demand for these workers. Even so, it is an important and in-demand occupation group for southeast Michigan, with about 14,000 annual job openings, and posting data provides a glimpse into employer needs.



Construction Worker Demographics

According to 2022 Emsi data, the construction occupation group is not very diverse, despite having over 92,000 workers. A large majority of workers are male (96.0 percent) between the ages of 25 and 54 (69.0 percent). Only 4.0 percent of agriculture workers identify as women, while 10.8 percent of workers were under the age of 25, compared to 20.3 percent of workers who are age 55 or older.

Worker Gender Demographics

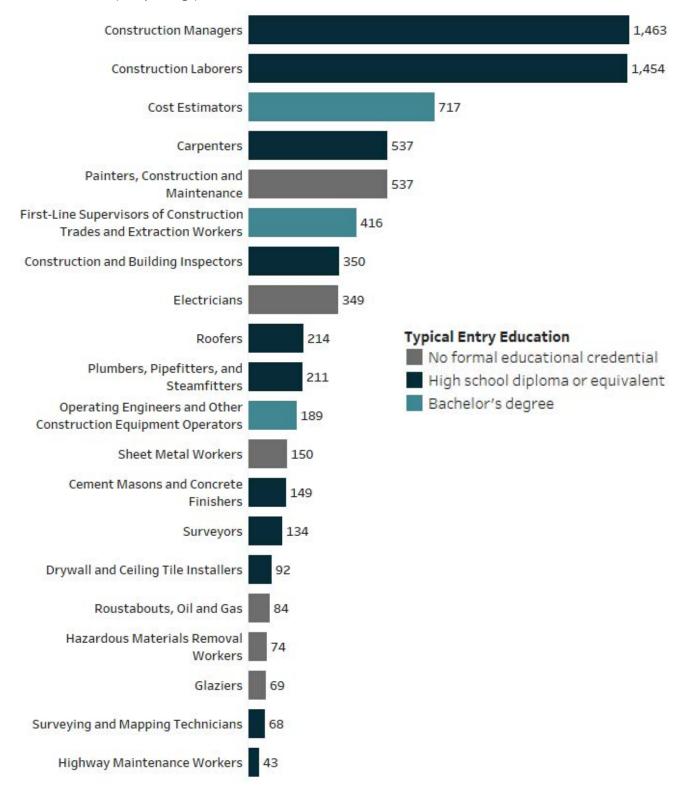




CONSTRUCTION OCCUPATION GROUP

Top Posted Jobs

The construction occupation group had 7,812 postings in Q2 2022, an increase of 1,464 postings or 23.1 percent since Q1 2022. Construction Managers is the top-posted occupation during the quarter, with 1,463 postings. Other top posted jobs include Construction Laborers (1,454 postings), Cost Estimators (717 postings), Carpenters (537 postings), Painter, Construction and Maintenance (537 postings), and First-Line Supervisors of Construction Trades and Extraction Workers (416 postings).



CONSTRUCTION OCCUPATION GROUP

Wage Overview

The top posted construction job, Construction Managers, offers a median wage of \$51.65 per hour or \$107,437 per year. Six of the top ten occupations offer median wages of more than \$25.00 per hour. Those working in apprentice-able occupations can also anticipate high wage potential, such as Plumbers, Pipefitters, and Steamfitters, which report a median wage of \$35.30 per hour or \$73,414 annually.

Wage Overview for Top Posted Construction Jobs in Q2 2022

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
11-9021	Construction Managers	\$32.19	\$39.09	\$51.65	\$65.16	\$82.77
47-2061	Construction Laborers	\$13.35	\$15.89	\$20.03	\$24.86	\$29.78
13-1051	Cost Estimators	\$18.70	\$23.67	\$31.16	\$41.09	\$53.04
47-2031	Carpenters	\$15.08	\$18.13	\$24.75	\$31.32	\$36.68
47-2141	Painters, Construction and Maintenance	\$14.31	\$16.74	\$21.18	\$28.00	\$31.69
47-1011	First-Line Supervisors of Construction Trades and Extraction Workers	\$21.85	\$27.73	\$35.96	\$44.94	\$52.68
47-4011	Construction and Building Inspectors	\$13.74	\$17.53	\$25.93	\$31.38	\$37.00
47-2111	Electricians	\$17.78	\$24.05	\$32.92	\$39.27	\$47.22
47-2181	Roofers	\$16.66	\$19.62	\$24.74	\$33.13	\$39.12
47-2152	Plumbers, Pipefitters, and Steamfitters	\$16.16	\$24.29	\$35.30	\$41.46	\$47.46

In-Demand Technical Skills

- Construction
- Subcontracting
- Construction Management
- Carpentry
- Painting

In-Demand Education Level*

High School Diploma: 23.2%
Associate Degree: 5.4%
Bachelor's Degree: 17.9%
Master's Degree: 1.5%

*Not all job postings indicate the required educational attainment level, therefore the percentages found here may not add up to 100 percent

In-Demand Foundational Skills

- Communications
- Valid Driver's License
- Management
- Customer Service
- Operations

Top Posting Employers

- Michael Page
- GPAC
- Aerotek
- State Of Michigan
- Tradesmen International
- Walbridge
- Sawyer Services
- CDM Smith
- CyberCoders
- Jobot

In-Demand Certifications

- Commercial Driver's License (CDL)
- Project Management Professional Certification
- LEED Accredited Professional (AP)
- Certified Forklift Operator
- Journeyman Electrician

Job Postings by City

1. Detroit: 1,414 Postings

2. Lansing: 497 Postings

3. Ann Arbor: 349 Postings

4. Warren: 292 Postings

5. Livonia: 275 Postings

s. Livernar 275 resem

6. Novi: 242 Postings

7. Troy: 213 Postings

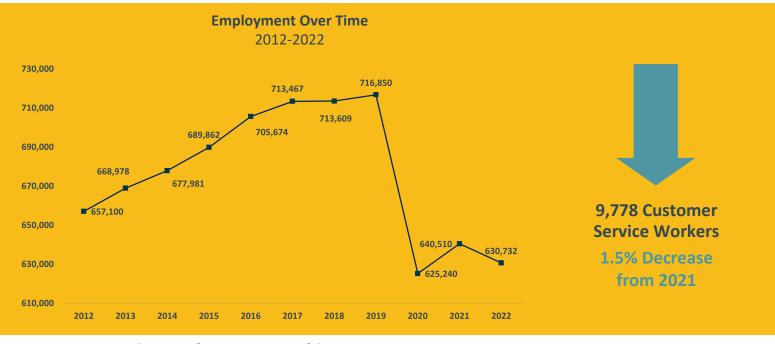
8. Sterling Heights: 210 Postings

9. Farmington: 202 Postings

10. Flint: 162 Postings

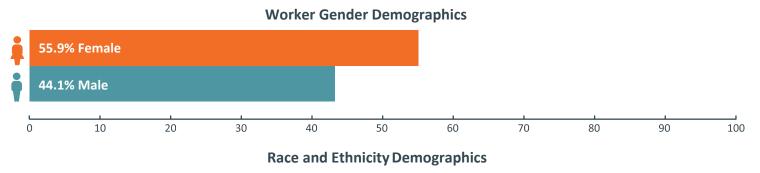
CUSTOMER SERVICE OCCUPATION GROUP

The customer service group is the largest occupation group that WIN analyzes, both in terms of employment and online job postings. This group is very important to the region because it is often a leading indicator, being the first to grow when the economy expands and the first to contract in a downturn. As defined by WIN, this group encompasses all customer service occupations, with skills transferrable across the retail sector, the hotel industry, food and beverage service industry, call centers, and other areas.



Customer Service Worker Demographics

In Q2 2022, there were 630,732 workers in the customer service occupation group, with a more diverse workforce than other groups analyzed. During the quarter, 55.9 percent of workers identified as female, while 27.0 percent of workers in customer service identified as a racial minority. Almost a quarter of the customer service workers (24.4 percent) were under the age of 24, as compared to the 55 and older age group which was 20.8 percent.



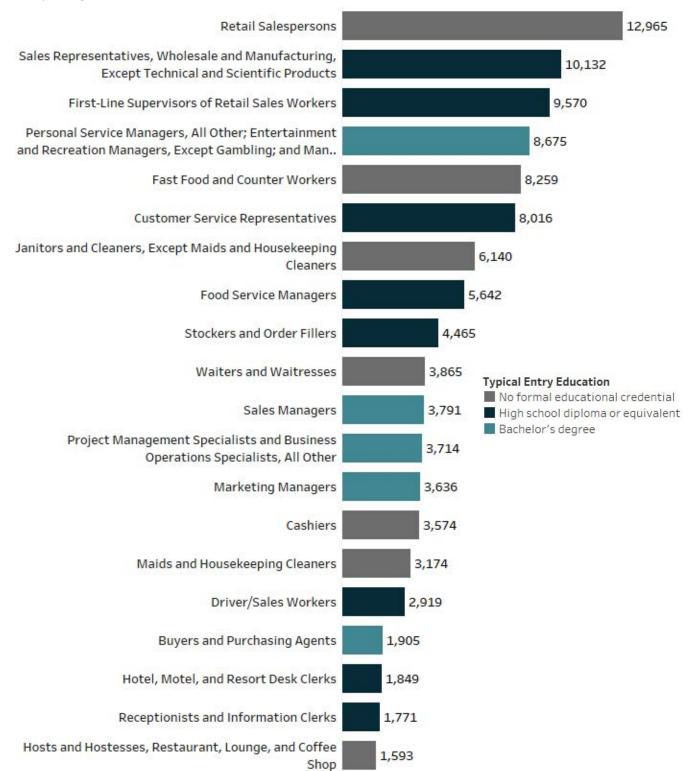
73.0% White | 16.1% Black or African-American | 5.1% Hispanic or Latino



CUSTOMER SERVICE OCCUPATION GROUP

Top Posted Jobs

Demand for customer service occupations reached 124,179 postings in Q2 2022, an increase of 12,677 postings or 11.4 percent since Q1 2022. Retail Salespersons retained the highest in-demand customer service occupation during the quarter, with 12,965 postings. Other top posted jobs include Sales Representatives, Wholesale and Manufacturing, Except Technical and Scientific Products (10,132 postings), First-Line Supervisors of Retail Sales Workers (9,570 postings), Fast Food and Counter Workers (8,259 postings), and Customer Service Representatives (8,016 postings).



CUSTOMER SEVICE OCCUPATION GROUP

Wage Overview

Despite being in high demand, most customer service-related occupations offer relatively low wages. However, half of the top ten posted occupations report median wages over the state's median wage of \$21.73 per hour, many of which are management roles requiring both education and experience. The top posted occupation this quarter, Retail Salespersons earn a median hourly wage of \$12.66. With interest in gaining additional experience and training, workers can transition to managerial positions such as First-Line Supervisors of Retail Sales Workers, which has a median wage of \$19.20 per hour or \$39,933 annually.

Wage Overview for Top Posted Customer Service Jobs in Q2 2022

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
41-2031	Retail Salespersons	\$10.18	\$11.09	\$12.66	\$16.01	\$22.39
41-4012	Sales Representatives, Wholesale and Manufacturing, Except Technical and Scientific Products	\$14.63	\$20.63	\$32.15	\$47.92	\$64.47
41-1011	First-Line Supervisors of Retail Sales Workers	\$12.61	\$15.29	\$19.20	\$26.13	\$35.41
11-9198	Personal Service Managers, All Other; Entertainment and Recreation Managers, Except Gambling; and Managers, All Other	\$29.40	\$40.40	\$54.50	\$69.22	\$86.47
35-3023	Fast Food and Counter Workers	\$9.99	\$10.31	\$11.13	\$12.21	\$13.95
43-4051	Customer Service Representatives	\$11.70	\$13.81	\$17.55	\$23.29	\$30.86
37-2011	Janitors and Cleaners, Except Maids and Housekeeping Cleaners	\$10.28	\$11.28	\$13.02	\$16.26	\$19.59
11-9051	Food Service Managers	\$23.04	\$27.10	\$35.08	\$44.69	\$49.96
53-7065	Stockers and Order Fillers	\$10.57	\$11.85	\$14.14	\$18.09	\$24.51
35-3031	Waiters and Waitresses	\$9.78	\$10.10	\$11.02	\$12.86	\$16.97

In-Demand Technical Skills

- Merchandising
- **Restaurant Operation**
- Selling Techniques
- Marketing
- Cascading Style Sheets (CSS)

In-Demand Education Level*

High School Diploma: 30.4%

Associate Degree: 4.1%

Bachelor's Degree: 21.5%

Master's Degree: 4.4%

In-Demand Foundational Skills

- **Customer Service**
- Communications
- Sales
- Management
- Leadership

Top Posting Employers

- Meijer
- Dollar General
- **Great Clips**
- Walmart
- Lowe's
- Panera Bread
- Kroger
- McDonald's
- Deloitte
- Applebee's
- **Marriott International**

In-Demand Certifications

- Bachelor Of Science in Business Admin
- Master of Business Administration (MBA)
- **Barber License**
- **Project Management Professional** Certification
- ServSafe Certification

Job Postings by City

1. Detroit: 16,351 Postings

2. Lansing: 7,489 Postings

3. Ann Arbor: 6,745 Postings

4. Troy: 5,780 Postings

5. Livonia: 3,650 Postings

6. Novi: 3,543 Postings

7. Warren: 3,390 Postings

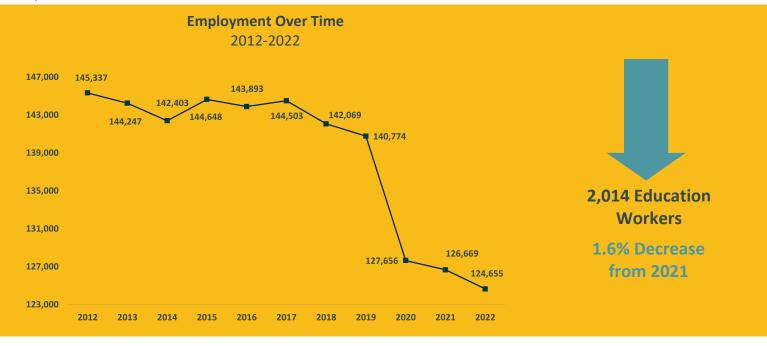
8. Southfield: 3,338 Postings 9. Auburn Hills: 2,894 Postings

10. Dearborn: 2,812 Postings

*Not all job postings indicate the required educational attainment level, therefore the percentages found here may not add up to 100 percent

EDUCATION OCCUPATION GROUP

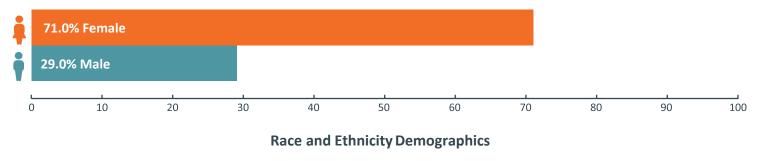
Education-related jobs can be found both in the private and public sectors. Teachers and other education related workers are employed in public schools, private schools, and training institutions, and there are about 15,000 openings for these positions annually. Jobs in the education occupation group require a variety of skills and credentials dependent on the target age group and topic area for the educator.



Education Worker Demographics

According to 2022 Emsi data, employment decreased by 2,014 or 1.6 percent since 2021, for a total of 124,655 workers in 2022. This occupation group is composed primarily of females (71.0 percent) between the ages of 25 and 54 (65.7 percent). Only 29.0 percent of workers are males, and only 19.2 percent of workers identify as a racial minority.

Worker Gender Demographics



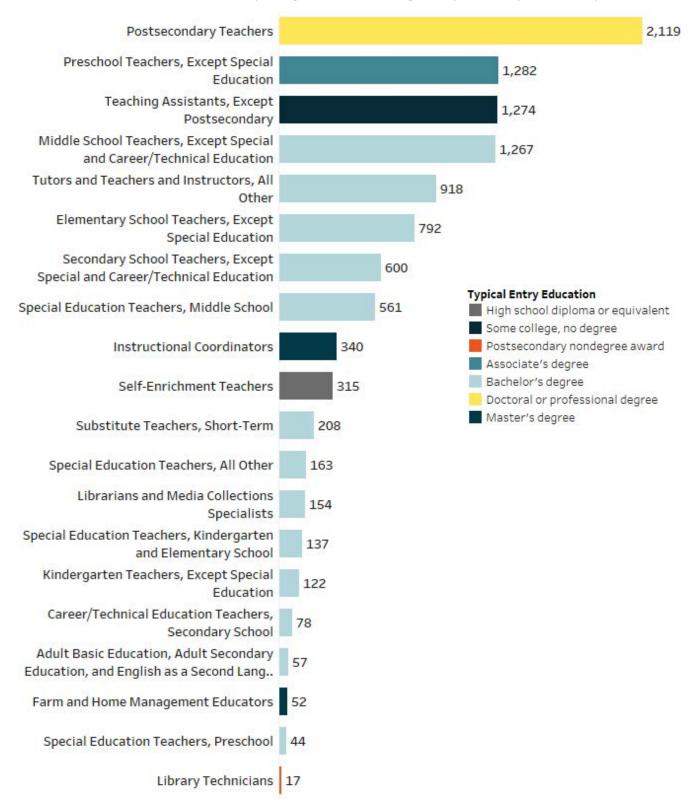
80.8% White | 9.0% Black or African-American | 3.6% Asian



EDUCATION OCCUPATION GROUP

Top Posted Jobs

Online job ads increased by 1,995 postings or 23.2 percent since Q1 2022, bringing Q2 2022 demand to 10,590 postings. Postsecondary Teachers remained the highest in-demand education occupation throughout the quarter, with 2,119 postings. Preschool Teachers, Except Special Education (1,282 postings), Teaching Assistants, Except Postsecondary (1,274 postings), Middle School Teachers, Except Special and Career/Technical Education (1,267 postings), and Tutors and Teachers and Instructors, All Other (918 postings) were also among the top five occupations this quarter.



EDUCATION OCCUPATION GROUP

Wage Overview

Many education jobs, particularly permanent positions that require teaching older students, offer competitive median wages with growth potential. These positions provide an excellent opportunity for job seekers willing to attain the necessary credentials and experience. Six of the top ten posted education jobs offer median wages of over \$30 per hour. The top posted job, Postsecondary Teachers, offers a median wage of \$41.00 hourly, translating to annual earnings of about \$85,284.

Wage Overview for Top Posted Education Jobs in Q2 2022

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
25-1099	Postsecondary Teachers	\$21.77	\$29.75	\$41.00	\$56.26	\$73.03
25-2011	Preschool Teachers, Except Special Education	\$10.16	\$11.35	\$14.25	\$20.20	\$27.51
25-9045	Teaching Assistants, Except Postsecondary	\$10.31	\$11.95	\$13.76	\$15.65	\$18.55
25-2022	Middle School Teachers, Except Special and Career/Technical Education	\$19.41	\$23.48	\$31.29	\$38.31	\$44.88
25-3097	Tutors and Teachers and Instructors, All Other	\$10.81	\$12.88	\$17.16	\$27.90	\$40.83
25-2021	Elementary School Teachers, Except Special Education	\$20.14	\$24.93	\$33.95	\$42.80	\$49.89
25-2031	Secondary School Teachers, Except Special and Career/Technical Education	\$19.87	\$23.61	\$30.35	\$37.90	\$44.36
25-2057	Special Education Teachers, Middle School	\$20.50	\$24.95	\$30.57	\$39.68	\$47.35
25-9031	Instructional Coordinators	\$22.28	\$27.58	\$34.64	\$42.26	\$49.26
25-3021	Self-Enrichment Teachers	\$10.05	\$12.13	\$16.73	\$22.05	\$27.61

In-Demand Technical Skills

- Lesson Planning
- Special Education
- Child Development
- Cascading Style Sheets (CSS)
- WebKit

In-Demand Education Level*

High School Diploma: 18.4%
Associate Degree: 9.1%
Bachelor's Degree: 35.3%
Master's Degree: 16.0%

*Not all job postings indicate the required educational attainment level, therefore the percentages found here may not add up to 100 percent

In-Demand Foundational Skills

- Teaching
- Communications
- Leadership
- Basic Math
- Planning

Top Posting Employers

- Stanford University
- University Of Michigan
- KinderCare
- Michigan State University
- Stride
- Chippewa Valley Schools
- Learning Care
- Jackson College
- Distinctive Schools

In-Demand Certifications

- No Child Left Behind Act (NCLB) Standards
- Bachelor of Science in Nursing (BSN)
- Alternative Teacher Certification
- Basic Life Support (BLS) Certification
- Master Of Science in Nursing (MSN)

Job Postings by City

Detroit: 1,696 Postings
 Ann Arbor: 928 Postings

3. Rochester: 510 Postings

4. Flint: 352 Postings

5. Lansing: 344 Postings

6. East Lansing: 301 Postings

7. Dearborn: 256 Postings

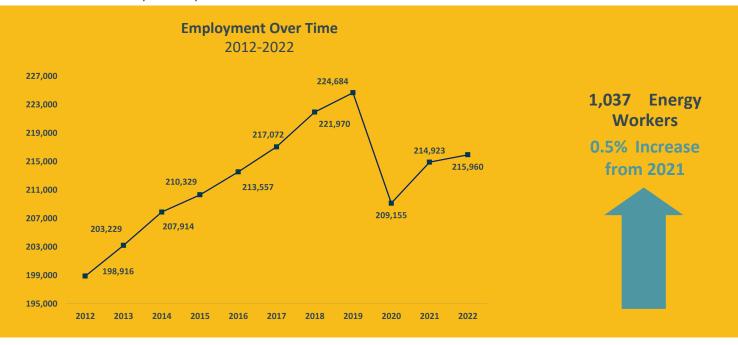
8. Warren: 246 Postings

9. Jackson: 242 Postings

10. Southfield: 241 Postings

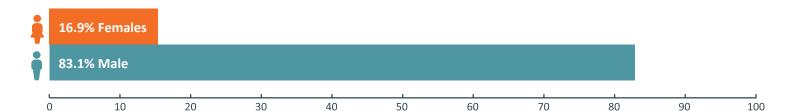
ENERGY OCCUPATION GROUP

Energy-related occupations encompass jobs in engineering, science, mining, and extraction. Workers in this field have a range of skills all related to keeping businesses and homes powered. Energy companies employ workers in a variety of occupations, many of which are also included in other WIN occupation groups. Posting data referenced in this section pertains only to job postings from energy-related businesses, while employment and wage data apply for these workers in every industry.



Energy Worker Demographics

For Q2 2022, there were 215,960 workers in the energy occupation group. This group is primarily made up of males (83.1 percent) between the ages of 25 and 54 (70.3 percent), with 16.9 percent of workers identifying as female and 20.8 percent identifying as a racial minority. In this quarter, 4.9 percent of the workers in the occupation group are under the age of 25 compared to the 24.8 percent 55 years of age or older.



Worker Gender Demographics

79.2% White | 9.4% Black or African-American | 6.3% Asian

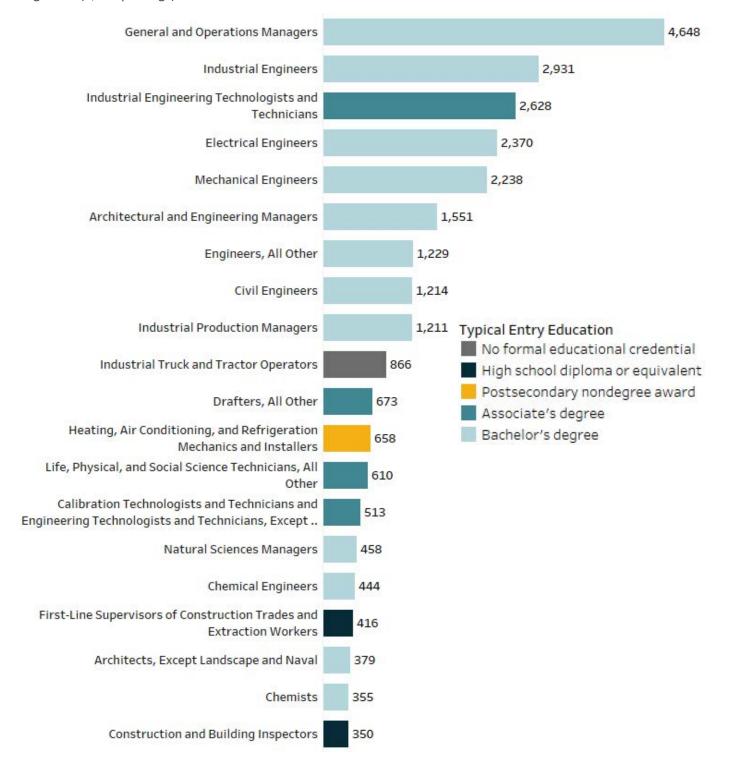
Race and Ethnicity Demographics



ENERGY OCCUPATION GROUP

Top Posted Jobs

This quarter saw 31,066 unique postings for energy workers, an increase of 3,822 postings or 14.0 percent from Q1 2022. General and Operations Managers is the most sought-after occupation with 4,648 postings by energy industry employers. Industrial Engineers is in the second position with 2,931 postings. Other top posted jobs include Industrial Engineering Technologists and Technicians (2,628 postings), Electrical Engineers (2,370 postings), and Mechanical Engineers (2,238 postings).



ENERGY OCCUPATION GROUP

Wage Overview

The demand for engineers and highly specialized trades in the energy field create lucrative opportunities for job seekers willing to obtain the education or training requirements related to these jobs. Nine of the top ten energy occupations have median wages over \$28 per hour. The top posted energy job, General and Operations Managers, offers a median hourly wage of \$52.19, or annual earnings of approximately \$108,552. Technician and construction-focused positions related to energy generally have shorter term educational requirements than engineers and pay somewhat higher than similar occupations in other industries.

Wage Overview for Top Posted Energy Jobs in Q2 2022

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
11-1021	General and Operations Managers	\$21.30	\$32.58	\$52.19	\$79.79	\$110.79
17-2112	Industrial Engineers	\$31.82	\$37.68	\$46.35	\$56.09	\$63.82
17-3026	Industrial Engineering Technologists and Technicians	\$19.36	\$23.38	\$28.85	\$36.13	\$42.98
17-2071	Electrical Engineers	\$31.33	\$37.38	\$45.67	\$55.07	\$64.66
17-2141	Mechanical Engineers	\$31.74	\$36.71	\$45.14	\$56.18	\$65.58
11-9041	Architectural and Engineering Managers	\$48.10	\$56.09	\$67.19	\$79.77	\$93.03
17-2199	Engineers, All Other	\$25.43	\$34.00	\$42.69	\$56.49	\$67.03
17-2051	Civil Engineers	\$26.38	\$30.60	\$37.35	\$45.80	\$53.53
11-3051	Industrial Production Managers	\$33.91	\$43.56	\$56.39	\$71.67	\$88.85
53-7051	Industrial Truck and Tractor Operators	\$13.04	\$15.02	\$18.47	\$24.98	\$30.34

In-Demand Technical Skills

- Mechanical Engineering
- Electrical Engineering
- New Product Development
- Auditing
- Automation

In-Demand Foundational Skills

- Communications
- Management
- **Operations**
- Leadership
- **Problem Solving**

■ High School Diploma: 18.2%

In-Demand Education Level*

- Associate Degree: 8.7%
- Bachelor's Degree: 50.8%
- Master's Degree: 14.7%
- *Not all job postings indicate the required educational attainment level, therefore the percentages found here may not add up to 100 percent
- **General Motors**

Top Posting Employers

- Actalent
- Aerotek
- **GPAC**
- DTE Energy
- **University Of** Michigan
- **Kelly Services**
- Facebook
- Ford
- Randstad

In-Demand Certifications

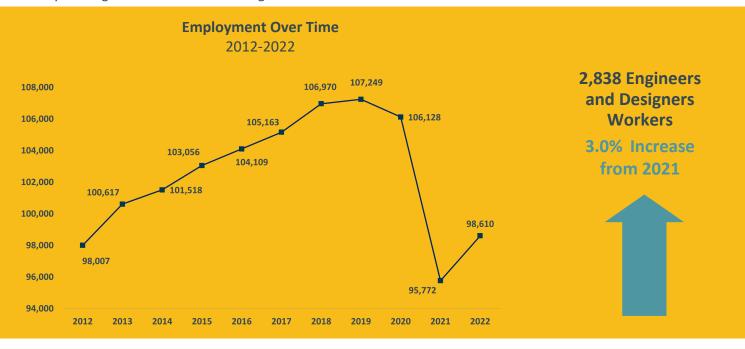
- **Professional Engineer**
- Master of Business Administration (MBA)
- Commercial Driver's License (CDL)
- **Licensed Professional Engineer**
- Six Sigma Black Belt Certification

Job Postings by City

- 1. Detroit: 5,136 Postings
- 2. Lansing: 2,396 Postings
- 3. Ann Arbor: 2,122 Postings
- 4. Warren: 1,788 Postings 5. Auburn Hills: 1,495 Postings
- 6. Troy: 1,378 Postings
- 7. Dearborn: 974 Postings
- 8. Livonia: 948 Postings
- 9. Sterling Heights: 920 Postings
- 10. Southfield: 853 Postings

ENGINEERS AND DESIGNERS OCCUPATION GROUP

Jobs in the manufacturing industry can range from assembly and production, skilled trades and technicians, designers and engineers, and even computer-related occupations such as software development. Demand for engineers in the region has been consistent, and employment opportunities have grown quickly. There are about 8,500 openings annually for engineers in southeast Michigan.



Engineers and Designers Worker Demographics

According to Q2 2022 Emsi data, the 99,057 workers in the engineering and design group are not particularly diverse. Just 5.0 percent of the related workforce is under 25, likely due to the consistently high educational requirements. Female workers account for 14.1 percent of the current workforce and only 22.6 percent identify as a race other than white. As the labor force continues to change, this field would benefit from seeking a more diverse talent pool.

Worker Gender Demographics



Race and Ethnicity Demographics

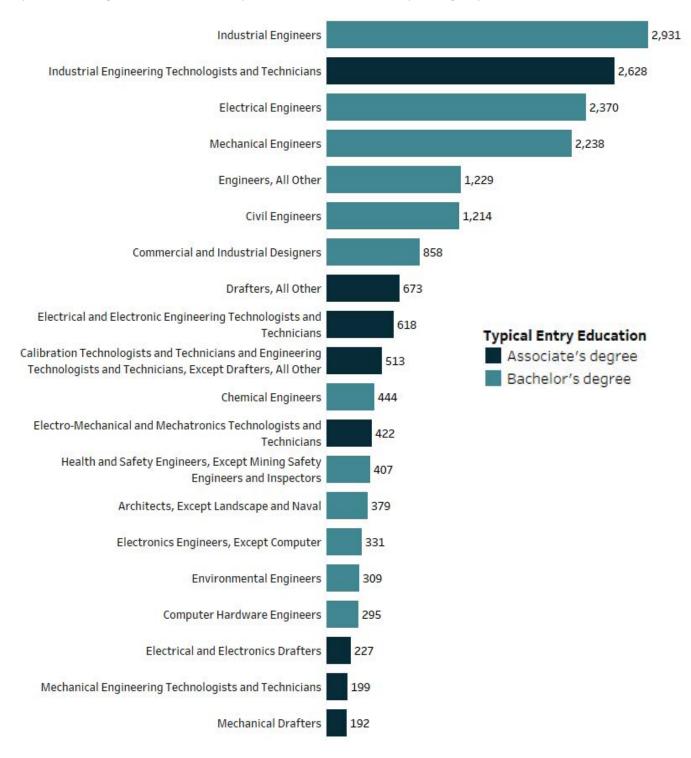
77.4% White | 10.4% Asian | 7.5% Black or African-American



ENGINEERS AND DESIGNERS OCCUPATION GROUP

Top Posted Jobs

Online job ads for engineers and designers totaled 19,277 postings in Q2 2022, an increase of 13.5 percent (2,293 postings). Industrial Engineers are the highest in-demand engineering and design occupation this quarter, having 2,931 postings. Industrial Engineering Technologists and Technicians garnered 2,628 postings, ranking second place within the occupation group. Six of the top ten in-demand occupations typically require a bachelor's degree, indicating the importance of higher education as a requirement to enter this occupation group.



ENGINEERS AND DESIGNERS OCCUPATION GROUP

Wage Overview

Most engineering and design related jobs offer high wages, providing a lucrative opportunity to job seekers willing to meet the minimum education requirements for these jobs. Median wages are above \$28 per hour across the top occupations, and the top posted engineering and design job, Industrial Engineers, offers a median hourly wage of \$46.35, equating to an annual salary of approximately \$96,417.

Wage Overview for Top Posted Engineers and Designers Jobs in Q2 2022

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
17-2112	Industrial Engineers	\$31.82	\$37.68	\$46.35	\$56.09	\$63.82
17-3026	Industrial Engineering Technologists and Technicians	\$19.36	\$23.38	\$28.8 <mark>5</mark>	\$36.13	\$42.98
17-2071	Electrical Engineers	\$31.33	\$37.38	\$45.67	\$55.07	\$64.66
17-2141	Mechanical Engineers	\$31.74	\$36.71	\$45.14	\$56.18	\$65.58
17-2199	Engineers, All Other	\$25.43	\$34.00	\$42.69	\$56.49	\$67.03
17-2051	Civil Engineers	\$26.38	\$30.60	\$37.35	\$45.80	\$53.53
27-1021	Commercial and Industrial Designers	\$24.09	\$29.40	\$40.51	\$48.12	\$55.96
17-3023	Electrical and Electronic Engineering Technologists and Technicians	\$18.89	\$23.43	\$30.30	\$35.63	\$40.46
17-3019	Drafters, All Other	\$19.00	\$24.13	\$28.45	\$32.97	\$38.93
17-3098	Calibration Technologists and Technicians and Engineering Technologists and Technicians, Except Drafters, All Other	\$17.23	\$22.96	\$33.71	\$43.42	\$51.59

In-Demand Foundational Skills

In-Demand Technical Skills

- **Electrical Engineering**
- Mechanical Engineering
- New Product Development
- Computer-Aided Design
- AutoCAD

100 percent

Top Posting Employers

Communications

Problem Solving

Management

Operations

Leadership

High School Diploma: 12.7%

In-Demand Education Level*

- Associate Degree: 9.7% ■ Bachelor's Degree: 57.5%
- Master's Degree: 16.8%
- *Not all job postings indicate the required educational attainment level, therefore the percentages found here may not add up to
- **General Motors**
- ZF
- Actalent
- **GPAC**
- Aerotek
- **DTE Energy**
- American Axle & Manufacturing
- Iconma, L.L.C.
- **CDM Smith**

In-Demand Certifications

- **Professional Engineer**
- **Licensed Professional Engineer**
- Security Clearance
- Six Sigma Green Belt Certification
- Six Sigma Black Belt Certification

Job Postings by City

1. Detroit: 2,698 Postings

2. Warren: 1,444 Postings

3. Auburn Hills: 1,350 Postings

4. Ann Arbor: 1,268 Postings

5. Lansing: 1,050 Postings

6. Troy: 995 Postings

7. Dearborn: 831 Postings

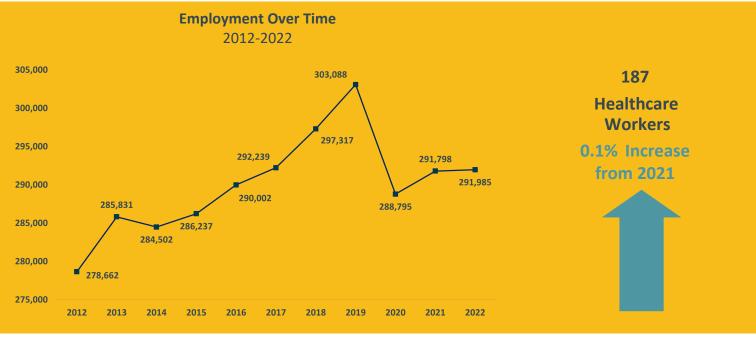
8. Plymouth: 761 Postings

9. Sterling Heights: 659 Postings

10. Farmington: 624 Postings

HEALTHCARE OCCUPATION GROUP

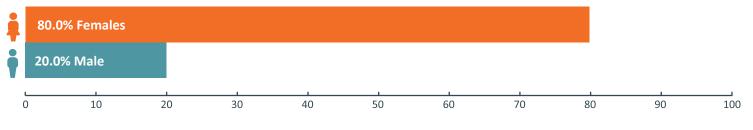
WIN's healthcare occupation group includes jobs related to healthcare support and practitioners. Employment in this group has been consistently growing, with more healthcare workers needed to care for Michigan's aging population. Registered nurses are routinely the most in-demand job in this group. Annually, there are about 23,600 job openings for these positions across southeast Michigan, and this is projected to continue increasing.



Healthcare Worker Demographics

The healthcare occupation group employs around 291,985 workers, who are overwhelmingly female (80.0 percent) and between the ages of 25 and 54 (68.8 percent), although 22.6 percent of workers are 55 years of age or older. The racial composition of this group is somewhat more diverse than others, with 67.3 percent of workers identifying as white, 21.4 percent identifying as Black or African American, and 11.3 percent identifying otherwise.

Worker Gender Demographics



Race and Ethnicity Demographics

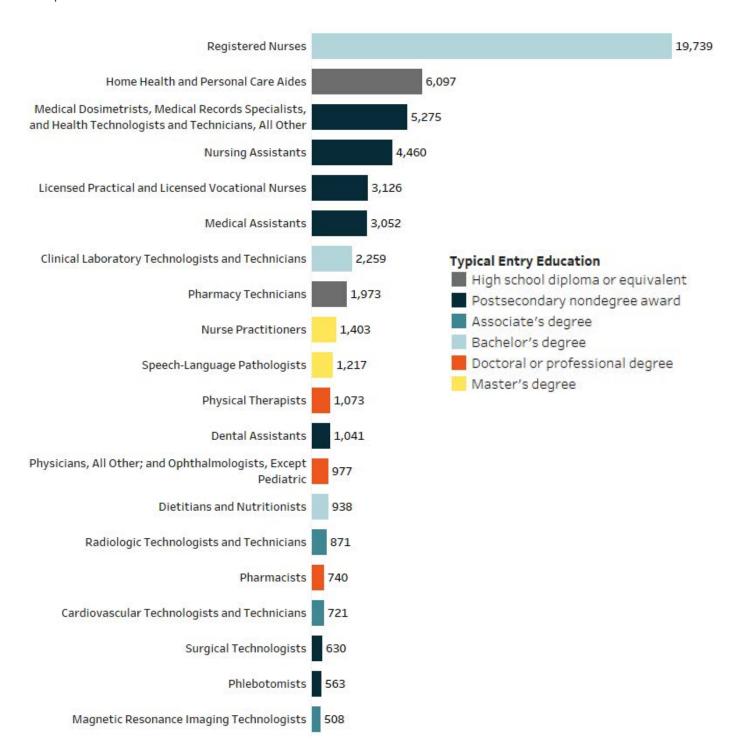
67.3% White | 21.4% Black or African-American | 5.7% Hispanic or Latino



HEALTHCARE OCCUPATION GROUP

Top Posted Jobs

Health care postings totaled 65,819 ads, an increase of 4,423 postings or 7.2 percent over Q1 2022. Registered Nurses, the perennial top in-demand health care occupation, had 19,739 postings this quarter. Home Health and Personal Care Aides, the second most demanded occupation, had 6,097 postings. Medical Dosimetrists, Medical Records Specialists, and Health Technologists and Technicians, All Other (5,275 postings), Nursing Assistants (4,460 postings), and Licensed Practical and Licensed Vocational Nurses (3,126 postings) round out the top five demanded occupations this quarter.



HEALTHCARE OCCUPATION GROUP

Wage Overview

Wages in the high-demand healthcare field tend to scale with both education and experience. The healthcare occupation group offers a relatively broad array of entry-level requirements and include a high volume of jobs are open to candidates with less than a bachelor's degree. However, most of the top-posted jobs that require less than a bachelor's degree pay under than the state's median wage of \$21.73 per hour. Licensed Practical and Licensed Vocational Nurses, which require a Postsecondary nondegree award for entry, earn a median hourly wage of \$26.67 per hour or annual salary of about \$55,477.

Wage Overview for Top Posted Healthcare Jobs in Q2 2022

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
29-1141	Registered Nurses	\$27.37	\$31.20	\$36.46	\$42.31	\$48.65
31-1128	Home Health and Personal Care Aides	\$10.00	\$10.72	\$11.83	\$13.60	\$15.70
29-2098	Medical Dosimetrists, Medical Records Specialists, and Health Technologists and Technicians, All Other	\$14.16	\$16.95	\$21.41	\$28.13	\$34.86
31-1131	Nursing Assistants	\$12.51	\$13.73	\$15.63	\$17.98	\$19.66
29-2061	Licensed Practical and Licensed Vocational Nurses	\$20.67	\$23.54	\$26.67	\$29.43	\$31.42
31-9092	Medical Assistants	\$13.17	\$14.81	\$17.03	\$19.11	\$21.40
29-2018	Clinical Laboratory Technologists and Technicians	\$14.95	\$18.24	\$26.07	\$33.46	\$38.27
29-2052	Pharmacy Technicians	\$11.20	\$13.33	\$16.50	\$19.68	\$22.99
29-1171	Nurse Practitioners	\$42.50	\$46.29	\$52.45	\$60.14	\$66.75
29-1127	Speech-Language Pathologists	\$25.10	\$32.15	\$37.90	\$46.06	\$53.60

In-Demand Technical Skills

- Nursing
- **Nursing Care**
- Cardiopulmonary Resuscitation (CPR)
- Medical Records
- Home Healthcare

In-Demand Education Level*

High School Diploma: 27.7% Associate Degree: 19.7% ■ Bachelor's Degree: 18.9% Master's Degree: 7.7%

*Not all job postings indicate the required educational attainment level, therefore the percentages found here may not add up to 100 percent

In-Demand Foundational Skills

- Communications
- **Customer Service**
- Leadership
- Management
- Teaching

Top Posting Employers

- **Beaumont Health**
- Henry Ford Health System
- Ascension
- Trinity Health
- University Of Michigan
- ProMedica
- McLaren Health Care
- Tenet Healthcare
- HCR ManorCare
- ProMedica Senior Care of Lakewood CO

In-Demand Certifications

- Basic Life Support (BLS) Certification
- Bachelor Of Science in Nursing (BSN)
- Licensed Practical Nurse
- **Certified Nursing Assistant**
- Advanced Cardiovascular Life Support (ACLS) Certification

Job Postings by City

1. Detroit: 9,605 Postings

2. Ann Arbor: 4,516 Postings

3. Lansing: 2,587 Postings

4. Southfield: 2,028 Postings

5. Dearborn: 1,981 Postings

6. Troy: 1,774 Postings

7. Warren: 1,659 Postings

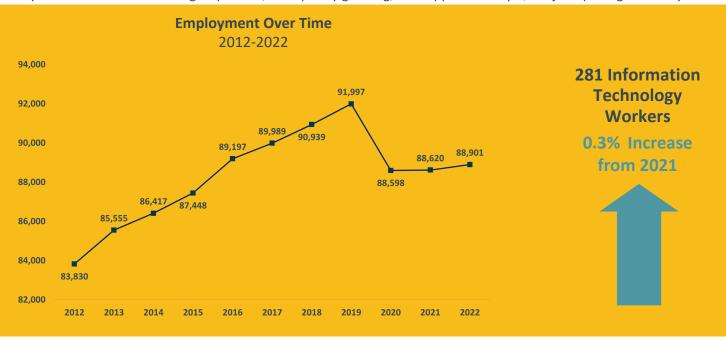
8. Pontiac: 1,582 Postings

9. Livonia: 1,516 Postings

10. Rochester: 1,516 Postings

INFORMATION TECHNOLOGY OCCUPATION GROUP

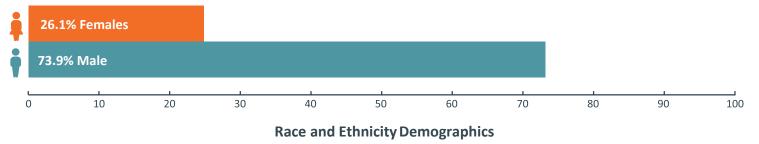
Information technology (IT) jobs include occupations that are associated with entry-level, technical, and professional careers related to the design, development, support and management of hardware, software, multimedia, and systems integration services. While the information technology group does not currently employ as many individuals as the other groups here, it is quickly growing, with approximately 7,000 job openings annually.



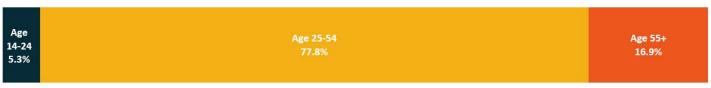
Information Technology Worker Demographics

In Q2 2022, the IT occupation group had 88,901 workers who are primarily male (73.9 percent). Approximately 77.8 percent of the workforce is between the ages of 25 and 54. Workers aged 55 years and older account for 16.9 percent, while only 5.3 percent are 24 years old or younger. Around 68.5 percent of the workforce identify as white, with workers who identify as Black or African American making up 9.5 percent of the workforce.

Worker Gender Demographics



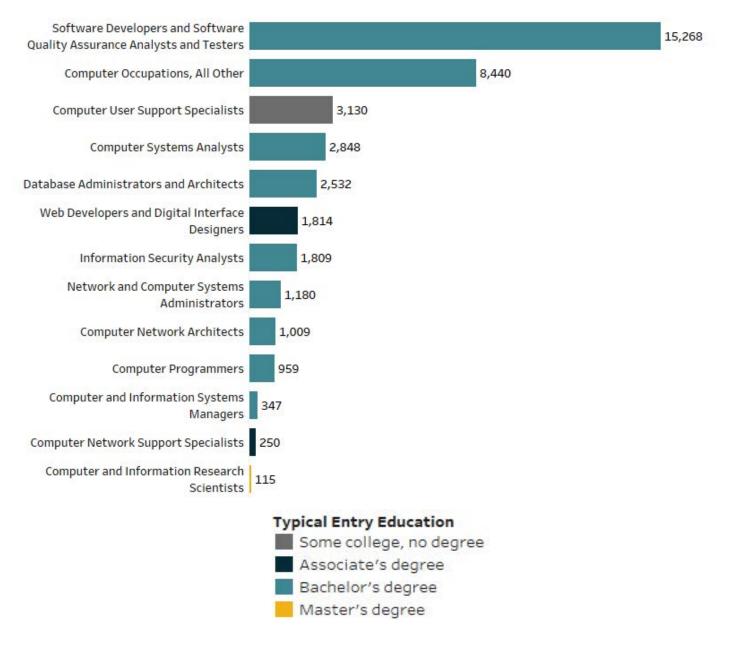
68.5% White | 17.3% Asian | 9.5% Black or African-American



INFORMATION TECHNOLOGY OCCUPATION GROUP

Top Posted Jobs

There were 39,701 postings for IT workers in Q2 2022, an increase of 4,426 postings or 12.5 percent since Q1 2022. Software Developers and Software Quality Assurance Analysts and Testers is the top demanded occupation this quarter, with 15,268 postings. Other top posted jobs include Computer Occupations, All Other (8,440 postings), Computer User Support Specialists (3,130 postings), Computer Systems Analysts (2,848 postings), and Database Administrators and Architects (2,532 postings).



INFORMATION TECHNOLOGY OCCUPATION GROUP

Wage Overview

In-demand IT occupations provide high wages, even for those at entry-level and with fewer credentials. Computer User Support Specialists, the third most in-demand occupation, offers a median hourly wage of \$21.38 per hour or \$44,466 per year. Computer Network Architects earn the highest median wage at \$54.59 per hour or nearly \$113,549 per year. Other occupations that have fewer qualifications, such as Web Developers and Digital Interface Designers, make over \$34.33 per hour.

Wage Overview for Top Posted Information Technology Jobs in Q2 2022

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
15-1256	Software Developers and Software Quality Assurance Analysts and Testers	\$27.58	\$34.84	\$44.27	\$55.17	\$64.79
15-1299	Computer Occupations, All Other	\$20.48	\$27.19	\$38.25	\$49.94	\$60.84
15-1232	Computer User Support Specialists	\$14.45	\$17.19	\$21. <mark>3</mark> 8	\$28.66	\$35.54
15-1211	Computer Systems Analysts	\$29.79	\$36.04	\$45.28	\$56.53	\$68.64
15-1245	Database Administrators and Architects	\$26.28	\$32.34	\$44.49	\$56.51	\$64.92
15-1257	Web Developers and Digital Interface Designers	\$17.22	\$24.60	\$34.33	\$43.64	\$53.41
15-1212	Information Security Analysts	\$28.58	\$36.14	\$46.24	\$57.48	\$67.62
15-1244	Network and Computer Systems Administrators	\$25.91	\$31.82	\$38.95	\$47.57	\$56.68
15-1251	Computer Programmers	\$20.77	\$25.36	\$36.10	\$47.12	\$57.77
15-1241	Computer Network Architects	\$30.17	\$42.17	\$54.59	\$66.25	\$78.28

In-Demand Technical Skills

- Computer Science
- Agile Methodology
- Software Development
- SQL (Programming Language)
- Software Engineering

In-Demand Education Level*

High School Diploma: 6.2%
Associate Degree: 5.7%
Bachelor's Degree: 63.6%
Master's Degree: 16.6%

*Not all job postings indicate the required educational attainment level, therefore the percentages found here may not add up to 100 percent

In-Demand Foundational Skills

- Communications
- Management
- Leadership
- Problem Solving
- Troubleshooting

Top Posting Employers

- Deloitte
- General Motors
- General Dynamics
- TEKsystems
- University Of Michigan
- Accenture
- Facebook
- Microsoft
- Ford
- Siemens

In-Demand Certifications

- Certified Information Systems Security Professional
- Project Management Professional Certification
- Secret Clearance
- Security Clearance
- Certified Information System Auditor

Job Postings by City

1. Detroit: 10,799Postings

2. Lansing: 5,829 Postings

3. Ann Arbor: 2,846 Postings

4. Troy: 2,153 Postings

5. Dearborn: 2,080 Postings

6. Warren: 2,054 Postings

7. Auburn Hills: 1,988 Postings

8. Southfield: 1,489 Postings

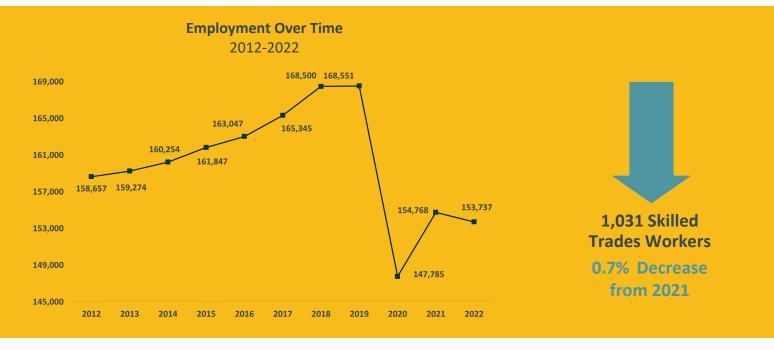
9. Farmington: 1,236 Postings

10. Novi: 864 Postings

SKILLED TRADES AND TECHNICIANS OCCUPATION GROUP

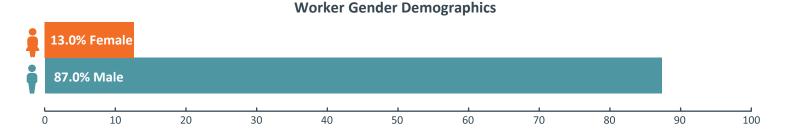
WIN's technicians/skilled trades category includes jobs related to advanced manufacturing. Southeast Michigan has more demand for skilled- trades labor, such as CNC machinists and welders, than almost anywhere else in the country. There are about 21,000 openings for these workers annually.

NOTE: Skilled trades related to construction and assembly are not included in this cluster, as the focus is on advanced manufacturing only.



Skilled Trades Worker Demographics

The skilled trades occupation group employed 153,737 workers in southeast Michigan in Q2 2022. A majority of skilled trades workers are male (87.0 percent) between the ages of 25 and 54 (65.6 percent). The 55 and older age group, which accounts for 28.7 percent of the workforce, shows a slightly higher than normal retiring population for this industry.



Race and Ethnicity Demographics

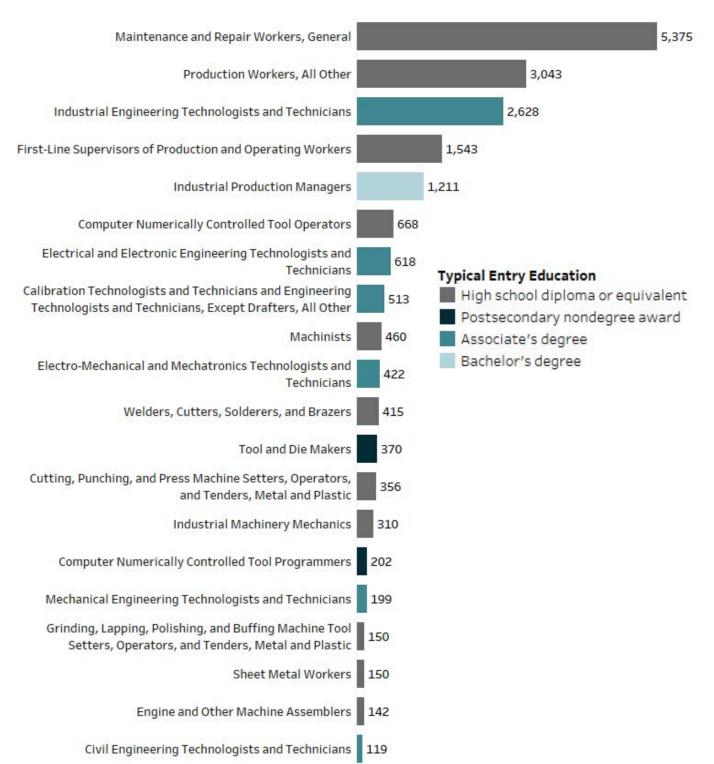
77.9% White | 12.9% Black or African-American | 2.9% Hispanic or Latino



SKILLED TRADES AND TECHNICIANS OCCUPATION GROUP

Top Posted Jobs

Demand for Skilled Trades occupations totaled 19,802 postings in Q2 2022, a 9.7% increase (1,754 postings) from Q1 2022. Maintenance and Repair Workers, General remained the highest in-demand skilled trades occupation during the first quarter, with 5,375 postings. Other top posted jobs include Production Workers, All Other (3,043 postings), Industrial Engineering Technologists and Technicians (2,628 postings), First-Line Supervisors of Production and Operating Workers (1,543 postings), and Industrial Production Managers (1,211 postings).



SKILLED TRADES AND TECHNICIANS OCCUPATION GROUP

Wage Overview

Seven of the top ten in-demand skilled trades occupations have median wages above the state median of \$21.73 per hour. Management and technician roles requiring additional education and training earn even more. Maintenance and Repair Workers, General, the top posted skilled trades job this quarter, offers a median hourly wage of \$18.21, or an annual salary of about \$37,878.

Wage Overview for Top Posted Skilled Trades Jobs in Q2 2022

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
49-9071	Maintenance and Repair Workers, General	\$12.42	\$14.60	\$18.21	\$24.33	\$30.45
51-9199	Production Workers, All Other	\$10.51	\$11.95	\$14.46	\$19.02	\$25.33
17-3026	Industrial Engineering Technologists and Technicians	\$19.36	\$23.38	\$28.85	\$36.13	\$42.98
51-1011	First-Line Supervisors of Production and Operating Workers	\$19.32	\$24.41	\$32.36	\$41.66	\$52.05
11-3051	Industrial Production Managers	\$33.91	\$43.56	\$56.39	\$71.67	\$88.85
51-9161	Computer Numerically Controlled Tool Operators	\$12.94	\$15.05	\$19.43	\$25.84	\$30.73
17-3023	Electrical and Electronic Engineering Technologists and Technicians	\$18.89	\$23.43	\$30.30	\$35.63	\$40.46
17-3098	Calibration Technologists and Technicians and Engineering Technologists and Technicians, Except Drafters, All Other	\$17.23	\$22.96	\$33.71	\$43.42	\$51.59
51-4041	Machinists	\$14.24	\$17.43	\$22.12	\$28.02	\$33.29
17-3024	Electro-Mechanical and Mechatronics Technologists and Technicians	\$17.72	\$20.79	\$24.83	\$32.52	\$38.04

In-Demand Technical Skills

- Machinery
- Plumbing
- Hand Tools
- HVAC
- Machining

In-Demand Education Level*

High School Diploma: 40.5%
Associate Degree: 9.2%
Bachelor's Degree: 11.8%
Master's Degree: 2.0%

*Not all job postings indicate the required educational attainment level, therefore the percentages found here may not add up to 100 percent

In-Demand Foundational Skills

- Communications
- Troubleshooting (Problem Solving)
- Operations
- Management
- Valid Driver's License

Top Posting Employers

- Aerotek
- General Motors
- Nesco Resource
- Kelly Services
- Sentech Services
- Orchid Orthopedic Solutions
- ManpowerGroup
- Randstad
- McDonald's
- GPAC

In-Demand Certifications

- Commercial Driver's License (CDL)
- HVAC Certification
- Certified Forklift Operator
- Automotive Service Excellence (ASE)
 Certification
- EPA 608 Technician Certification

Job Postings by City

1. Detroit: 2,144 Postings

2. Lansing: 971 Postings

3. Warren: 910 Postings

4. Sterling Heights: 746 Postings

5. Ann Arbor: 745 Postings

6. Livonia: 666 Postings

7. Auburn Hills: 661 Postings

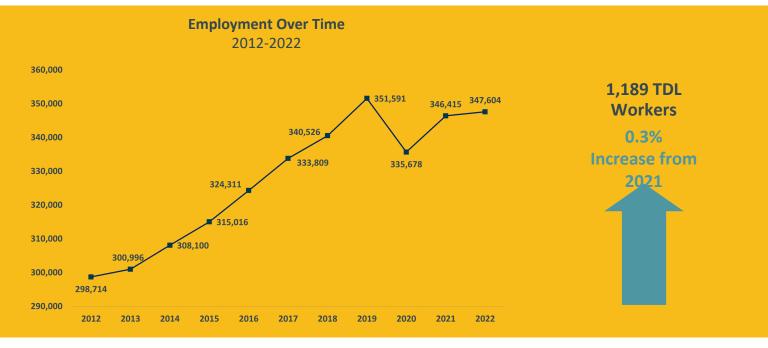
8. Troy: 658 Postings

9. Plymouth: 527 Postings

10. Rochester: 423 Postings

TRANSPORTATION, DISTRIBUTION, AND LOGISTICS OCCUPATION GROUP

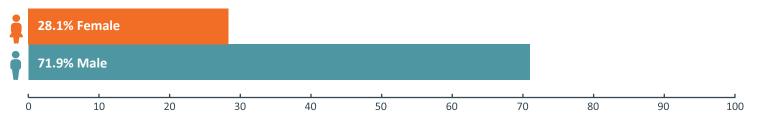
Transportation, distribution, and logistics (TDL) workers efficiently move materials, whether it is from one company to another or directly to consumers. Logistics workers range from materials movers to logistics analysts, coordinating and analyzing material and goods movement. For all TDL workers, there are over 37,000 job openings annually in southeast Michigan.



TDL Worker Demographics

The TDL occupation group has a large workforce, employing 347,604 individuals in the second quarter of 2022. These workers are 71.9 percent male and 70.8 percent white. A majority, or 63.5 percent, of the workforce is between the ages of 25 and 54.





Race and Ethnicity Demographics

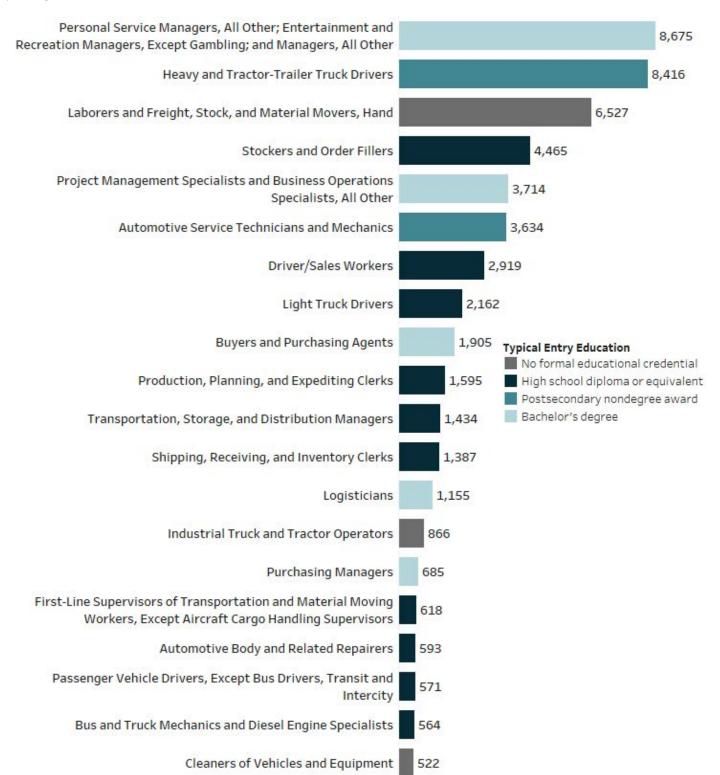
70.8% White | 19.3% Black or African-American | 4.9% Hispanic or Latino



TRANSPORTATION, DISTRIBUTION, AND LOGISTICS OCCUPATION GROUP

Top Posted Jobs

Demand for TDL occupations totaled 58,174 postings in Q2 2022, up 13.7 percent (6,995 postings) from Q1. Personal Service Managers, All Other; Entertainment and Recreation Managers, Except Gambling; and Managers, All Other was the highest in-demand TDL occupation during the first quarter, with 8,675 postings. Other top posted jobs include Heavy and Tractor-Trailer Truck Drivers (8,416 postings), Laborers and Freight, Stock, and Material Movers, Hand (6,527 postings), Stockers and Order Fillers (4,465 postings), and Automotive Service Technicians and Mechanics (3,634 postings).



TRANSPORTATION, DISTRIBUTION, AND LOGISTICS OCCUPATION GROUP

Wage Overview

Six of the top ten in-demand TDL occupations offer wages above the state median wage of \$21.73 per hour. Personal Service Managers, All Other; Entertainment and Recreation Managers, Except Gambling; and Managers, All Other, the top posted TDL job this quarter, earns a median hourly wage of \$54.50, or an annual salary of nearly \$113,351. Logistics roles that require additional education, such as Project Management Specialists and Business Operations Specialists, All Other, also offer higher wages.

Wage Overview for Top Posted TDL Jobs in Q2 2022

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
11-9198	Personal Service Managers, All Other; Entertainment and Recreation Managers, Except Gambling; and Managers, All Other	\$29.40	\$40.40	\$54.50	\$69.22	\$86.47
53-3032	Heavy and Tractor-Trailer Truck Drivers	\$13.97	\$17.47	\$22.07	\$26.49	\$31.28
53-7062	Laborers and Freight, Stock, and Material Movers, Hand	\$11.17	\$12.89	\$15.35	\$19.00	\$23.15
53-7065	Stockers and Order Fillers	\$10.57	\$11.85	\$14.14	\$18.09	\$24.51
13-1198	Project Management Specialists and Business Operations Specialists, All Other	\$20.61	\$27.03	\$35.94	\$47.25	\$59.73
49-3023	Automotive Service Technicians and Mechanics	\$11.40	\$14.32	\$21.76	\$29.70	\$37.89
53-3031	Driver/Sales Workers	\$10.32	\$11.27	\$14.03	\$20.99	\$25.22
53-3033	Light Truck Drivers	\$10.93	\$12.62	\$18.05	\$26.32	\$35.73
13-1028	Buyers and Purchasing Agents	\$20.15	\$25.23	\$32.94	\$43.27	\$53.49
43-5061	Production, Planning, and Expediting Clerks	\$15.57	\$20.12	\$26.56	\$32.53	\$37.93

In-Demand Technical Skills

- Warehousing
- Merchandising
- Purchasing
- Forklift Truck
- Truck Driving

In-Demand Foundational Skills

- Communications
- Customer Service
- Management
- Valid Driver's License
- Operations

Top Posting Employers

- Amazon
- Meijer
- Walmart
- Kroger
- Deloitte
- Roehl Transport
- General Motors
- Penske Automotive
- Kelly Services
- Ryder

In-Demand Certifications

- Commercial Driver's License (CDL)
- Project Management Professional Certification
- Bachelor of Science in Business
 - Master of Business Administration (MBA)
- Certified Forklift Operator

Job Postings by City

1. Detroit: 8,123 Postings

2. Lansing: 3,669 Postings

3. Ann Arbor: 2,717 Postings

4. Warren: 2,397 Postings

5. Troy: 2,074 Postings

5. 110 y . 2,0 y . 1 05 tings

6. Livonia: 1,876 Postings

7. Auburn Hills: 1,692 Postings

8. Sterling Heights: 1,604 Postings

9. Romulus: 1,437 Postings

10. Dearborn: 1,387 Postings

In-Demand Education Level*

High School Diploma: 26.4%
Associate Degree: 3.9%
Bachelor's Degree: 23.1%

Master's Degree: 5.%

*Not all job postings indicate the required educational attainment level, therefore the percentages found here may not add up to 100 percent