



# ST. CLAIR COUNTY

## WIN Quarterly Report



# Introduction: St. Clair County

## Introduction

The Workforce Intelligence Network (WIN) partnership is a collaboration of Michigan Works! Agencies (MWAs) and community colleges across a 16 county region in Michigan. The counties in the partnership include: Genesee, Hillsdale, Huron, Jackson, Lapeer, Lenawee, Livingston, Macomb, Monroe, Oakland, Saint Clair, Sanilac, Shiawassee, Tuscola, Washtenaw, and Wayne, along with the City of Detroit. Prosperity Region 6 includes: St. Clair, Genesee, Shiawassee, Huron, Lapeer, Tuscola, and Sanilac counties.

This report highlights labor market information and real-time job posting data for St. Clair County with special sections devoted to 5 occupational groups. WIN's analysis of online job postings, a proxy for employer demand, is a pioneering method for tracking the health of the labor market.

Occupational groups include:

- Skilled trades (page 7)
- Customer service (formerly retail & hospitality) (page 12)
- Information technology (page 17)
- Health care (page 22)
- Energy (page 27)

Data analyzed includes:

- Employer demand
- Top posting jobs
- In-demand credentials, degrees, and skills
- Educational attainment required
- Wages offered in job postings
- Employment
- Unemployment
- Labor force



# Introduction: St. Clair County

## Key findings

### 1. **St. Clair County workers found jobs during Q2 2016.**

Employment in St. Clair County grew 1.5% between Q1 and Q2 2016, while the labor force shrank insignificantly. This means that the increase of 1,057 jobs between Q1 and Q2 can be attributed, largely, to new jobs added in the county. (See page 4 for details).

### 2. **Overall employer demand, as gauged by online job postings, seems to have leveled off in St. Clair County during recent quarters.**

Employers in the county continue to post many online job ads for heavy and tractor-trailer truck drivers and registered nurses. (See page 4 for details).

### 3. **Employer demand for the Skilled Trades occupations increased 29% between Q1 and Q2 2016.**

Most Skilled Trades jobs required a high school diploma and some on-the-job training and half of the top ten in-demand Skilled Trades jobs during Q2 make over \$17 per hour at the median. (See page 7 for details).

### 4. **The Information Technology (IT) occupation group in St. Clair County is small with the potential for growth.**

Employers in St. Clair County posted 41% more IT job ads in Q2 than in Q1 2016. The negligible growth in employment for IT occupations over the past few years, however, may indicate that local employers are struggling to find qualified workers. (See page 17 for details).

### 5. **Demand for Health Care workers remains strong in St. Clair County during 2016.**

As employer demand has increased over the past several years, so has employment in the Health Care occupations. In-demand Health Care occupations in St. Clair County offer high wages to workers with experience and related education. (See page 22 for details).



# Executive Summary

## Postings Over Time

Employers in St. Clair County posted 1,788 online job ads between April and June 2016, up slightly over the 1,730 job ads seen in Q1 2016. Employer demand, approximated by these online postings, has leveled off at quarterly posting averages between 1,500 and 1,800 after a spike at 4,541 online job postings in Q3 2013.

## Total Online Job Postings Q1 2011 - Q2 2016



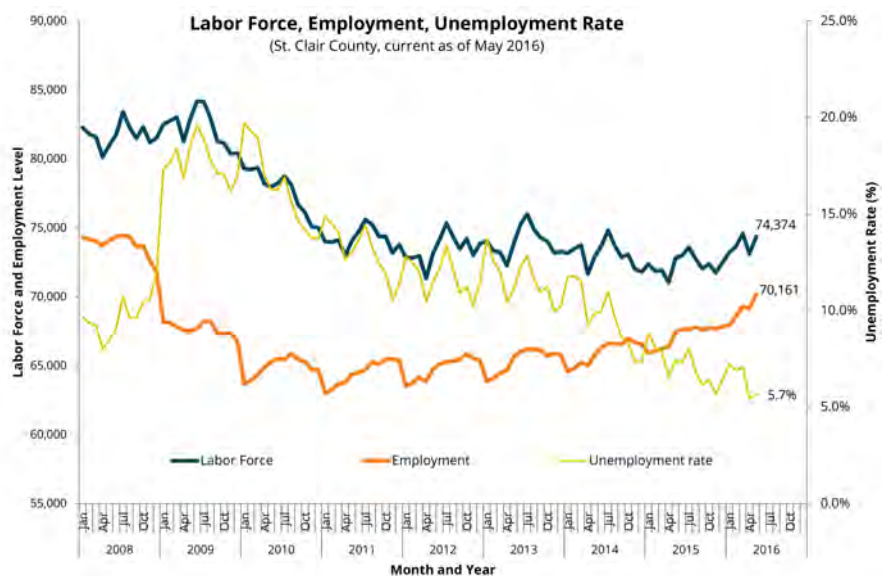
## Labor Force, Employment, & Unemployment

Employment in St. Clair County grew 1.5% between Q1 and Q2 2016, while the labor force shrank insignificantly. This means that the increase of 1,057 jobs between Q1 and Q2 can be attributed, largely, to new jobs added in the county. Because employment grew while the labor force remained the same, the county's unemployment rate dropped 1.5 percentage points between quarters, from 7.1% in Q1 to 5.5% in Q2. Overall, the unemployment rate in the county has decreased from 16.4% in 2010 and employment has grown by over 4,000 jobs in the same time period.

Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

## Labor Force, Employment, Unemployment Rate

January 2008 - May 2016



Data: BLS  
Analysis: Workforce Intelligence Network



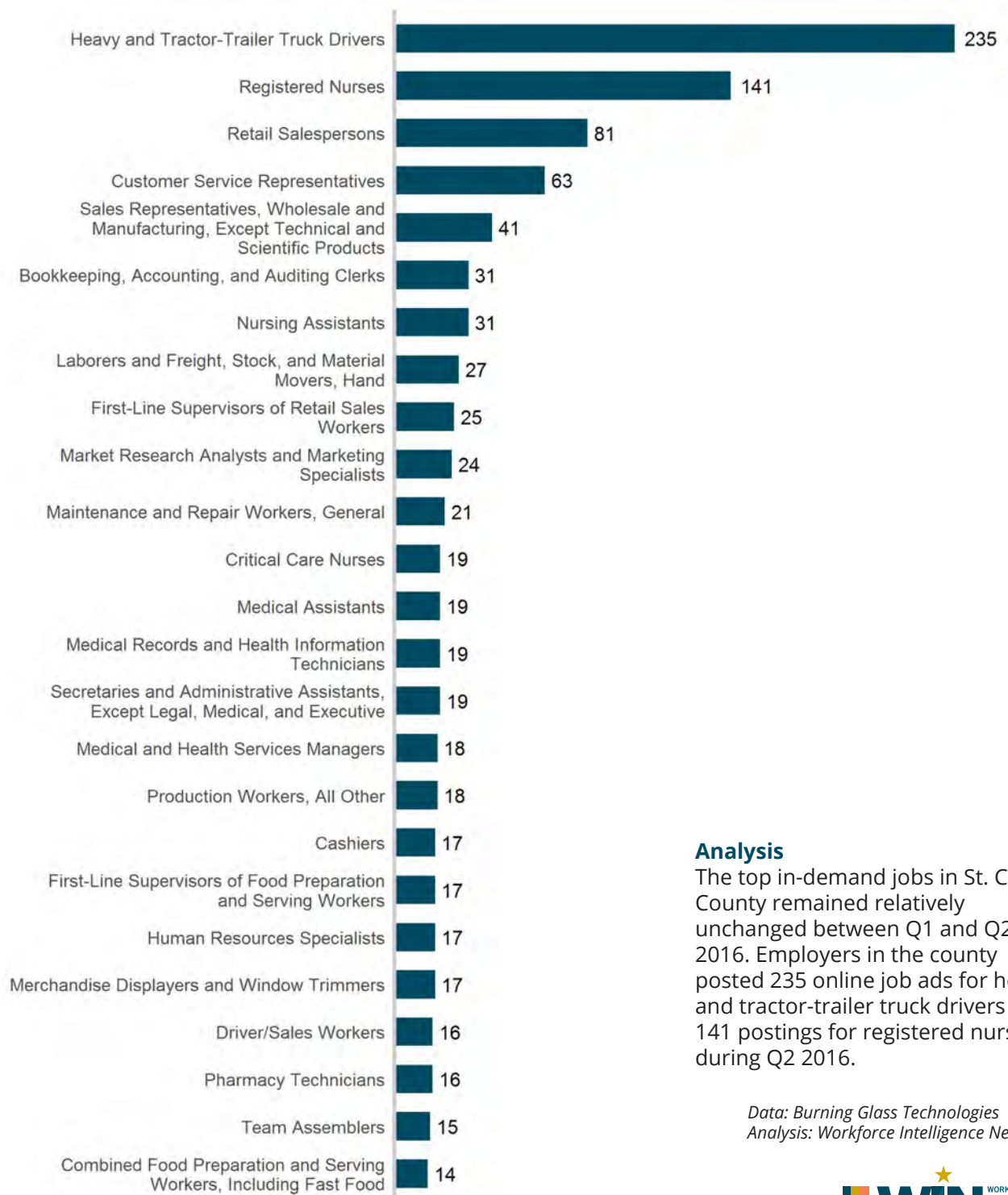


Most in-demand:  
truck drivers

5.5%  
unemployment  
rate

### Top Jobs In Demand

Quarter 2 2016



#### Analysis

The top in-demand jobs in St. Clair County remained relatively unchanged between Q1 and Q2 2016. Employers in the county posted 235 online job ads for heavy and tractor-trailer truck drivers and 141 postings for registered nurses during Q2 2016.

Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network



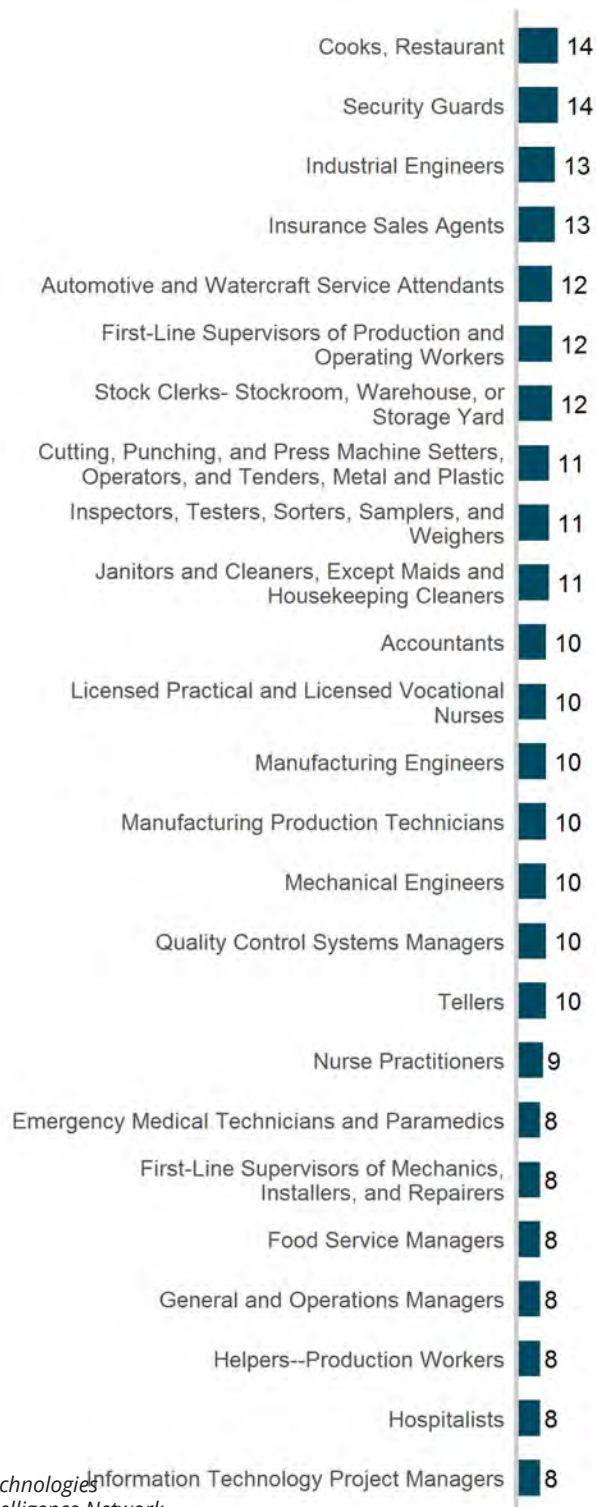
Now hiring:  
1,700 job postings



Demand for: TDL, Health Care,  
and Customer Service workers

### Top Jobs In Demand

Quarter 2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network



# Skilled Trades & Technicians (Manufacturing Focused)

## Introduction

### Skilled Trades & Technicians

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.

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

### Postings Over Time

St. Clair County advanced manufacturing employers looking to hire Skilled Trades workers posted 85 online job ads during Q2 2016. This is a 29% increase over the 66 job postings in St. Clair for this occupation group during Q1. Employer demand for Skilled Trades workers in St. Clair County has leveled off between 50 and 100 postings per quarter since a spike at 190 postings in Q3 2013.

### Employment Over Time

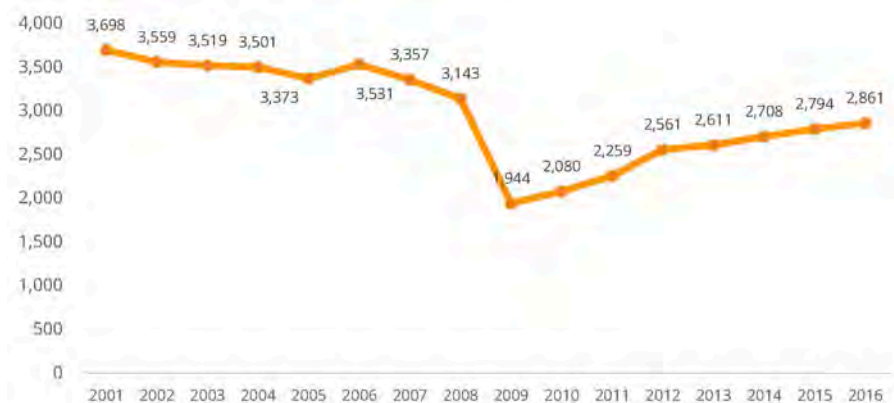
As job postings for Skilled Trades occupations in St. Clair County tend to be quite volatile quarter-to-quarter, employment has steadily grown each year since the low at 1,944 employees in 2009. In 2016, 2,861 St. Clair County workers are employed in Skilled Trades jobs, a 47% increase over the 2009 recession low and still a 2% increase over 2015's employment numbers.

### Online Job Postings



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

### Employment Over Time



Data: EMSI, BLS  
Analysis: Workforce Intelligence Network



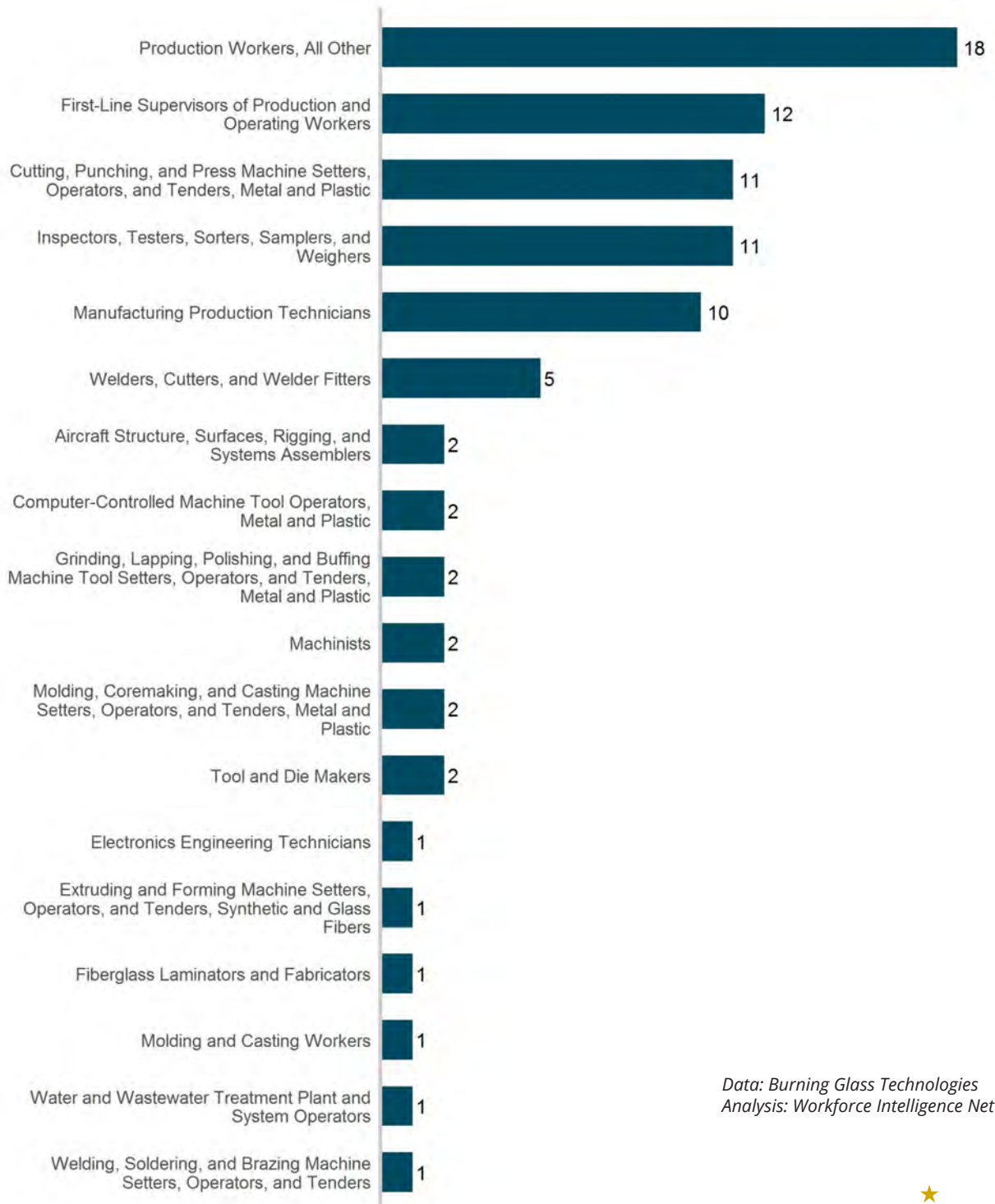
Education required:  
HS diploma & training



Now hiring: 85 online  
job postings

### Skilled Trades & Technicians Top Jobs

Quarter 2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network



Experience required:  
less than 5 years

65%  
ads for full-time positions

### Skilled Trades & Technicians Educational Attainment & Experience Required

Only 40 of the 85 Q2 Skilled Trades job postings specified a desired level of educational attainment. The distribution of these requirements can be seen in the graph to the right: almost all jobs are attainable with a high school diploma and/or some vocational training. Most employers require training outside of high school but not all training results in a formal credential. Only 7 postings explicitly requested that applicants hold a bachelor's degree – these postings tend to be for management roles within the Skilled Trades occupations.

A similar number of job ads specified a desired experience level for Skilled Trades workers. The data show that most Skilled Trades jobs available in St. Clair County are within reach for workers with less than 5 years of experience (27 postings during Q2). Again, those jobs requiring more experience, 6 years and beyond, are likely for some management occupations included in this group.

### Minimum Educational Attainment Required Q2 2016

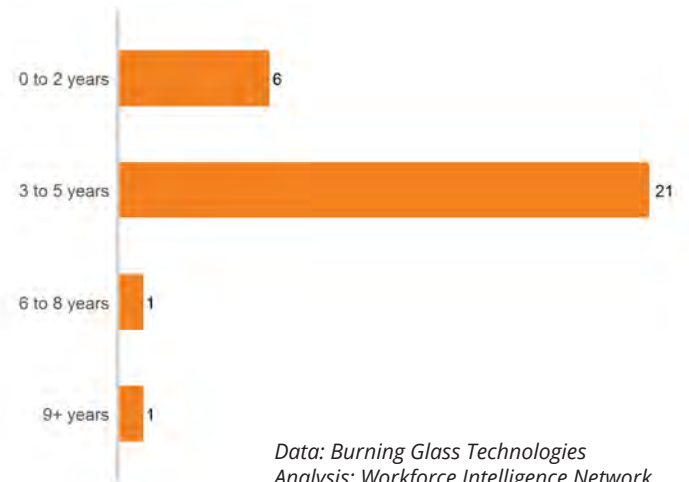


Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

### Areas of Study in-Demand Q2 2016

- Analytical chemistry
- Chemistry
- Computer science

### Experience Required Q2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network



employment growth every  
year since 2009

\$27,044

mean advertised salary

### Skilled Trades & Technicians in-Demand Skills Q2 2016

The occupations in the Skilled Trades group require a wide array of technical skills, like machine operation, along with more foundational skills. Job postings in the Skilled Trades occupation group for Q2 2016 listed required knowledge or experience in inspection, repair, and scheduling. Employers are also seeking foundational skills like attention to detail, and a demonstrated ability to solve problems and communicate well from their job candidates. Many Skilled Trades jobs also require some degree of physical demand.

#### In-Demand Technical Skills

- Inspection
- Machine operation
- Mathematics
- Scheduling, budgeting
- Metal manufacturing, welding

#### In-Demand Foundational Skills

- Detail-oriented, organizational skills
- Communication skills
- Problem solving
- Planning
- Physical Demand

#### Job Type

- Temporary: 14.1%
- Full-time: 64.7%
- Part-time: data not available

#### Certifications In-Demand

- Forklift operator certification





## In-demand certification: forklift operation



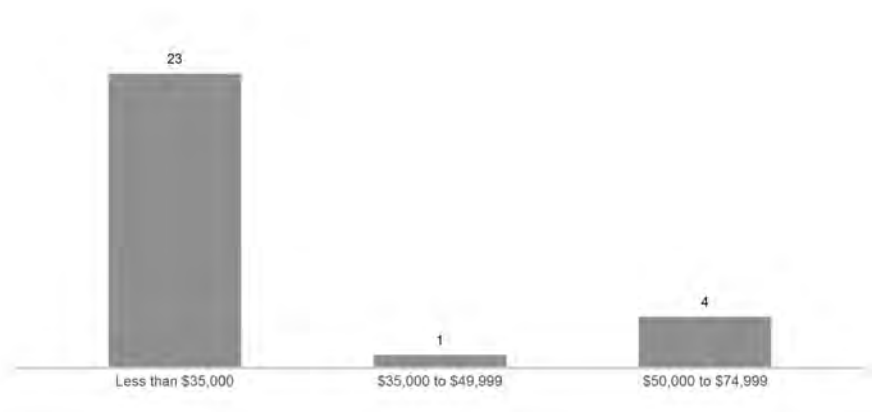
## Knowledge areas: chemistry, computer science

### Skilled Trades & Technicians Wages

Twenty-eight of the 85 Skilled Trades job postings in St. Clair County during Q2 2016 specified a wage or salary range. The majority of those (23 postings) offered wages that amount to less than \$35,000 a year, or less than \$17 per hour. The Skilled Trades occupations tend to be some of the lowest paying in southeast Michigan and across the country. Wage data from the Bureau of Labor Statistics show a slightly rosier story: only five of the top in-demand Skilled Trades occupations for St. Clair workers make less than \$17 per hour at the median. The highest paid occupations in the group are in management, like first-line supervisors of production workers, and engineering, like manufacturing production technicians, roles.

### Advertised Salaries

Quarter 2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

### Wage Data from Bureau of Labor Statistics 2015

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
51-9199	Production Workers, All Other	\$9.37	\$12.66	\$14.93	\$16.65	\$19.66
51-1011	First-Line Supervisors of Production and Operating Workers	\$14.86	\$19.02	\$25.89	\$33.69	\$41.20
51-4031	Cutting, Punching, and Press Machine Setters, Operators, and Tenders, Metal and Plastic	\$8.80	\$10.31	\$13.02	\$16.75	\$22.99
51-9061	Inspectors, Testers, Sorters, Samplers, and Weighers	\$8.72	\$10.26	\$13.84	\$20.43	\$25.45
17-3029	Manufacturing Production Technicians	\$14.66	\$20.00	\$27.52	\$33.08	\$42.71
51-4121	Welders, Cutters, and Welder Fitters	\$10.86	\$13.19	\$15.65	\$19.26	\$24.64
51-2011	Aircraft Structure, Surfaces, Rigging, and Systems Assemblers	Insf. Data	Insf. Data	Insf. Data	Insf. Data	Insf. Data
51-4011	Computer-Controlled Machine Tool Operators, Metal and Plastic	\$10.05	\$12.45	\$18.25	\$20.85	\$24.92
51-4033	Grinding, Lapping, Polishing, and Buffing Machine Tool Setters, Operators, and Tenders, Metal and Plastic	\$9.10	\$11.38	\$14.61	\$18.04	\$20.78
51-4041	Machinists	\$10.45	\$13.31	\$17.28	\$23.00	\$27.28

Data: EMSI, BLS

Analysis: Workforce Intelligence Network

## Introduction

### Customer Service

The customer service group is the largest occupational group that WIN analyzes, both in terms of employment and online job postings. This group is of very high importance to the region because it is the first to grow when the economy expands and the first to contract in a downturn: it is often a leading indicator. 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.

### Postings Over Time

Online job postings for Customer Service occupations in St. Clair County were down 6% in Q2 to 405 postings, from 429 in Q1 2016. The number of postings that St. Clair area employers post for Customer Service workers fluctuates each quarter, but postings have trended downward since a peak in demand in Q3 2013 at 1,134 postings.

### Employment Over Time

Employment in the Customer Service occupations in St. Clair County is around 29,932 in 2016. Pre-recession employment numbers hovered around 33,000 and dipped to 28,140 in 2010, at the lowest point. The 29,932 employees in 2016 represent a 6% increase over the 2010 low. Customer Service employment, however, has not grown much since reaching the 29,000 mark again in 2012.

### Online Job Postings



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

### Employment Over Time



Data: EMSI, BLS  
Analysis: Workforce Intelligence Network





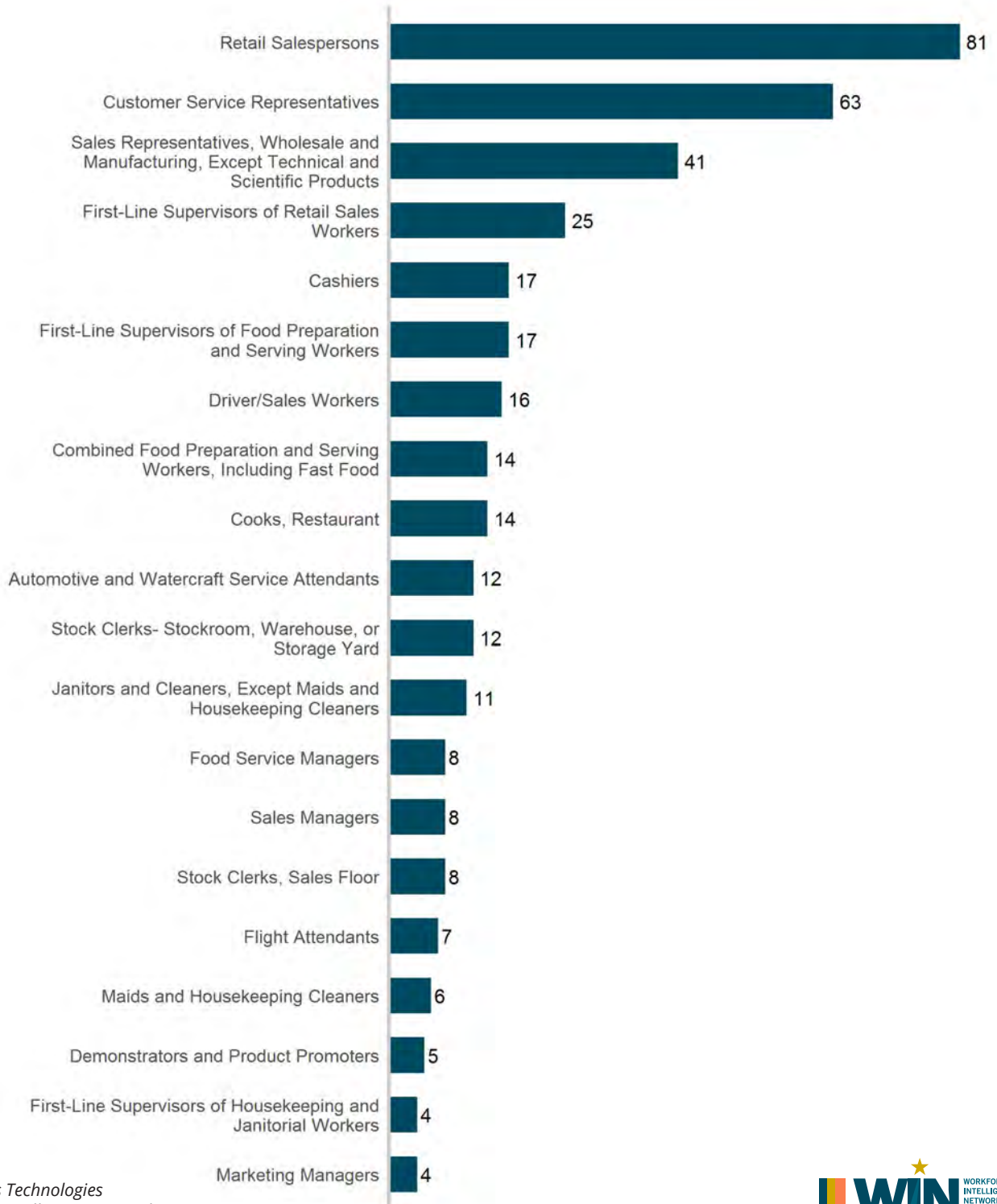
Now hiring:  
405 Customer Service job ads



In demand: salespersons,  
customer service reps

### Customer Service Top Jobs

Quarter 2 2016





Experience required:  
less than 2 years

30,000

Customer Service employees  
in St. Clair County

### Customer Service Educational Attainment & Experience Required

Of the 405 online job ads posted for Customer Service occupations in St. Clair County, 146 specified a desired minimum level of educational attainment for job applicants. Most Customer Service group jobs are available to workers with a high school diploma and/or some vocational training (119 postings). Sixteen job postings required a bachelor's degree – in the Customer Service group, these are likely for managerial roles and higher-level sales representative jobs that may require knowledge of technical products.

Similarly, 114 Customer Service job postings specified the level of experience required for candidates. Again, most Customer Service jobs do not require extensive experience, with 93 ads open to applicants with 0 to 2 years of experience. The 21 job ads that required more than 6 years of experience are likely for occupations like sales managers.

### Areas of Study in-Demand Q2 2016

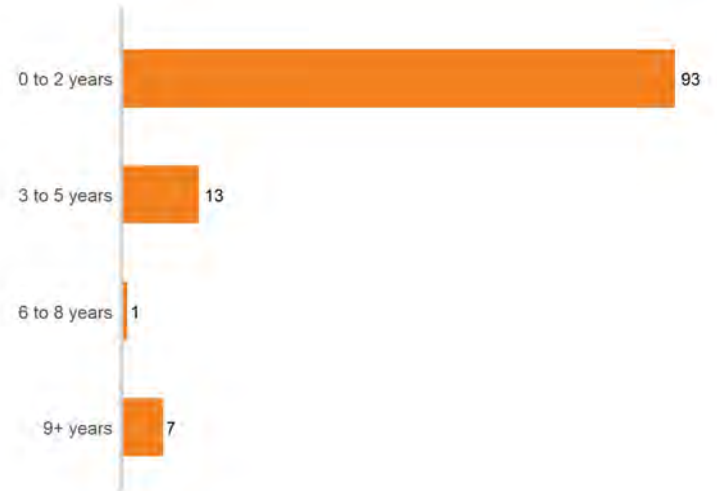
- Business administration and management
- Chemistry, analytical chemistry
- Chemical engineering, materials science
- Culinary arts, chef training
- Food technology and processing

### Minimum Educational Attainment Required Q2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

### Experience Required Q2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network



Education required:  
HS diploma

35%

online job postings for  
full-time positions

### Customer Service in-Demand Skills Q2 2016

St. Clair County employers looking to hire Customer Service workers in Q2 2016 were focused on recruiting for baseline skills that include communication, organizational skills, and time management. More specialized skills and experiences being sought included previous experience with customer service in a retail setting, store management, merchandising, and cash handling.

#### In-Demand Technical Skills

- Customer service, experience in a retail setting
- Product sales
- Store management, supervisory skills
- Merchandising
- Cash handling

#### In-Demand Foundational Skills

- Communication skills
- Organizational skills
- Writing
- Computer skills (Microsoft Office)
- Building effective relationships

#### Job Type

- Temporary: 7.9%
- Full-Time: 35.1%
- Part-Time: 17.0%

#### In-Demand Certifications

- CDL Class A
- ServSafe, alcohol server certification
- Air Brake Certified
- Automotive Service Excellence (ASE)
- HVAC technician certification (e.g. EPA 608)



In-demand: serving  
certifications & CDL

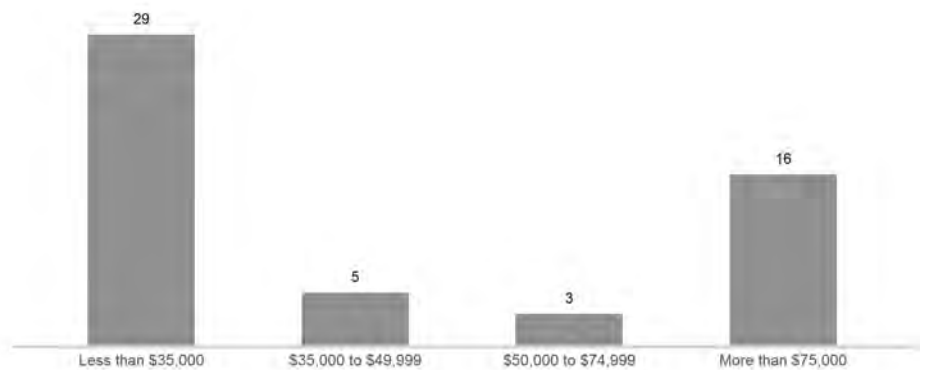


Mean advertised salary:  
\$58,889

## Customer Service Wages

Just 53 of the 405 Customer Service jobs postings in St. Clair during Q2 2016 specified a salary range or hourly wage. The majority of those postings (29 ads) stated wages that equate to annual earnings less than \$35,000, or wages less than \$17 per hour. Wage data from the Bureau of Labor Statistics confirms the trend from the postings. Eight of the top 10 in-demand jobs in the group have median wages less than \$17 per hour.

## Advertised Salaries Quarter 2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

## Wage Data from Bureau of Labor Statistics 2015

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
41-2031	Retail Salespersons	\$8.15	\$8.70	\$9.82	\$12.72	\$18.53
43-4051	Customer Service Representatives	\$8.16	\$10.09	\$13.24	\$16.82	\$21.28
41-4012	Sales Representatives, Wholesale and Manufacturing, Except Technical and Scientific Products	\$10.89	\$16.13	\$23.96	\$36.13	\$51.15
41-1011	First-Line Supervisors of Retail Sales Workers	\$10.82	\$13.37	\$17.07	\$22.08	\$27.65
41-2011	Cashiers	\$8.15	\$8.64	\$9.48	\$11.35	\$14.79
35-1012	First-Line Supervisors of Food Preparation and Serving Workers	\$8.15	\$9.58	\$12.73	\$17.45	\$21.88
53-3031	Driver/Sales Workers	\$8.15	\$9.40	\$12.44	\$17.34	\$25.97
35-3021	Combined Food Preparation and Serving Workers, Including Fast Food	\$8.15	\$8.48	\$9.02	\$9.59	\$11.62
35-2014	Cooks, Restaurant	\$8.15	\$9.01	\$10.55	\$12.50	\$13.92
53-6031	Automotive and Watercraft Service Attendants	\$8.15	\$8.69	\$9.60	\$11.03	\$13.00

Data: EMSI, BLS  
Analysis: Workforce Intelligence Network

# Information Technology (IT)

## Introduction

### Information Technology (IT)

Information technology 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 meet the employment levels of the others, it is quickly growing.

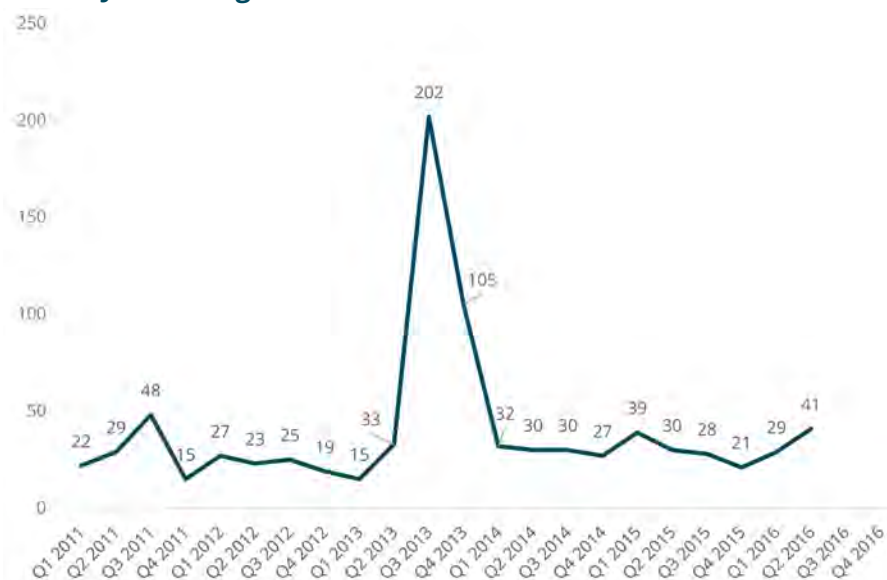
### Postings Over Time

St. Clair County employers posted 41 online job ads for Information Technology (IT) workers during Q2 2016. This is a 41% increase from the 29 ads posted in Q1 – quarterly postings for this occupation group have hovered between 20 and 30 since Q1 2014. The stagnation of job postings at low levels have affected employment in these IT occupations.

### Employment Over Time

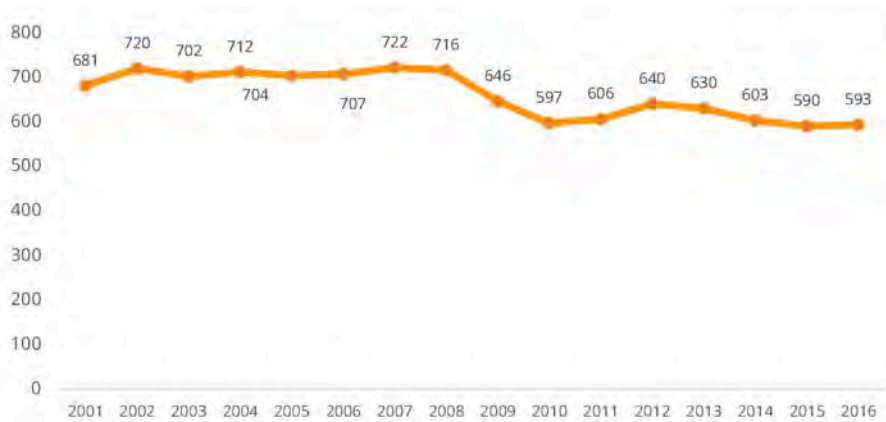
Only 593 St. Clair County workers are employed in Information Technology occupations in 2016. While employment in many of the county's other occupation groups has begun to recover post-recession, the 593 employee estimate for 2016 is similar to the 597 employed in 2010 at the trough of Great Recession employment. IT employment rebounded to 640 in 2012 but has decreased every year since, save for the negligible addition of 3 jobs from 2015 to 2016.

### Online Job Postings



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

### Employment Over Time



Data: EMSI, BLS  
Analysis: Workforce Intelligence Network



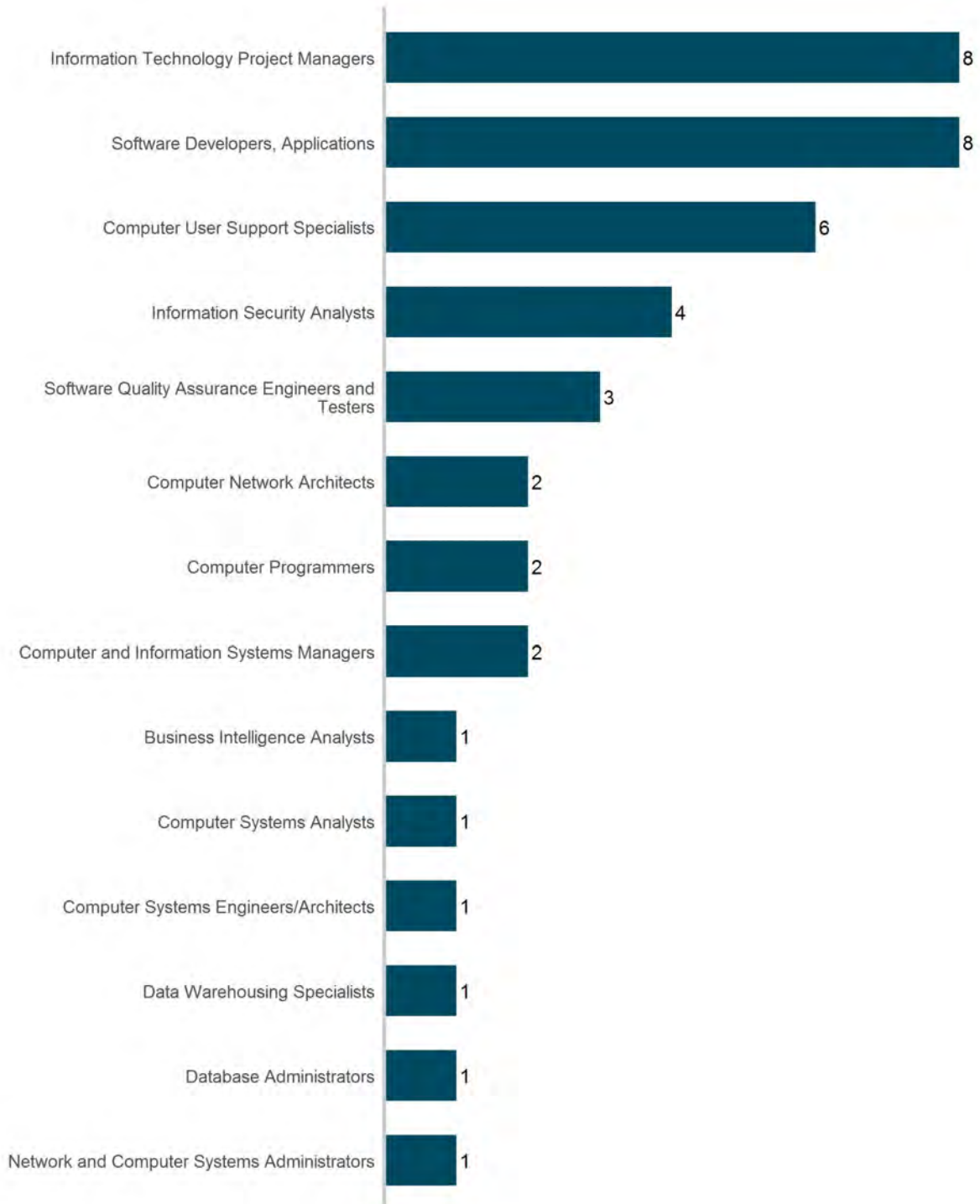
Now hiring: 41 online job  
postings for IT workers



Nearly 600 IT workers  
in St. Clair County

### Information Technology (IT) Top Jobs

Quarter 2 2016







Knowledge areas: computer science, business, engineering

>\$20/hr.

Median hourly IT wages

### Information Technology (IT) Educational Attainment & Experience Required

Of the 41 online job ads posted for Information Technology occupations in St. Clair County, 25 specified a desired minimum level of educational attainment for job applicants. Traditionally, employers looking to hire for some of the most in-demand IT occupations, like software developers, seek candidates with a bachelor's degree. Thirteen Q2 2016 job ads required a bachelor's degree. Many other IT jobs are within reach for applicants willing to undertake some vocational training or complete an associate's degree (11 postings).

The Information Technology jobs open in St. Clair County require more prior experience, according to job posting data. Ten of the 41 IT job postings from Q2 required 3 to 5 years of experience. Another large fraction of the postings, 6 of 41, were open to entry level workers with less than 2 years of experience.

### Areas of Study in-Demand Q1 2016

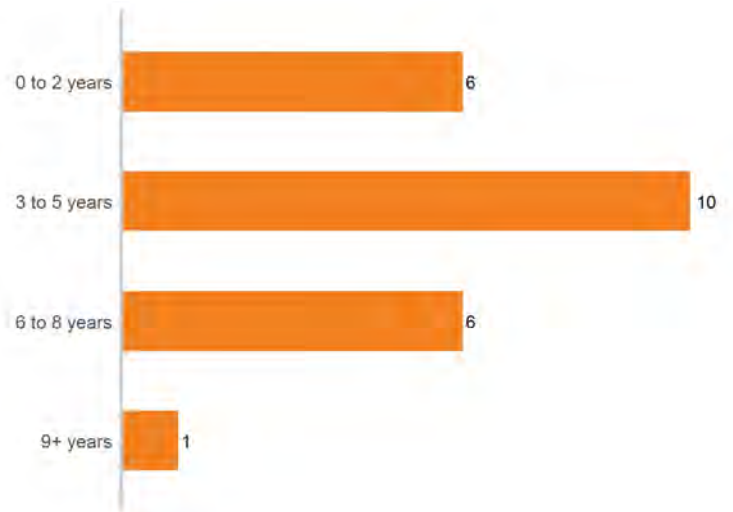
- Computer science
- Business administration and management
- Engineering technology, engineering
- Health professions and related programs, health care administration
- Information science

### Minimum Educational Attainment Required Q2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

### Experience Required Q2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network



In-demand skills:  
project management

\$75,000  
advertised salaries

### Information Technology (IT) in-Demand Skills Q2 2016

St. Clair County employers looking to hire Information Technology workers during Q2 2016 sought foundational skills like those in communication and teamwork, basic computer skills, and research and writing skills. Many of the most in-demand IT jobs in St. Clair County also require good customer service skills. These basic skills should be paired with more technical or specialized skills like providing technical support. Many of Q2's job postings also emphasized management skills like project management and business process and change management.

#### In-Demand Technical Skills

- SQL, SQL server
- Scheduling
- Programmable Logic Controller (PLC)
- Project management
- Customer service

#### In-Demand Foundational Skills

- Communication skills, teamwork, collaboration
- Troubleshooting, problem solving
- Writing
- Detail-oriented, organizational skills
- Computer Skills: Microsoft Excel, Microsoft Word

#### Job Type

- Temporary: 2.4%
- Full-Time: 29.3%
- Part-Time: 2.4%

#### Certifications In-Demand

- Certified Information Security Manager (CISM)
- Certified Information Systems Auditor (CISA)
- Certified Information Systems Security Professional (CISSP)
- Certified A+ Technician
- Certified teacher





## Certifications in-demand: information security



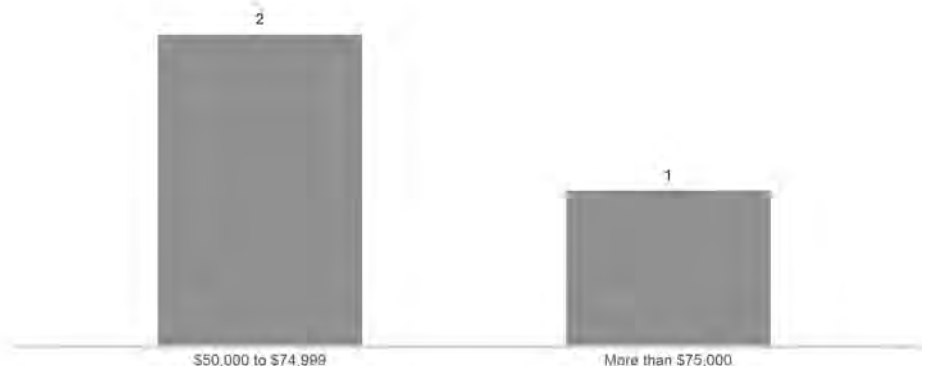
## Baseline skills: communication, troubleshooting

### Information Technology (IT) Wages

Information Technology occupations are some of the highest paying in southeast Michigan. Only 3 Q2 job ads posted a salary range, but those that did offered more than \$50,000 a year. Bureau of Labor Statistics data confirm that IT occupations pay well: all of the top in-demand IT jobs in St. Clair County offer wages over \$20 per hour, and 7 of the top 9 offer wages over \$30 per hour. These wages calculate to an annual salary of over \$62,000 a year.

### Advertised Salaries

Quarter 2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

### Wage Data from Bureau of Labor Statistics 2015

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
15-1199	Information Technology Project Managers	\$22.99	\$29.66	\$36.46	\$45.18	\$53.54
15-1132	Software Developers, Applications	\$20.87	\$25.41	\$33.12	\$42.96	\$51.68
15-1151	Computer User Support Specialists	\$11.71	\$15.41	\$20.32	\$27.69	\$35.29
15-1122	Information Security Analysts	\$22.32	\$25.51	\$36.22	\$44.19	\$51.02
15-1199	Software Quality Assurance Engineers and Testers	\$22.99	\$29.66	\$36.46	\$45.18	\$53.54
15-1143	Computer Network Architects	Insf. Data	Insf. Data	Insf. Data	Insf. Data	Insf. Data
15-1131	Computer Programmers	\$23.22	\$28.15	\$32.40	\$40.22	\$48.14
11-3021	Computer and Information Systems Managers	\$29.59	\$36.41	\$45.99	\$57.48	\$74.17
15-1199	Business Intelligence Analysts	\$22.99	\$29.66	\$36.46	\$45.18	\$53.54

Data: EMSI, BLS  
Analysis: Workforce Intelligence Network

## Introduction

### Health Care

WIN's health care occupation group includes jobs related to health care support and practitioners. Employment in this group has been consistently growing, more health care workers needed to care for Michigan's aging population and in response to regulatory and other changes. Registered nurses are routinely the most in-demand job in this group.

### Postings Over Time

Along with Customer Service, Health Care is one of the largest occupation groups in St. Clair County. Employers in the county posted 365 online job postings for Health Care workers during Q2. This is a slight 6% decrease from the 387 postings seen in Q1 2016. Overall, employer demand in the Health Care occupations continues to grow in St. Clair County, like in much of southeast Michigan. Increased demand is correlated with growth in employment for these types of workers.

### Employment Over Time

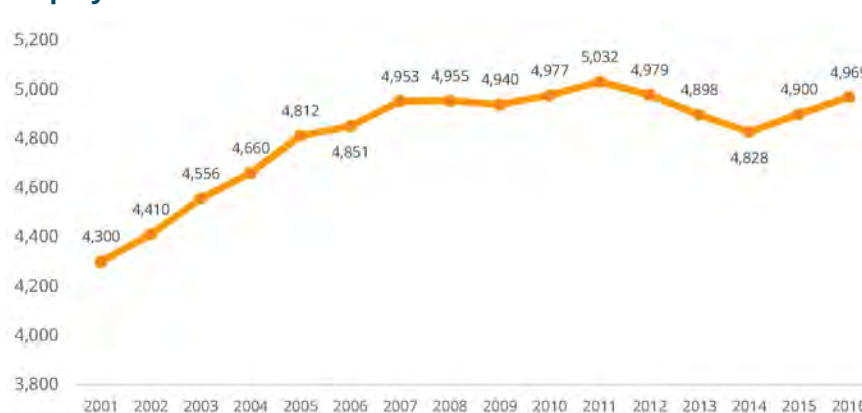
Health Care occupations employed 4,900 workers in St. Clair County during 2015; estimates for 2016 have grown to 4,969. As employer demand, determined by online job ads, has grown steadily over the past 5 years, so has employment.

### Online Job Postings



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

### Employment Over Time



Data: EMSI, BLS  
Analysis: Workforce Intelligence Network

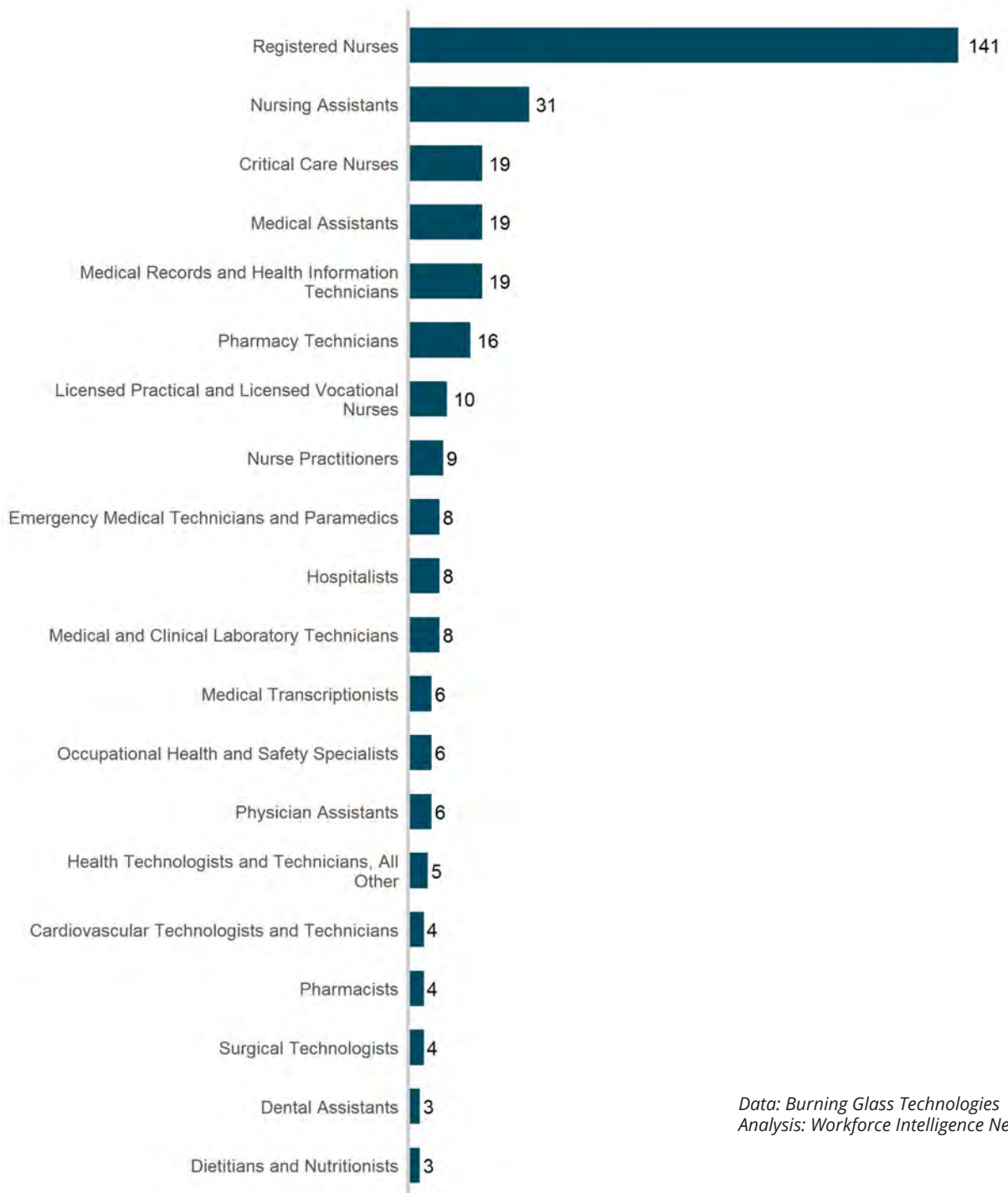


Now hiring:  
365 Health Care job postings



4,900 Health Care workers  
in St. Clair County

**Health Care  
Top Jobs**  
Quarter 2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network



Short-term training  
required

\$30/hr.  
wages for registered nurses

### Health Care Educational Attainment & Experience Required

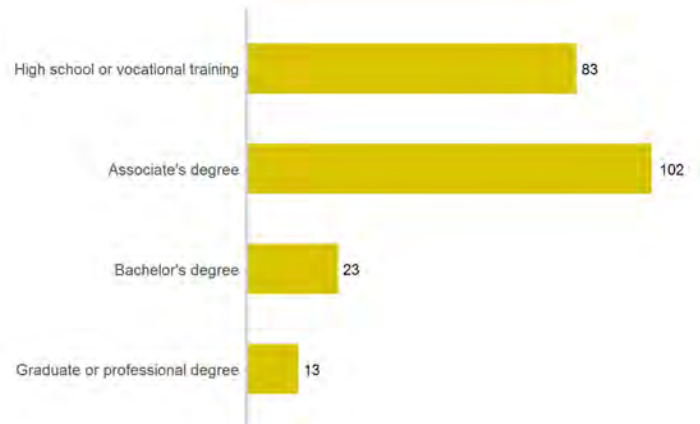
Because occupations like registered nurses and medical assistants are the most in-demand Health Care jobs in St. Clair County, most of Q2 job postings did not require more than some vocational training or an associate's degree. With this in mind, though, a large number of Health Care professions are available to workers with higher education (a bachelor's or graduate degree) and offer higher wages.

Similar to the demand for applicants with vocational training or an associate's degree, most of the Health Care postings in St. Clair County during Q2 were options for workers with less than 2 years of experience. Entry-level workers (165 postings) are able to secure a job as a medical assistant or registered nurse if they are willing to undertake some short-term training or a degree program.

### Areas of Study in-Demand Q1 2016

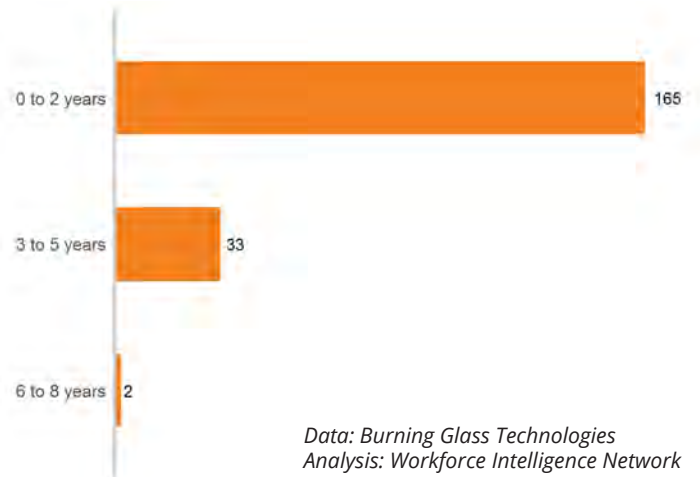
- Nursing science
- Occupational therapy
- Physical therapy
- Audiology and speech-language pathology
- Clinical laboratory science, medical technology

### Minimum Educational Attainment Required Q2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

### Experience Required Q2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network



Associate's degree  
required

\$57,351

mean advertised salary

### Health Care in-Demand Skills Q2 2016

St. Clair County workers looking to find a job in the Health Care occupations are expected to have good communication skills, problem solving and decision-making skills, and demonstrated organizational and supervisory ability as a prerequisite for employment. Beyond these foundational skills, Health Care employers are seeking job candidates who have experience with specific types of patient care, including neonatal intensive and surgical services, along with skills in patient education and record filing.

#### In-Demand Technical Skills

- Patient care, education, and instruction, & treatment planning
- Surgical services
- Critical care, neonatal intensive care unit (NICU)
- Post Anesthesia Care Unit (PACU)
- Supervisory skills
- Advanced Cardiac Life Support (ACLS)

#### In-Demand Foundational Skills

- Communication skills
- Problem solving and decision making
- Clerical duties and organizational skills
- Quality assurance and control
- Teamwork and collaboration

#### Job Type

- Temporary: 2.2%
- Full-Time: 29.3%
- Part-Time: 7.4%

#### In-Demand Certifications

- Registered nurse (RN)
- Certified nursing assistant (CNA)
- Emergency medical technician (EMT)
- Certified medical assistant
- Registered health information technician/administrator



Knowledge areas: nursing,  
physical therapy

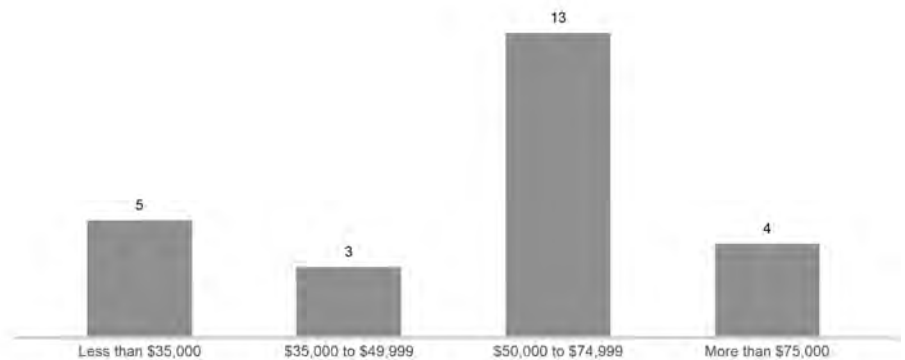


Certifications in-demand:  
RN, CNA, EMT

## Health Care Wages

Only 25 of the 365 Health Care job postings for Q2 advertised a salary range. Of those that did, 13 jobs offered salaries between \$50,000 and \$75,000 a year, with another 4 advertising salaries over \$75,000. Data from the Bureau of Labor Statistics show that a job in Health Care, like as a registered nurse, can pay over \$30 per hour at the median, or \$62,400 annually, for a position that generally requires just a two-year degree.

## Advertised Salaries Quarter 2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

## Wage Data from Bureau of Labor Statistics 2015

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
29-1141	Registered Nurses	\$22.77	\$26.68	\$30.43	\$34.82	\$49.77
31-1014	Nursing Assistants	\$8.88	\$10.31	\$12.15	\$14.15	\$15.82
29-1141	Critical Care Nurses	\$22.77	\$26.68	\$30.43	\$34.82	\$49.77
31-9092	Medical Assistants	\$9.65	\$11.11	\$12.61	\$14.72	\$16.42
29-2071	Medical Records and Health Information Technicians	\$9.66	\$11.70	\$15.11	\$18.68	\$21.38
29-2052	Pharmacy Technicians	\$8.33	\$9.88	\$12.24	\$14.73	\$16.54
29-2061	Licensed Practical and Licensed Vocational Nurses	\$15.22	\$17.92	\$20.98	\$24.15	\$26.18
29-1171	Nurse Practitioners	\$32.81	\$36.29	\$40.60	\$46.88	\$52.21
29-2041	Emergency Medical Technicians and Paramedics	\$9.57	\$11.68	\$14.32	\$17.00	\$20.20
29-1069	Hospitalists	\$24.66	\$68.30	\$82.80	\$99.60	\$156.60

Data: EMSI, BLS  
Analysis: Workforce Intelligence Network



## Introduction

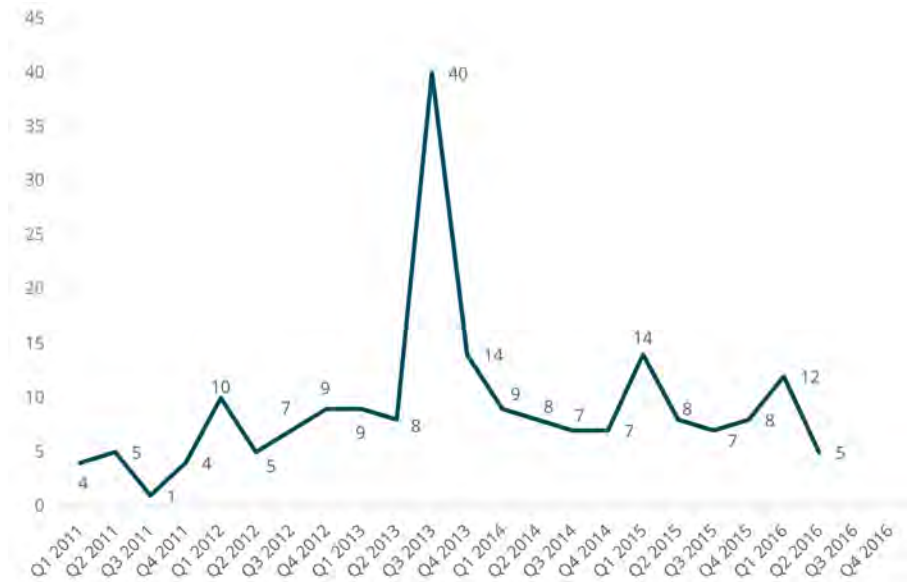
### Energy

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. Data referenced in this section pertain only to job postings from energy-related businesses.

### Postings Over Time

St. Clair County employers posted just 5 online job postings in the Energy occupations during Q2, down from 12 in Q1 2016. Employer demand for these occupations is generally small, with few postings each quarter. The highest number of postings since the beginning of WIN analysis was 40 ads in Q3 2013.

### Online Job Postings

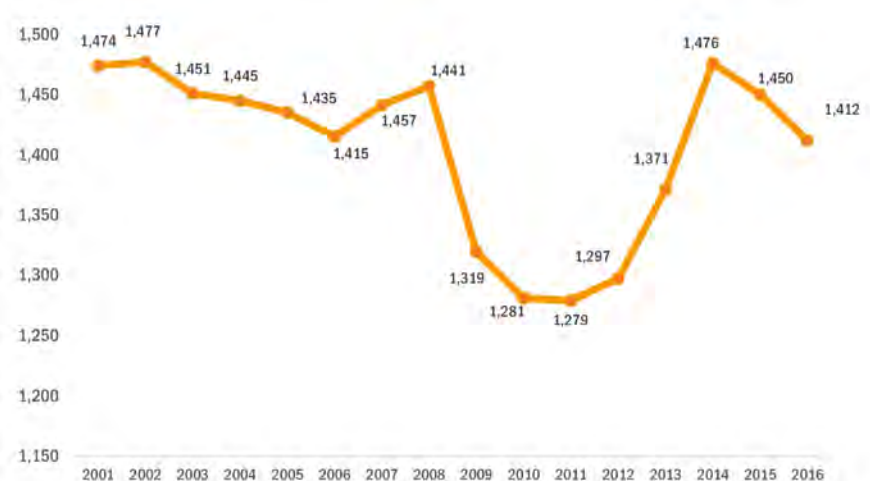


Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

### Employment Over Time

The data presented in the graph to the right represents St. Clair County's total employment in the Energy industries (NAICS 2111, 2131, 2211, 2212, 2371), not just WIN-designated Energy occupations. In 2016, 1,412 workers are employed in these Energy industries in St. Clair County. Employment in these industries dipped slightly, losing about 200 jobs, during the Great Recession but recovered to 1,476 employees in 2014. Employment numbers have, however, decreased both in 2015 and 2016.

### Employment Over Time



Data: EMSI, BLS  
Analysis: Workforce Intelligence Network

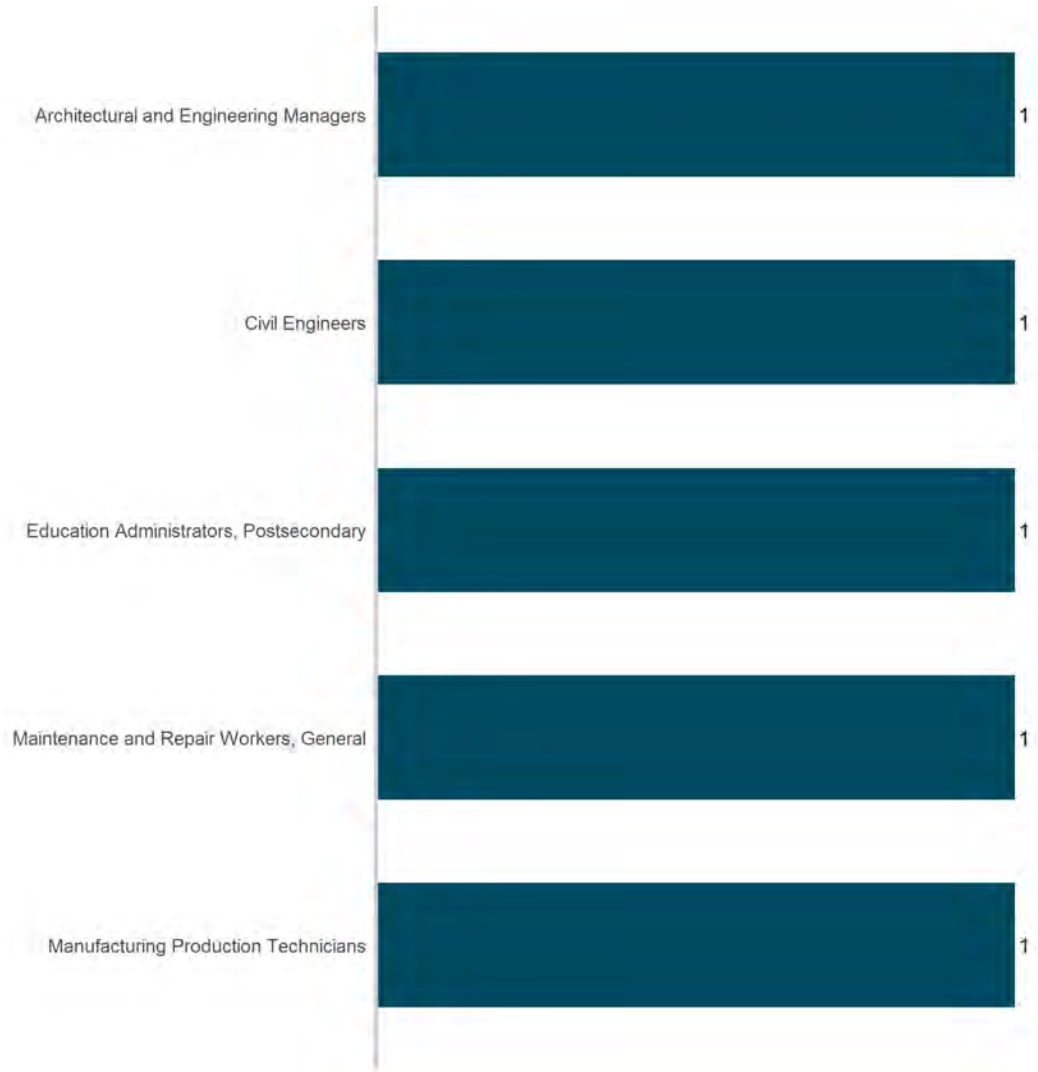


Now hiring:  
5 Energy job postings



Stable employment in  
Energy industry

**Energy  
Top Jobs**  
Quarter 2 2016



*Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network*





Education required:  
high school diploma

1,400

employment in Energy  
occupations

### Energy Educational Attainment & Experience Required

Data from Q2 online job postings show that many Energy jobs open in St. Clair County are available to workers with a high school diploma and some vocational training (two postings). An additional two job postings this quarter sought candidates with a bachelor's degree, likely for the in-demand manager occupations. Only one job posting from Q2 specified a desired level of experience.

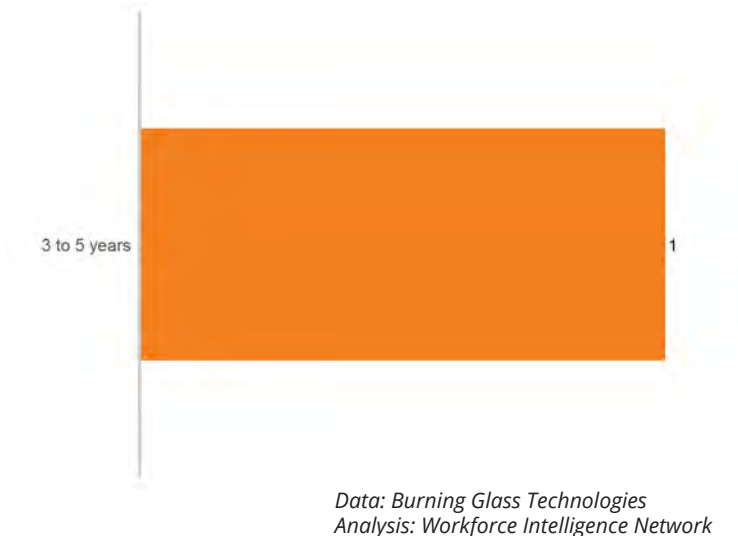
### Minimum Educational Attainment Required Q2 2016



### Areas of Study in-Demand Q2 2016

Data not available

### Experience Required Q2 2016





Experience required:  
less than 5 years

40%  
ads for temporary positions

### Energy in-Demand Skills Q2 2016

Baseline, employability skills for Energy occupations in St. Clair County include communication skills, computer skills, organizational skills, and the ability to perform physically demanding tasks. Employers looking to hire workers for Energy occupations during Q2 2016 sought candidates with experience in budget preparation and technical knowledge in biology and chemistry.

#### In-Demand Technical Skills

- Budgeting, budget preparation
- Inspection
- Biology
- Chemistry
- Data collection

#### In-Demand Foundational Skills

- Physical demand
- Communication skills
- Computer skills
- Organizational skills
- Planning, detail-oriented

#### Job Type

- Temporary: 40.0%
- Full-Time: data not available
- Part-Time: data not available

#### Certifications In-Demand

- Professional Engineering license



In-demand skills:  
budgeting, data collection



Median Energy wages:  
> \$25/hour

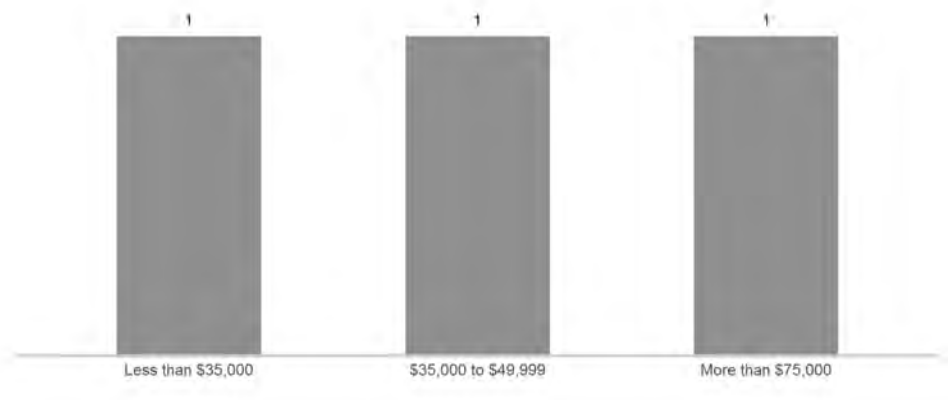
## Energy

### Wages

Only three of the Energy job postings from Q2 2016 advertised a wage or salary range. In the absence of this data, wage data from the Bureau of Labor Statistics show that many of the in-demand Energy occupations in St. Clair County pay high wages. Four of the top five occupations can expect wages greater than \$25 per hour, or \$52,000 annually, at the median.

## Advertised Salaries

Quarter 2 2016



Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

## Wage Data from Bureau of Labor Statistics 2015

Occupation Code	Occupation Name	10th Percentile Wages	25th Percentile Wages	Median Wages	75th Percentile Wages	90th Percentile Wages
11-9041	Architectural and Engineering Managers	\$36.82	\$44.09	\$51.04	\$60.80	\$69.61
17-2051	Civil Engineers	\$20.01	\$24.68	\$29.70	\$33.70	\$40.27
11-9033	Education Administrators, Postsecondary	\$21.56	\$28.35	\$38.05	\$51.40	\$63.80
49-9071	Maintenance and Repair Workers, General	\$9.21	\$11.18	\$14.24	\$18.86	\$23.82
17-3029	Manufacturing Production Technicians	\$14.66	\$20.00	\$27.52	\$33.08	\$42.71

Data: EMSI, BLS  
Analysis: Workforce Intelligence Network

### Annual Labor Market Data

	2010 Annual	2011 Annual	2012 Annual	2013 Annual	2014 Annual	2015 Annual	2016 to- date (through May 2016)	Change from 2015	Percent Change from 2015
Labor Force	77,674	74,208	73,465	73,970	73,080	72,335	<b>73,794</b>	1,460	2.0%
Employment	64,934	64,509	64,841	65,398	65,980	67,169	<b>69,026</b>	1,857	2.8%
Unemployment	12,741	9,699	8,624	8,572	7,101	5,166	<b>4,769</b>	-397	-7.7%
Unemployment Rate	16.4%	13.1%	11.7%	11.6%	9.7%	7.1%	<b>6.5%</b>	-0.7%	na

*\*Note: Monthly data averaged by year*

Data: Bureau of Labor Statistics

### Quarterly Labor Market Data

	2nd Quarter 2015	3rd Quarter 2015	4th Quarter 2015	1st Quarter 2016	2nd Quarter 2016 (through May 2016)	Change from 1st Quarter 2016	Percent Change from 1st Quarter 2016
Labor Force	72,280	72,799	72,207	73,825	<b>73,749</b>	-76	-0.1%
Employment	67,150	67,687	67,757	68,603	<b>69,660</b>	1,057	1.5%
Unemployment	5,130	5,112	4,450	5,222	<b>4,090</b>	-1,132	-21.7%
Unemployment Rate	7.1%	7.0%	6.2%	7.1%	<b>5.5%</b>	-1.5%	na

*\*Note: Monthly data averaged by quarter*

Data: Bureau of Labor Statistics










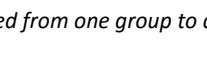


### Monthly Labor Market Data

	March 2015	April 2015	May 2015	June 2015	July 2015	August 2015	Septembe r 2015	October 2015	November 2015	Decembe r 2015	January 2016	February 2016	March 2016	April 2016	May 2016
Labor Force	71,922	71,044	72,809	72,987	73,584	72,761	72,052	72,378	71,747	72,496	73,230	73,660	74,584	74,584	74,584
Employment	66,250	66,392	67,404	67,654	67,642	67,801	67,618	67,741	67,679	67,850	67,926	68,575	69,308	69,308	69,308
Unemployment	5,672	4,652	5,405	5,333	5,942	4,960	4,434	4,637	4,068	4,646	5,304	5,085	5,276	5,276	5,276
Unemployment Rate	7.9%	6.5%	7.4%	7.3%	8.1%	6.8%	6.2%	6.4%	5.7%	6.4%	7.2%	6.9%	7.1%	7.1%	7.1%

*\* Note: Data shown for 15 most recently available months*

Data: Bureau of Labor Statistics


















# St. Clair County Job Posting Data by Occupation Group\* Over Time

	Q2 2015	Q3 2015	Q4 2015	Q1 2016	Q2 2016	Change Over Time	Annual Change Q2 2015-Q2 2016	Quarter Growth Q1 2016-Q2 2016
Total Postings	1,807	1,697	1,461	1,730	1,788		-1.1%	3.4%
Agriculture	27	23	14	40	33		22.2%	-17.5%
Business & finance	43	79	45	68	72		67.4%	5.9%
Construction	22	12	4	8	16		-27.3%	100.0%
Customer service	474	543	386	429	405		-14.6%	-5.6%
Education	22	24	15	22	13		-40.9%	-40.9%
Energy	8	7	8	12	5		-37.5%	-58.3%
Engineers & designers	63	41	50	56	59		-6.3%	5.4%
Health care	285	299	312	387	365		28.1%	-5.7%
Information technology	30	28	21	29	41		36.7%	41.4%
Skilled trades & technicians	96	75	50	66	85		-11.5%	28.8%
Transportation, distribution, and logistics	238	167	158	212	305		28.2%	43.9%

*\*Note: Some overlap exists between groups, the occupational groups are not mutually exclusive. Thus, postings should not be added from one group to another but instead should be analyzed on their own.*

Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

## Total Job Postings: WIN Partnership

	Q2 2015	Q3 2015	Q4 2015	Q1 2016	Q2 2016	Share of Q2 2016 Total	Change Over Time	Annual Change Q2 2015-Q2 2016	Quarter Growth Q1 2016-Q2 2016
WIN-Region Total	129,794	140,225	126,959	143,199	139,765	100.0%		7.7%	-2.4%
Detroit	27,742	30,426	27,966	29,296	28,456	20.5%		2.6%	-2.9%
Genesee & Shiawassee	5,071	5,465	4,721	5,711	5,631	4.0%		11.0%	-1.4%
Hillsdale & Lenawee	1,495	1,467	1,580	1,678	1,606	1.2%		7.4%	-4.3%
Jackson	2,415	2,373	2,099	2,557	2,181	1.8%		-9.7%	-14.7%
Livingston	2,151	2,274	2,048	2,472	2,162	1.7%		0.5%	-12.5%
Macomb	13,586	14,136	12,658	14,754	14,257	10.3%		4.9%	-3.4%
Monroe	1,871	1,778	1,662	1,841	1,694	1.3%		-9.5%	-8.0%
Oakland	40,219	44,474	39,030	45,418	43,058	31.7%		7.1%	-5.2%
St. Clair	1,807	1,697	1,461	1,730	1,788	1.2%		-1.1%	3.4%
Thumb Area	1,208	1,199	1,561	1,673	1,598	1.2%		32.3%	-4.5%
Washtenaw	11,192	11,812	10,540	11,951	11,020	8.3%		-1.5%	-7.8%
Wayne	50,930	55,824	51,993	55,886	54,770	39.0%		7.5%	-2.0%
Outer Wayne	23,188	25,398	24,027	26,590	26,314	18.6%		13.5%	-1.0%
Prosperity Region 6	8,086	8,361	7,743	9,114	9,017	6.4%		11.5%	-1.1%
Prosperity Region 9	19,124	19,704	17,929	20,499	18,663	14.3%		-2.4%	-9.0%
Prosperity Region 10	104,735	114,434	103,681	116,058	112,085	81.0%		7.0%	-3.4%

Data: Burning Glass Technologies  
Analysis: Workforce Intelligence Network

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