

**A WORLD OF OPPORTUNITY  
IN INFORMATION TECHNOLOGY  
IN SOUTHEAST MICHIGAN!**



# Washtenaw Community College

# *IGNITE* MICHIGAN PROGRAM



# CREATING AN INFORMATION TECHNOLOGY JOBS PIPELINE!





**WCC Economic Development and Instructional Divisions helps fill the critical demand for skilled IT workers with specialized technical training.**

**Our IGNITE\* program provides career skills in the critical areas of:**

- Java software development
- Microsoft Technology Associate
- Linux/Unix network and systems administration

*\* Intentionally Growing New Information  
Technology Employees in Michigan*

*talent*

**Funding is made possible through the Department of Labor's Trade Adjustment Assistance for Community Colleges Career Training program.**

**WCC is proud to partner with:**

Quicken Loans

Google

The Advisory Board Company

MyBuys

Ann Arbor SPARK

Workforce Intelligence

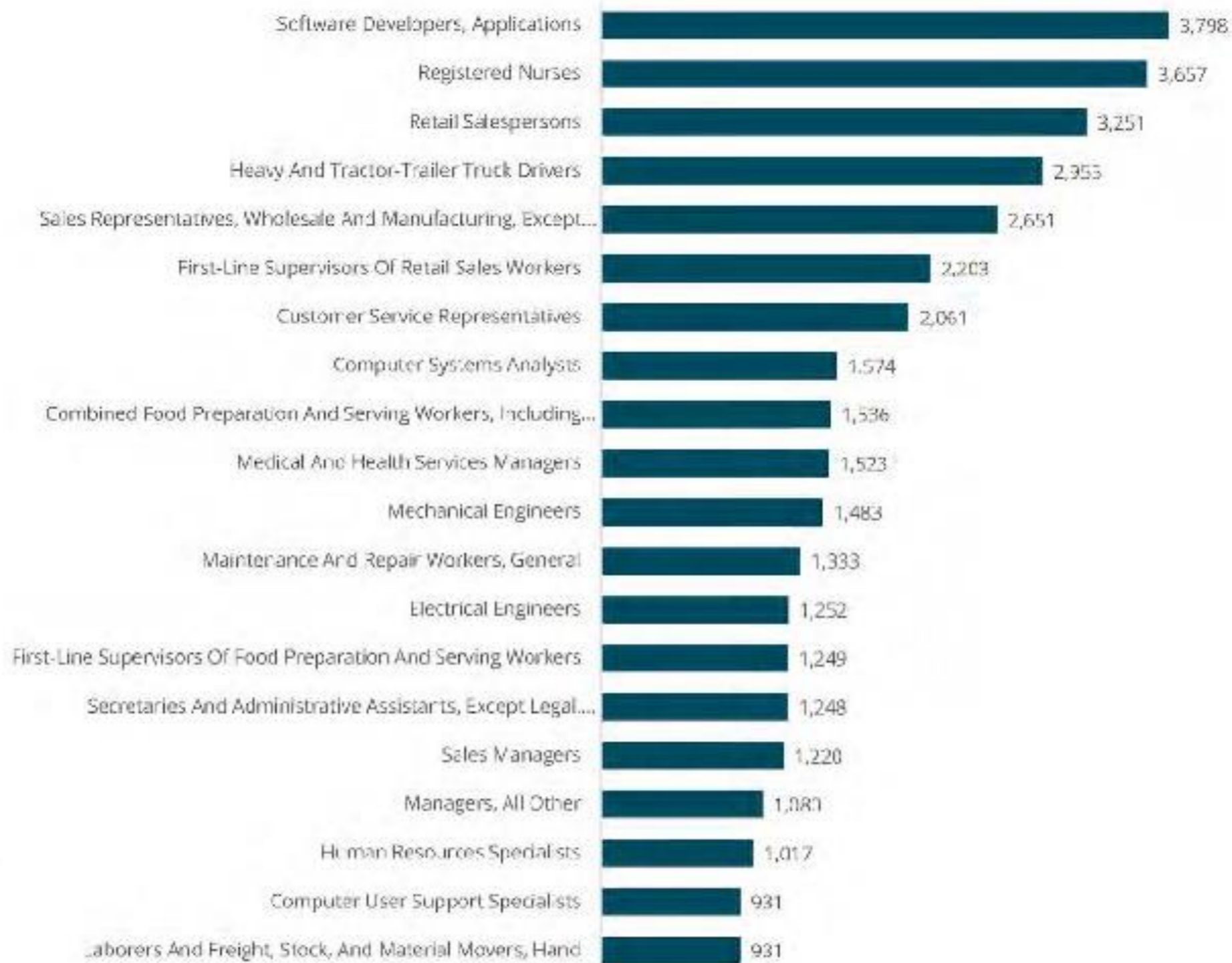
Network IT Council

Washtenaw and Livingston

Michigan Works! Agencies

# TOP 20 JOBS IN DEMAND

APRIL - JUNE 2014

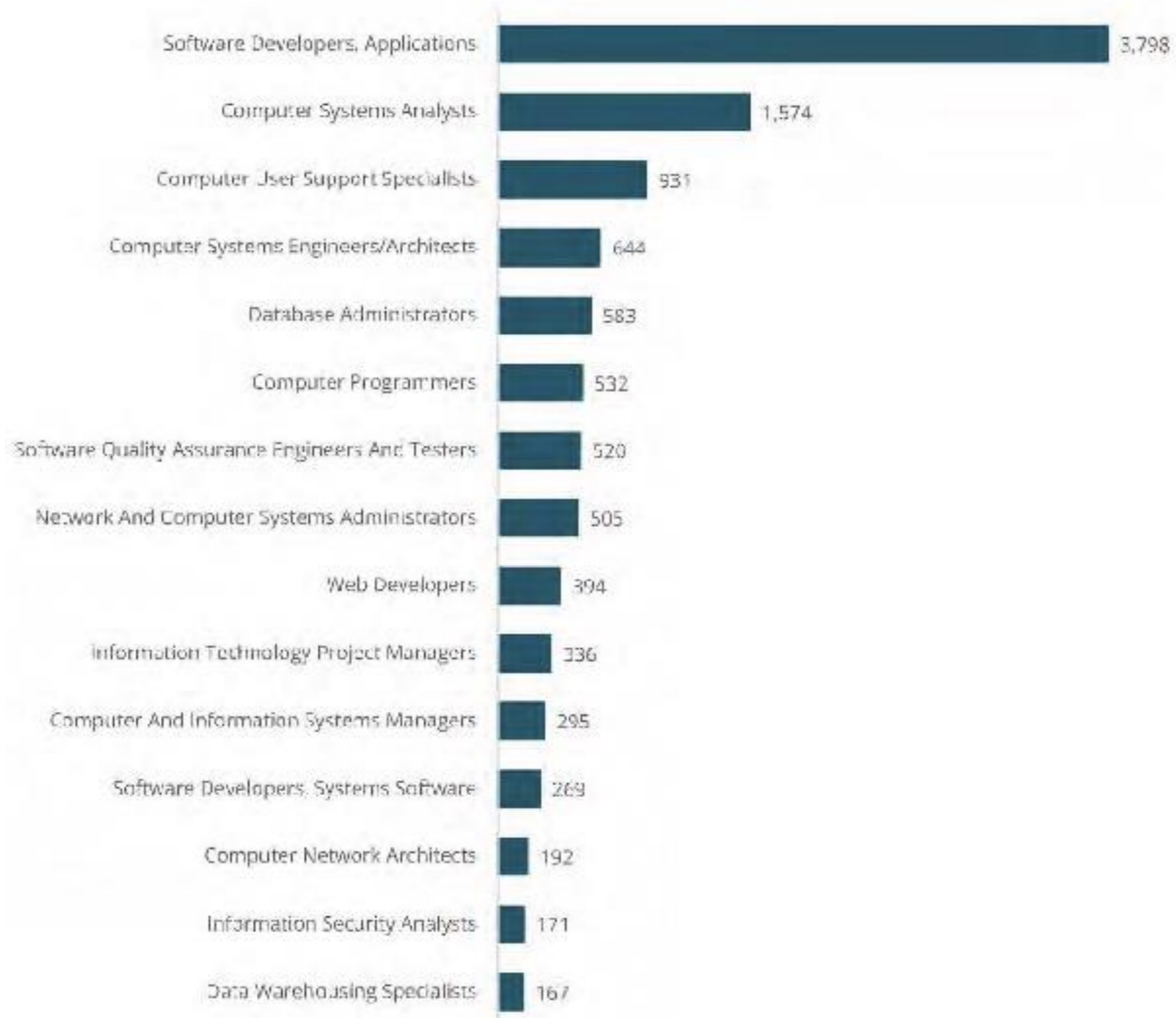


Southeast Michigan

2<sup>nd</sup> Qtr 2014

# INFORMATION TECHNOLOGY

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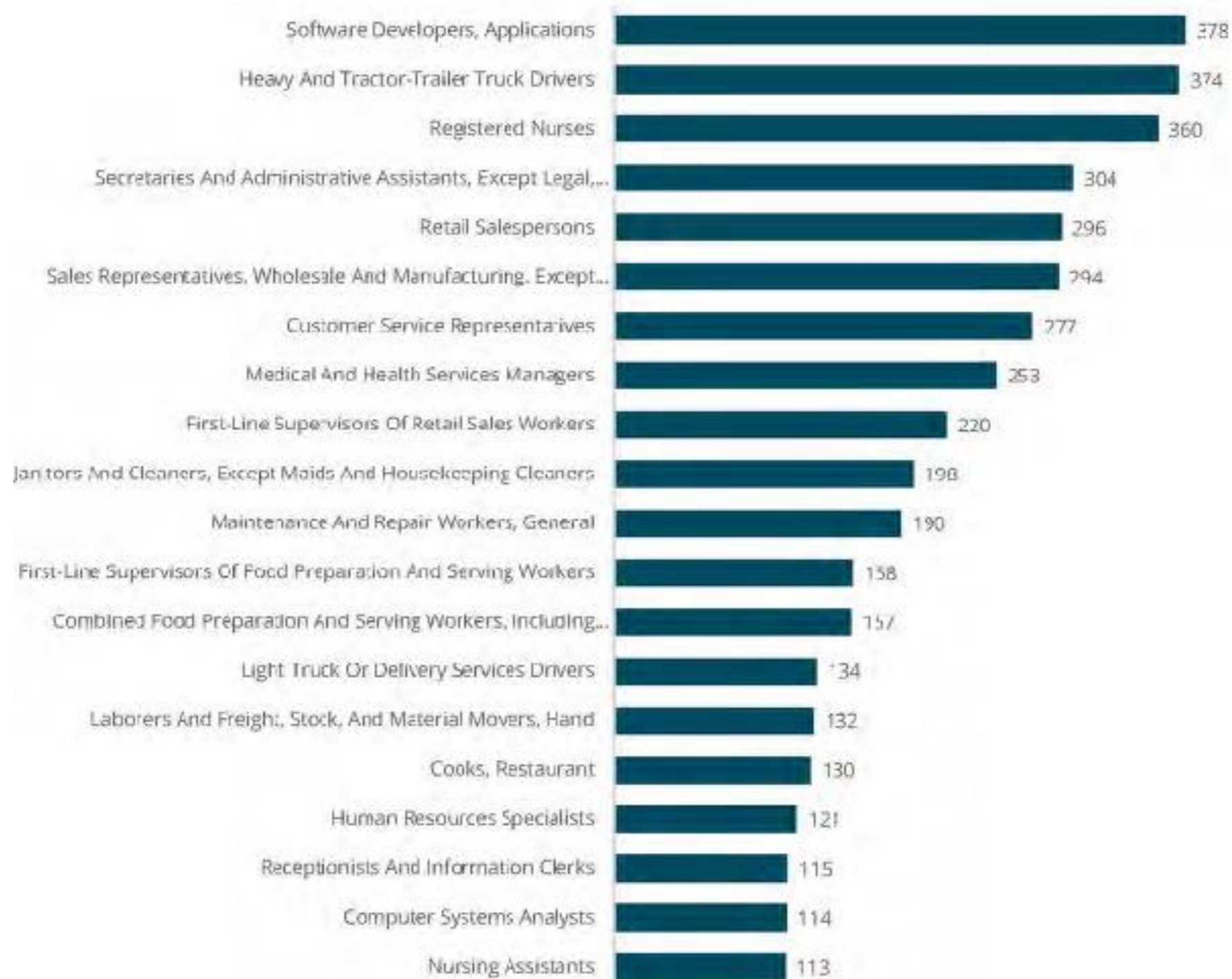
# INFORMATION TECHNOLOGY

## TOP 10 JOBS WAGES

ONET Code	Occupation	Median Hourly Earnings	10th Percentile Hourly Earnings	90th Percentile Hourly Earnings	2012 Mean Salary according to BLS
15-1132	Software Developers, Applications	\$32.68	\$21.45	\$47.76	\$93,280
15-1121	Computer Systems Analysts	\$49.68	\$33.50	\$64.48	\$83,800
15-1151	Computer User Support Specialists	\$39.60	\$26.22	\$62.58	\$50,130
15-1199	Computer Systems Engineers/Architects	\$27.38	\$17.95	\$38.18	\$81,860
15-1141	Database Administrators	\$26.89	\$15.28	\$40.89	\$79,120
15-1131	Computer Programmers	\$40.00	\$24.68	\$59.09	\$78,260
15-1199	Software Quality Assurance Engineers And Testers	\$27.38	\$17.95	\$38.18	\$81,860
15-1142	Network And Computer Systems Administrators	\$36.51	\$21.54	\$54.20	\$76,320
15-1134	Web Developers	\$40.25	\$27.03	\$60.02	\$66,100
15-1199	Information Technology Project Managers	\$27.38	\$17.95	\$38.18	\$81,860

# TOP 20 JOBS IN DEMAND

APRIL – JUNE 2014



2<sup>nd</sup> Qtr 2014

Washtenaw County

Information Technology



## INFORMATION TECHNOLOGY

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15-1142	Network And Computer Systems Administrators	\$36.51	\$21.54	\$54.20	\$76,320
11-3021	Computer And Information Systems Managers	\$36.88	\$22.31	\$60.79	\$129,130
15-1133	Software Developers, Systems Software	\$37.97	\$25.22	\$55.79	\$102,550

# **TWO HIGH DEMAND SKILL AREAS:**

**LINUX / UNIX  
&  
JAVA**

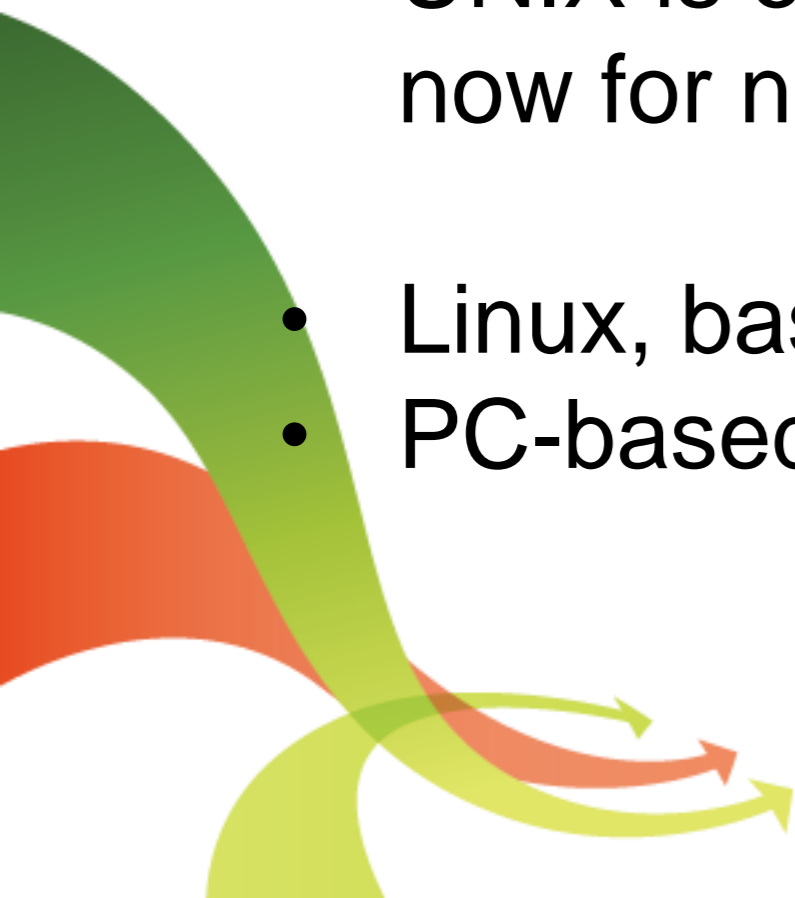


**WASHTENAW COMMUNITY COLLEGE**  
**IGNITE MICHIGAN GRANT**  
**INFORMATION TECHNOLOGY CERTIFICATE PROGRAMS**

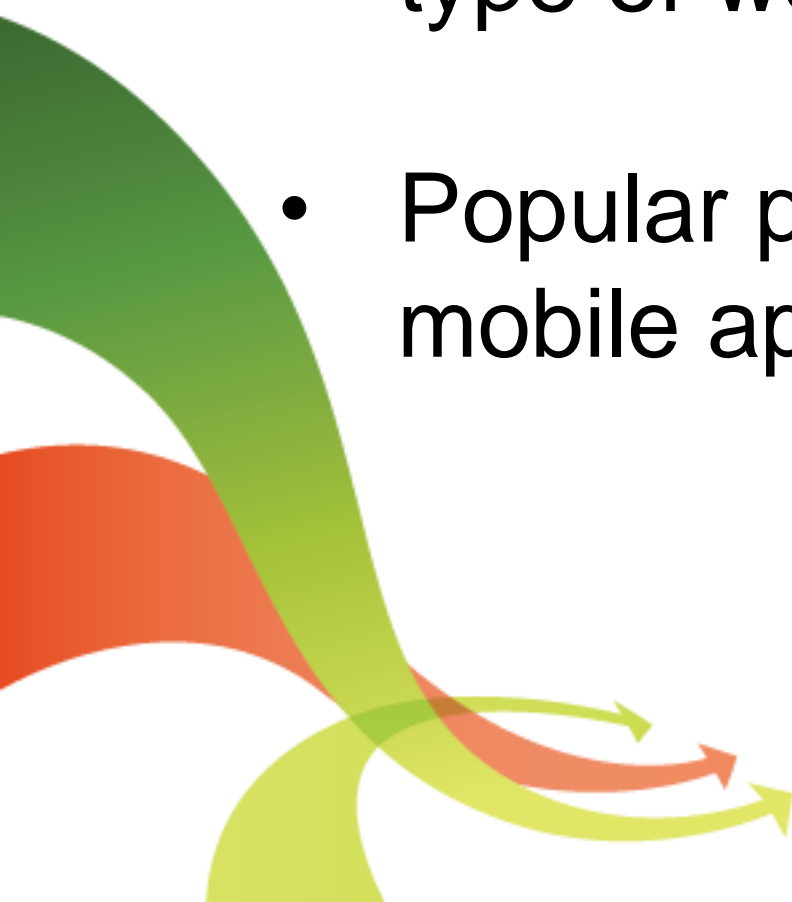
NON-CREDIT PROGRAM								
(Can be articulated for 3 credits as CIS 306 – Computer & Information Literacy)	Course		Contact Hours	Credits	NON-CREDIT CERTIFICATE TESTING & AWARD:			
	CIS 1017 – Career Readiness Certificate: IT • Module 1: An Orientation to Online Learning • Module 2: Is I.T. for Me? • Module 3: Non-technical, but Necessary Skills for IT		30	3.0CEUs*				<ul style="list-style-type: none"> <li>• WorkKeys National Career Readiness Certificate</li> <li>• Internet and Computing Core Certification (IC<sup>3</sup>)</li> <li>• WCC Career Readiness Certificate: IT</li> </ul>
CREDIT PROGRAM								
ACADEMIC CERTIFICATE PRE-PROGRAM (RECOMMENDED:)	Course		Contact Hours	Credits	<b>CNT 100 - INTRO TO WINDOWS NETWORKING (MICROSOFT TECHNOLOGY ASSOCIATE)</b>			
	CPS 120 - Intro to Computer Science		45	3				
<b>WCC LINUX/UNIX SYSTEMS CERTIFICATE</b>			<b>WCC PROGRAMMING IN JAVA ADVANCED CERTIFICATE</b>					
Course	Contact Hours	Credits	Course	Contact Hours	Credits	Modules	Contact Hours	Credits
CIS 121 – Linux/Unix Fundamentals	60	4	CPS 161 – Intro to Programming with Java	60	4	MTA - Windows Operating Fundamentals	60	4
CIS 206 – Basic Linux / Unix System Admin, Networking and Security	60	4	CPS 261 – Advanced Java Concepts	60	4	MTA - Windows Server Admin Fundamentals		
CIS 208 Linux / Unix III : Intermediate System Admin, Networking and Security	60	4	CPS 278 – Java Server Programming	60	4	MTA - Networking Fundamentals		
CIS 221 – Linux / Unix Programming & Scripting	60	4	CPS 251 – Android Programming Using Java	60	4	MTA - Windows Security Fundamentals		
Industry Certificate Prep: CompTIA Linux+, LPI-1			Industry Certificate Prep: Oracle Java SE Programmer			Industry Certificate Prep: Microsoft Technology Associate		

# WHAT ARE LINUX & UNIX?

- Open source computer operating systems
- Similar in purpose to Windows
- UNIX is older – originally for big mainframes, now for network servers and workstations
- Linux, based on UNIX but, is newer – for
- PC-based systems



# WHAT IS JAVA?

- One of the most widely used computer programming languages
  - Designed to run on multiple platforms and any type of web browser – very flexible
  - Popular programming language for developing mobile apps
- 

“[Writing code] is the new literacy. In this century if you want to have the power to change the world, writing code is the most practical thing you can do,” says Alexis Ohanian, co-founder of reddit and author of the new book *Without Their Permission*.



# JOB ASSOCIATED WITH LINUX/UNIX & JAVA SKILLS SETS

- Network Administrator
  - Computer User Support Specialist
  - Network Specialist
  - Computer Programmer
  - System Software Developer
- 

# Getting your feet wet...

## CAREER EXPLORATION LEVEL

Washtenaw Community College's  
IT (Information Technology)  
Career Academy





# WCC IT Career Academy

## Beginner level training:

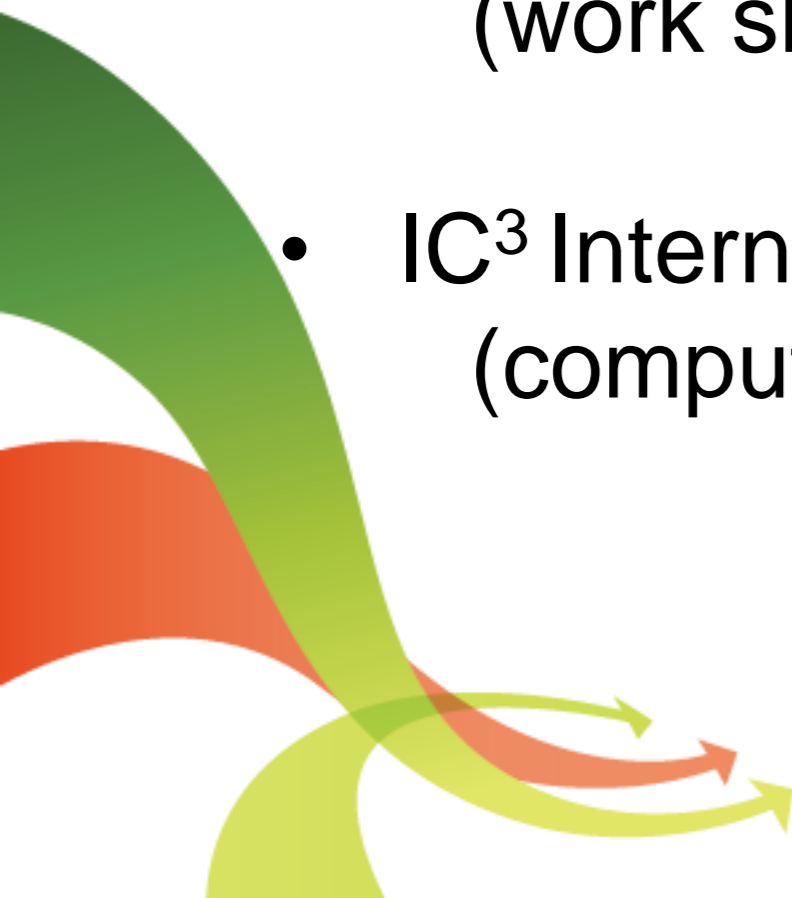
- IT Career Readiness Course (30 contact hrs)
  - Orientation to Online Learning
  - Is IT Right For Me? (Intro to the IT industry)
  - Non-technical, But Necessary, Skills For IT  
(Team skills training)



# WCC IT Career Academy

## Certifications you can earn:

- ACT National Career Readiness Certificate  
(work skills certification)
- IC<sup>3</sup> Internet & Computer Core Certification  
(computer literacy certification)



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**INFORMATION TECHNOLOGY CERTIFICATE PROGRAMS**

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Industry Certificate Prep: CompTIA Linux+, LPI-1			Industry Certificate Prep: Oracle Java SE Programmer			Industry Certificate Prep: Microsoft Technology Associate		

# **BASIC ENTRY LEVEL:**

## **MICROSOFT TECHNOLOGY ASSOCIATE INDUSTRY CERTIFICATION**

CNT 100 – Introduction to Windows Networking  
(4 credits)

Exam prep for MTA certification exam.



**THE NEXT LEVEL:**

**LINUX/UNIX SYSTEMS CERTIFICATE TRACK**

**OR**

**JAVA PROGRAMMING CERTIFICATE TRACK**



# Linux / Unix Systems Certificate

CIS 121 – Linux/UNIX Fundamentals (4 credits)

CIS 206 – Basic Linux/UNIX System Admin, Networking & Security (4 credits)

CIS 208 – Linux/UNIX III: Intermediate System Admin, Networking & Security (4 credits)

CIS 221 – Linux/UNIX Programming & Scripting (4 credits)

WCC Academic Certificate – Linux/Unix Systems

Industry certificate available – Linux+ Certificate via (CompTIA)



# Java Programming Certificate

CPS 161 – Intro to Programming with Java (4 credits)

CPS 251- Android Programming Using Java (4 credits)

CPS 261 – Advanced Java Concepts (4 credits)


CPS 278 – Java Server Programming (4 credits)

WCC Certificate – Program with Java Advanced Certificate

Industry certificate available – Java SE Programmer via Oracle



## IGNITE GRANT PROGRAM PARTICIPANT BENEFITS

- ❖ Accelerated course offerings, quicker completion
  - ❖ Convenient, highly-engaging, blended courses – part classroom, part online.
  - ❖ Dedicated program advisor
  - ❖ Dedicated program tutor
  - ❖ Dedicated program internship coordinator / career advisor
- 



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