



JPMORGAN CHASE & CO.



CSW
Corporation for a
Skilled Workforce

***UNDERSTANDING YOUR COMMUNITY:
LABOR MARKET AND
WORKFORCE DEVELOPMENT
SYSTEM DATA TOOLKIT***

JANUARY 2019

About CSW

Corporation for a Skilled Workforce is a national nonprofit that partners with government, business, and community leaders to connect workers with good jobs, increase the competitiveness of companies, and build sustainable communities. For more than 25 years, we have been an effective catalyst for change. We identify opportunities for innovation in work and learning and provoke transformative change in policy and practice. We have worked with dozens of workforce investment boards, state and local workforce agencies, community-based organizations, foundations, federal agencies, and colleges to create lasting impact through their collaborative action.

www.skilledwork.org

About the Authors

Megan Elyse Williams is a research and evaluation policy associate at CSW. She has served on more than 20 research and evaluation project teams and participated as the lead evaluator on 11 of these teams over the course of her career. These projects have included workforce development programs, youth development/college access programs, criminal justice programs, cancer care programs, and community leadership interventions, which were at the local, state, and national levels. She has experience collecting, analyzing, and reporting both qualitative and quantitative data. Most recently, she has been responsible for providing City of Detroit policymakers and stakeholders with labor market data and analysis. Current work includes supporting the Workforce Benchmarking Network with data collection and analysis, the JPMorgan Chase & Co.-funded work in Detroit, and the NSF-funded evaluation of the Idaho State University Energy Systems Technology and Education Center.

Tammy Coxen is now a consultant to CSW. While employed at CSW, she developed and implemented several of CSW's key models and methodologies for using labor market information to understand workforce dynamics, and as a consultant she continues to apply these to her research, writing, and facilitation work. She has authored more than a dozen industry and community analysis reports across the country, most recently including a report on manufacturing in San Francisco. Coxen has a deep understanding of sector and cluster strategies through her work with the Accelerating State Adoption of Sector Strategies project conducted in partnership with the National Governors Association Center for Best Practices and the National Network of Sector Partners. She has also been deeply involved in CSW's Detroit work funded by JPMorgan Chase & Co. She was the primary researcher and author for the "Detroit's Untapped Talent: Jobs and On-Ramps Needed" report and has provided data and analysis to the Detroit Mayor's Office and other City of Detroit stakeholders.

Jeannine LaPrad is a Senior Fellow at CSW. She is responsible for advancing CSW's mission of transforming work and education through research and action. LaPrad has led a range of client engagements with public agencies, foundations, and industry associations. These projects have focused on reshaping postsecondary education to make it more accessible for nontraditional students as well as reinventing policies, systems, and practices that create more equitable outcomes for low-income workers and communities. LaPrad's experience also includes developing partnerships with business and education leaders and forming learning networks to strengthen communities of practice. She has led the research and evaluation of different workforce development policies and programs in Michigan, currently with a focus in Detroit, as well as in other states and communities around the country. This includes working with clients and partners on needed labor market and program data collection, stakeholder engagement, partnership building, and workforce development system reviews that help communities address critical employment and educational attainment issues.

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*UNDERSTANDING YOUR
COMMUNITY:
LABOR MARKET
AND WORKFORCE
DEVELOPMENT SYSTEM
DATA TOOLKIT*





As part of JPMorgan Chase & Co.'s \$100 million commitment to Detroit's economic recovery, the Corporation for a Skilled Workforce (CSW) authored two workforce development system mappings reports, "[Detroit's Untapped Talent: Jobs and On-Ramps Needed](#)" and "[Detroit's Untapped Talent: Partnerships and Pathways to Success](#)," along with a [working paper](#). These reports are intended to help identify and align different workforce development efforts and investments, including those made by the Detroit Workforce Development Board. They also provide a snapshot of the mix of funding in the system, the range of organizations providing workforce development programs and services, and industry sector and other partnerships in the region.

Access to accurate, easily shared data is an essential resource that helps local and state leaders and practitioners better understand local demographic trends, business and talent development needs, and their choices for investing public and private resources in workforce development initiatives and programs. Furthermore, real-time data and information about workforce development system supply, demand, and resources help local elected officials, workforce development boards, and employers fill their workforce needs; improve access to jobs, training, and career pathways for residents; and increase cost efficiency and relevancy in both public and private sector workforce development program investments.

In Detroit, we are already seeing the positive results of making these data available to policymakers, employers serving on the workforce development board, philanthropic funders, and workforce development providers.

In Detroit, we are already seeing the positive results of making these data available to policymakers, employers serving on the workforce development board, philanthropic funders, and workforce development providers. For example, we're seeing a greater interest in collecting and sharing, in aggregate, labor market and program-level data that can provide information about the mix, quantity, and quality of workforce development programs and services currently provided; the number of individuals receiving these services; patterns of movement and success for participants across these services; short-term and long-term outcomes of programs, including participants' employment and wage gains at various intervals following service delivery; and alignment of workforce development programs with regional and local economic needs. We are also seeing a willingness and commitment among workforce development providers to collect and share data related to shared outcomes, service strategies, and demographics that would help all involved in the system better understand resident needs and outcomes and identify critical factors that contribute to program success.

With support from JPMorgan Chase & Co., CSW is building on the workforce development system mapping project in Detroit by developing a "workforce data system toolkit" for mayors' offices and other local stakeholders to better understand what data and related resources are available to help answer questions about local and regional labor markets, existing and emerging talent pipelines, and the workforce development system in their cities. We believe there is great need and



opportunity to share workforce development system-related data and information with policymakers, service providers, program participants, employers, and the general public so all involved can help inform and improve access to critical workforce development resources, programs, and services.

To develop this toolkit, CSW has researched data collection and reporting efforts across the country and interviewed city stakeholders for their input on indicators and data relevant to their local workforce development systems. CSW also reviewed what is happening at the regional and local level to improve workforce data access and sharing, similar to what is happening through state level efforts like the [Workforce Data Quality Campaign](#) and [State Workforce and Education Alignment Project](#) (SWEAP). Our research and this toolkit provide a snapshot of the innovative ways other cities and regions around the country are increasing local capacity to access, apply, and share new sources of data and information to inform and support workforce development decision-making.

Several communities, for example, are developing online dashboards to help users find and explore available data and information. Others publish reports or report cards detailing the top jobs and industries for their region, as well as many other relevant indicators. Additionally, we found examples of local providers using the data to better guide program development and help residents make better choices about available jobs, workforce education and training programs, and career pathways that are suitable for them. We hope this toolkit provides a baseline understanding of how to gather and use workforce development system-related data to support your local planning, continuous improvement, and innovation efforts and to achieve strong outcomes for workers, employers, and the communities you serve.

This toolkit is meant to provide a foundation for regions and cities interested in conducting similar workforce development system research and analyses. It is not intended to be a complete guide to collecting, analyzing, and reporting data or to be a roadmap for how to work with policymakers and stakeholders in your region once the data is collected. This toolkit is a starting point for that work.

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HOW TO USE THIS TOOLKIT



Structure

The toolkit is organized around overarching policy questions and by the following topics.

<i>Question Topic</i>	<i>Overarching Questions</i>
Workforce Supply	Who is and is not working in my region? What barriers to obtaining and sustaining employment do residents face?
Workforce Demand	What jobs are available in my region?
Workforce Development System	How is the workforce development system in my region helping people achieve, retain and advance in employment?

Target Audience

This toolkit is for anyone interested in better understanding what data and related resources are available to help answer questions about local and regional labor markets, existing and emerging talent pipelines, and the workforce development system in their cities and regions. It is important to determine who the target audience is for the data and what issues and questions are guiding your focus and attention.

HOW TO USE THIS TOOLKIT

Some examples of who may be interested in this data and why:

- Economic and workforce development agencies use data to identify business attraction and development priorities for regions and cities as well as to better understand the demand for education and training programs that align with existing and emerging jobs and career pathways.
- Educators want to know where to focus their resources for new program development as well as continuous improvement for existing programs that better serve their students and the needs of the business community in their region and state. They also use program data to compare their performance with other institutions as benchmarks for improvement and innovation.
- Employers use data to identify and meet their workforce needs, improve access to jobs, training, and career pathways for residents, and increase cost efficiency, relevancy, and the returns on their investment in education and training programs.
- Policymakers use data for setting policy, allocating funding, and ensuring program accountability toward meeting the employment and skill development needs of constituents, as well as the talent development needs of businesses. They want to fund successful programs and see a good return on the investment.
- Workforce organizations use data for designing and improving programs and services to meet the needs of different populations and businesses. They want to design and deliver programs that help people build skills and move into sustainable employment.
- Researchers want to know what works and why in order to help individuals, often from disadvantaged populations, develop the skills needed to obtain employment and stay engaged in a career and educational pathway.



HOW TO USE THIS TOOLKIT



Defining Your Scope

This toolkit was developed to help regions and stakeholders better understand their labor markets. The Detroit workforce development system mapping reports were the foundation for this toolkit, and input from stakeholders was incorporated to ensure applicability and usability across other labor markets. However, a key part of this process is defining the scope for your local and regional data collection. This includes thinking through the following elements.

Research and Planning Questions

While this toolkit includes research and planning questions applicable in a range of labor markets, each labor market is different and has specific priority issues and policy objectives. Therefore, many of the questions included will not necessarily be a good fit for your purpose. And, similarly, these questions might not be the only questions of interest to or reflective of the priorities of your given region.

Geography

The term “region” is used throughout this toolkit as a placeholder for the geography that is most relevant to you and your stakeholders. In Detroit, the city was the geography of most relevance and used whenever possible for data collection. In some regions, the Metropolitan Statistical Area (MSA), neighborhood, county, etc. may be more important to understand. Understanding what data is available for which level of geography may also affect how you define your region. Due to our focus on regions, in this toolkit, we only included data sources that have sub-state to state-level data. For your purposes, data that is only available at the national level may also be useful.

Demographics

The data elements provided are especially helpful for understanding equity when parsed out by certain demographics, e.g. age, race and ethnicity, gender, etc. This is not always possible depending on the data source. However, when possible, it will be important for users of this toolkit to determine what data is most relevant or needed based on the demographics of your region.

Timeframe

Defining a timeframe for your data collection is also critical. Some stakeholders might find that future projections are of great importance, while others would like to understand historical trends. For Detroit, our report focused on a snapshot at that time. However, you might decide you have a specific range of years you are interested in. Again, this might be affected by what data is available.

Data Sources and Examples

The data sources and examples included in this report are those that are used regularly by CSW, suggested by city stakeholders, or identified in research. There are many data sources available for consumers of this data, and there may be better sources for your needs not listed in this toolkit. Additionally, there may be better report examples for your needs or methodology other than those listed in this toolkit.

As part of the creation of this toolkit, we asked stakeholders which indicators would be of use; in some cases, there are not published examples of or obvious data sources for these indicators. While we included these data elements for consideration when defining data questions and indicators, we were not able to include relevant examples or data sources.

Private data sources are indicated with a (\$) placed behind the name of the data sources. Fee-based data sources can be especially valuable when doing analysis of smaller regions, such as cities or neighborhoods. Depending on the indicator, there may be few free and publicly available data sources that cover these geographies. Fee-based data sources use modeling and other sophisticated data manipulation techniques to provide estimates for small areas, such as zip code areas (however, note that modeling of small areas can be prone to errors). In addition, fee-based data sources are often easier to navigate than publicly available data sources, which can make them more approachable for users with less experience. However, these sources can be quite expensive, so it may be worthwhile to see if there are other organizations in your community that have invested in these resources and would be able to partner with you on your work.

In this toolkit, we have separated most private sources into two categories: Real-Time Labor Market Information Services such as Burning Glass and TalentNeuron that draw from job postings, and Subscription Labor Market Analytic Services such as EMSI or Chmura that draw from a variety of labor market information data sources, such as QCEW and County Business Patterns. Brand names are provided for reference and context, and are not an endorsement of a particular data provider.

General Data Resources

[Vendor Product Review: A Consumer's Guide to Real-Time Labor Market Information, Jobs for the Future](#)

This report details a survey sent to several private data sources and may be of help when considering their usability for your needs.

[Using Real-Time Labor Market Information to Achieve Better Labor Market Results, Lumina Foundation](#)

This report details using real-time labor market information at postsecondary institutions to help guide decision-making and program development.

[Catalogue of Workforce Information Sources: Decision Making Assistance for Workforce and Economic Development, Employment and Training Administration, United States Department of Labor](#)

This environmental scan is intended to help identify, capture, and organize workforce and labor market sources both public and private. It contains helpful descriptions of data sources as well as charts containing information on targeted users and indicators available.

Data Analysis

Many of the data sources listed in this toolkit are publicly available and capable of being analyzed with Microsoft Excel or similar spreadsheet software. In some instances, such as using Public Use Microdata Samples (PUMS) data from the **American Community Survey (ACS)**, additional statistical software is needed, e.g. Statistical Package for the Social Sciences (SPSS), to create new variables. For those interested in creating additional variables using ACS data, but who do not have the software needed, **IPUMS-USA** from the University of Minnesota is a great resource.

For more complicated analyses, including merging multiple data sources or creating variables using data other than ACS, more sophisticated data analysis skills and programs will be needed. For those without the technical skills or capacity on staff to collect and analyze the data defined as necessary for your region, the following general resources might be of use.

- Local universities that may have data groups or departments that will partner with you to collect this data, potentially at a reduced fee if the project is a learning opportunity for their students.
- **State labor market offices.**
- Private sources, such as consulting firms or individual consultants that specialize in data collection and analysis.

For additional data analysis, storage, and ethical considerations, please see Appendix B.

Data Collection

This toolkit includes both primary and secondary data sources. Below is a description with examples for each.

Primary Data

Primary data are data that you collect firsthand. This can be through surveys, key informant interviews, and focus groups, etc. Primary data are critical in helping stakeholders better understand the context of the secondary data collected. For example, once you begin to collect this kind of data, patterns may emerge that help pinpoint the underlying, or “root,” causes of the challenges employers are facing. For example, increasing enrollment in a welding program is not going to address a worker shortage if the real problem is that the welding program is not teaching the skills that employers in an industry or region need. Secondary data are unable to tell you this.

It is important when collecting primary data to take care in developing questions, ensure those providing data or input are informed of the uses of the data, and that data are adequately protected.

Secondary Data

Secondary data are data you collect and analyze that is already available, e.g. from the state Labor Market Information (LMI) department, on a website, or in a report. Usually secondary data refers to quantitative, numerical data, although it can also include non-numerical data, such as the work activities available for specific occupations through the Occupational Information Network (O*NET). When collecting secondary data, it is important to understand the methodology and limitations for the resource and to appropriately cite any data that you use. If secondary data are provided by a partner organization, take care to note what expectations they have for how and if you will share that data.

For more on resources on data collection, please see Appendix B.

Product Development

In Detroit, a full workforce development system mapping report was developed for city stakeholders. Each region will have a different scope based on local needs. A full report might not be needed for some markets, or the resources might not be available to conduct a comprehensive scan. This toolkit was developed for users to make choices about the questions of relevance and the amount of data needed, along with what format is best to present the data. For example, this tool can be used to create a full workforce development system mapping report, a dashboard, a presentation, or any other product of best use for a region. Examples of different reports using these data elements are included in this toolkit.

Similarly, users will need to define an appropriate timeline for updating your products, which will depend on the products they create. Are they being used to track progress? If so, how frequently should (and can, based on data update cycles) users re-collect and report their data?

Another important aspect of whatever medium is used to present the data collected is ensuring that your data tells a story for your region, and the data are presented clearly to support that story. Additional resources are available in the next section and in Appendix B that speak to reporting and presenting data collected.

Additional Resources

Here are some additional resources to consider before starting this work.

[State Workforce and Education Alignment Project \(SWEAP\), National Skills Coalitions](#)

The SWEAP project is helping to develop system-wide information about workforce education and training programs for state policy leaders. The SWEAP project includes many related resources from the four states receiving SWEAP resources.

[Workforce Benchmarking Network, CSW](#)

The Workforce Benchmarking Network provides information to help users benchmark workforce service provider outcomes against those of similar programs across the country. It also assists organizations with using their internal data for continuous improvement and works with communities to develop shared metrics.

[The Workforce Data Quality Campaign \(WDQC\), National Skills Coalition](#)

WDQC promotes federal and state policies that provide stakeholders (students/workers, employers, policymakers, educators/practitioners) with actionable data that is effectively used to assess and improve our nation's education and workforce strategies. They offer many related resources, including:

- **[Data Policy Toolkit](#)**

This toolkit offers information about policies and legislative templates that states can enact to improve data infrastructure and promote data use.

- **[Are People Getting Credentials that Lead to Jobs? Using Dashboards for State Workforce Planning](#)**

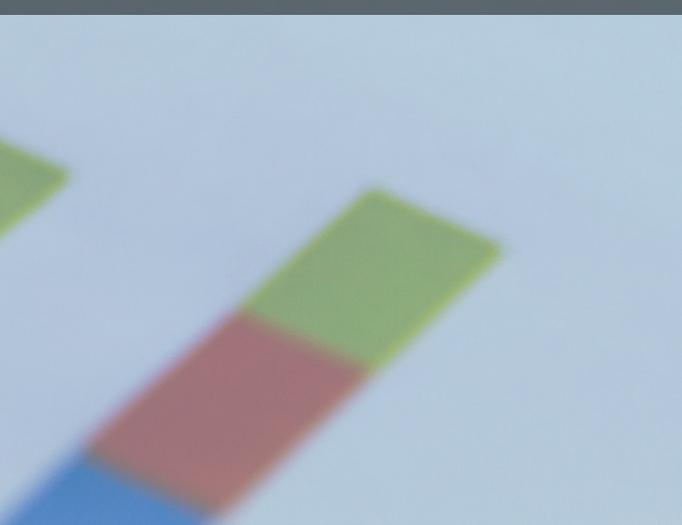
This paper offers advice on using dashboards, including who is using dashboards, determining what to include, collect data, formatting, and how to use dashboards for planning.

- **[How Many More Skills Workers Do We Need? Using Supply and Demand Reports for State Workforce Planning](#)**

This paper provides information on measuring supply and demand and then using that information to close skills and training gaps to meet employer needs.



QUESTIONS AND DATA SOURCES AT A GLANCE



WHO IS AND IS NOT WORKING IN MY REGION?

WHO LIVES IN MY REGION?

- » American Community Survey (U.S. Census Bureau)

WHO IN MY REGION IS PARTICIPATING OR NOT PARTICIPATING IN THE LABOR FORCE?

- » American Community Survey (U.S. Census Bureau)
- » Local Area Unemployment Statistics (Bureau of Labor Statistics)
- » National Equity Atlas
- » State Labor Market Information Office

WHAT IS THE UNEMPLOYMENT RATE IN MY REGION?

- » American Community Survey (U.S. Census Bureau)
- » Local Area Unemployment Statistics (Bureau of Labor Statistics)
- » National Equity Atlas
- » State Labor Market Information Office

WHERE DO PEOPLE IN MY REGION LIVE AND WORK?

- » OnTheMap Application (U.S. Census Bureau)

WHAT ARE THE CHARACTERISTICS OF PEOPLE WHOSE JOBS ARE LOCATED IN MY REGION?

- » Quarterly Workforce Indicators (QWI) Data (U.S. Census Bureau)

WHO IS SEEKING WORKFORCE DEVELOPMENT SERVICES AND IN WHAT WAYS?

- » Data from WIA and WIOA Performance Reports
- » Data from workforce development service providers

WHAT PRIOR WORK EXPERIENCE DO JOB SEEKERS HAVE?

- » Data from workforce development service providers
- » State unemployment claimant data

WHAT SKILL LEVELS DO JOB SEEKERS HAVE?

- » American Community Survey (U.S. Census Bureau)
- » Data from local literacy providers
- » Data from local public schools
- » Data from WIA and WIOA Performance Reports
- » National Center for Education on Statistics (NCES)
- » National Equity Atlas
- » Data from workforce development service providers
- » State Data on Approved Training Programs
- » State Education Data
- » Workforce Insight \$

WHAT ARE THE BARRIERS TO OBTAINING AND SUSTAINING EMPLOYMENT FACED BY RESIDENTS?

WHAT IS THE POVERTY STATUS OF RESIDENTS?

- » American Community Survey (U.S. Census Bureau)
- » Living Wage Calculator, MIT
- » National Equity Atlas
- » Primary data collection

HOW MANY RESIDENTS ARE ACCESSING PUBLIC BENEFITS?

- » American Community Survey (U.S. Census Bureau)
- » Office of Family Assistance (Office of the Administration for Children and Families, Department of Health and Human Services)
- » Data from workforce development service providers
- » Primary data collection
- » State Departments of Public Health
- » State Unemployment Offices

DO RESIDENTS HAVE ACCESS TO TRANSPORTATION?

- » American Community Survey (U.S. Census Bureau)
- » H+T Affordability Index
- » National Equity Atlas
- » Data from workforce development service providers
- » Primary data collection

DO RESIDENTS HAVE ACCESS TO CHILD CARE?

- » Office of Family Assistance (Office of the Administration for Children and Families, Department of Health and Human Services)
- » Primary data collection
- » State Department of Licensing and Regulation
- » Web searches or phone calls with child care centers in the region

WHAT ARE THE RELEVANT HEALTH AND MENTAL HEALTH INDICATORS FOR MY COMMUNITY?

- » American Community Survey (U.S. Census Bureau)
- » County Health Rankings and Roadmaps
- » National Equity Atlas
- » Primary data collection
- » State and local health department data

HOW MANY RESIDENTS OR WORKFORCE DEVELOPMENT SYSTEM PARTICIPANTS HAVE BEEN INVOLVED WITH THE CRIMINAL JUSTICE SYSTEM AND IN WHAT WAYS?

- » Bureau of Justice Statistics
- » Data from workforce development service providers
- » Justice Atlas of Sentencing and Corrections
- » Primary data collection
- » State Department of Corrections

WHAT ARE THE BARRIERS TO OBTAINING AND SUSTAINING EMPLOYMENT FACED BY RESIDENTS?

WHAT DATA ARE AVAILABLE ON CRIME RATES FOR MY REGION?

- » Bureau of Justice statistics
- » County Health Rankings and Roadmaps
- » CrimeMapping
- » FBI Uniform Crime Reporting Program

IS THERE AFFORDABLE HOUSING IN MY REGION? WHAT DATA ARE AVAILABLE ON HOMELESSNESS?

- » American Community Survey (U.S. Census Bureau)
- » H+T Affordability Index
- » HUD Exchange (U.S. Department of Housing and Urban Development)
- » National Equity Atlas
- » Neighborhood Stabilization Program (U.S. Department of Housing and Urban Development)
- » Housing Wage Calculator
- » Primary data collection

DO RESIDENTS HAVE ACCESS TO THE INTERNET IN THEIR HOUSEHOLDS?

- » American Community Survey (U.S. Census Bureau)

WHAT DATA ARE AVAILABLE ON RESIDENTS EXPERIENCING MULTIPLE BARRIERS TO EMPLOYMENT?

- » Data from workforce development service providers
- » Primary data collection



WHAT JOBS ARE AVAILABLE IN MY REGION?

WHAT ARE THE TOP INDUSTRIES FOR EMPLOYMENT IN MY REGION?

- » Current Employment Statistics from the Bureau of Labor Statistics
- » State Labor Market Information Office
- » Subscription Labor Market Analytic Services (\$)
- » Quarterly Census of Employment and Wages (Bureau of Labor Statistics)
- » Quarterly Workforce Indicators Data (U.S. Census Bureau)

WHAT ARE THE TOP OCCUPATIONS FOR EMPLOYMENT IN MY REGION?

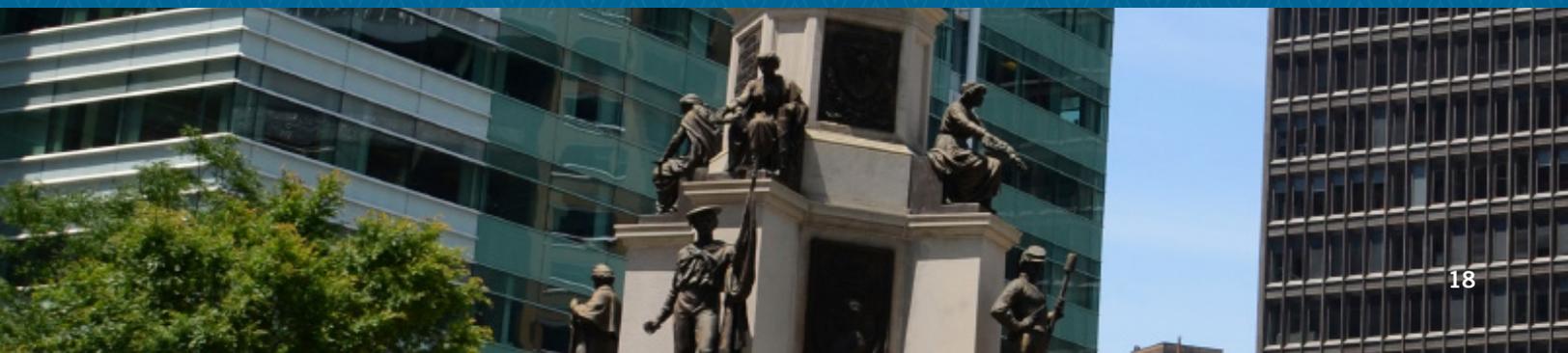
- » Occupational Employment Statistics (Bureau of Labor Statistics)
- » State Labor Market Information Office
- » Subscription Labor Market Analytic Services (\$)

WHAT CAREER PATHWAYS ARE AVAILABLE IN MY REGION?

- » Current Employment Statistics from the Bureau of Labor Statistics
- » Occupational Employment Statistics (OES) from the Bureau of Labor Statistics
- » Occupational Outlook Handbook
- » O*NET
- » “Real-Time” Labor Market Information Services (\$)
- » State Departments’ websites
- » State Labor Market Information Office
- » Subscription Labor Market Analytic Services (\$)
- » Quarterly Census of Employment and Wages (QCEW)
- » Quarterly Workforce Indicators (QWI)
- » Primary data collection
- » Web searches, news articles, and press releases

WHAT SKILLS ARE REQUIRED FOR JOBS IN MY REGION?

- » Occupational Outlook Handbook
- » O*NET
- » “Real-Time” Labor Market Information Services (\$)
- » State Departments’ websites
- » State Departments of Licensing and Regulation
- » Subscription Labor Market Analytic Services (\$)



WHAT JOBS ARE AVAILABLE IN MY REGION?

HOW MANY ESTABLISHMENTS ARE IN MY REGION AND WHAT ARE THEIR SIZES?

- » County Business Patterns and ZIP Code Business Patterns (U.S. Census Bureau)
- » ReferenceUSA (\$)
- » Subscription Labor Market Analytic Services (\$)

TO WHAT EXTENT DO JOBS IN MY REGION PAY FAMILY-SUPPORTING WAGES?

- » Living Wage Calculator, MIT
- » Occupational Employment Statistics (Bureau of Labor Statistics)
- » State Labor Market Information Office
- » Subscription Labor Market Analytic Services (\$)

ARE THE JOBS IN MY REGION PART TIME OR FULL TIME?

- » American Community Survey (U.S. Census Bureau)
- » Occupational Outlook Handbook

WHICH INDUSTRIES ARE BEST IN MY REGION FOR TARGET POPULATIONS?

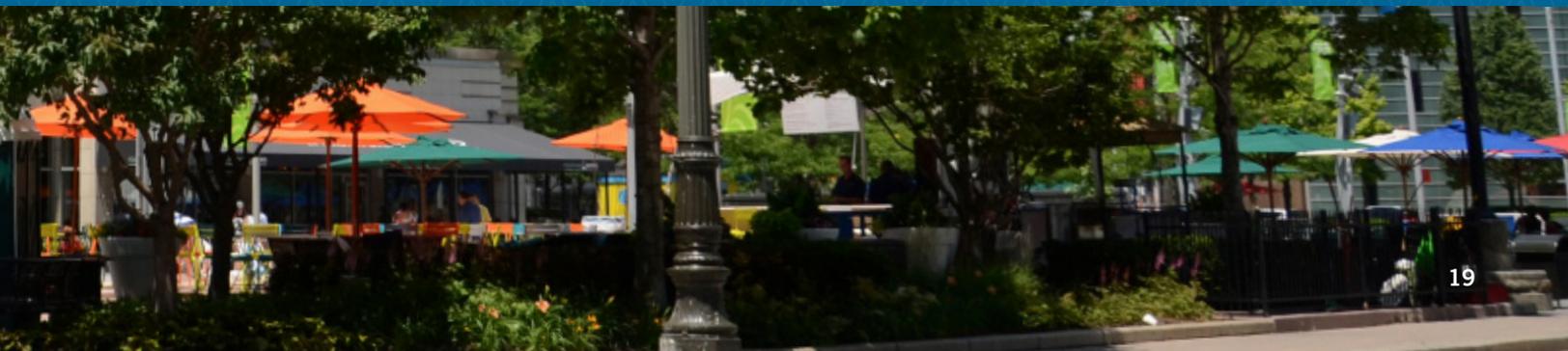
- » Primary data collection

WHAT ARE THE CURRENT JOB OPENINGS IN MY REGION?

- » Local job postings sites
- » “Real-Time” Labor Market Information Services (\$)

WHAT IS KNOWN ABOUT EMPLOYER HIRING POLICIES AND PRACTICES?

- » Primary data collection



HOW IS THE WORKFORCE DEVELOPMENT SYSTEM IN MY REGION HELPING ACHIEVE, RETAIN, AND ADVANCE IN EMPLOYMENT?

WHAT ARE THE ORGANIZATIONS, EDUCATIONAL INSTITUTIONS, AND OTHER ENTITIES IN THE WORKFORCE DEVELOPMENT SYSTEM AND WHERE ARE THEY LOCATED?

- » 2-1-1
- » Integrated Postsecondary Education Data System (National Center for Education Statistics)
- » Data from workforce development service providers
- » Subscription Labor Market Analytic Services (\$)
- » Web searches, marketing materials, annual reports, or reaching out to program staff

WHAT ARE THE FEDERAL, STATE, AND LOCAL POLICIES SUPPORTING WORKFORCE DEVELOPMENT?

- » Primary data collection
- » State Business Incentives Database (\$), Council for Community and Economic Research
- » Web searches of federal, state, and local policies

WHAT DATA EXISTS ON ORGANIZATIONS, EDUCATIONAL INSTITUTIONS, AND ENTITIES, INCLUDING PERFORMANCE AND OUTCOMES DATA?

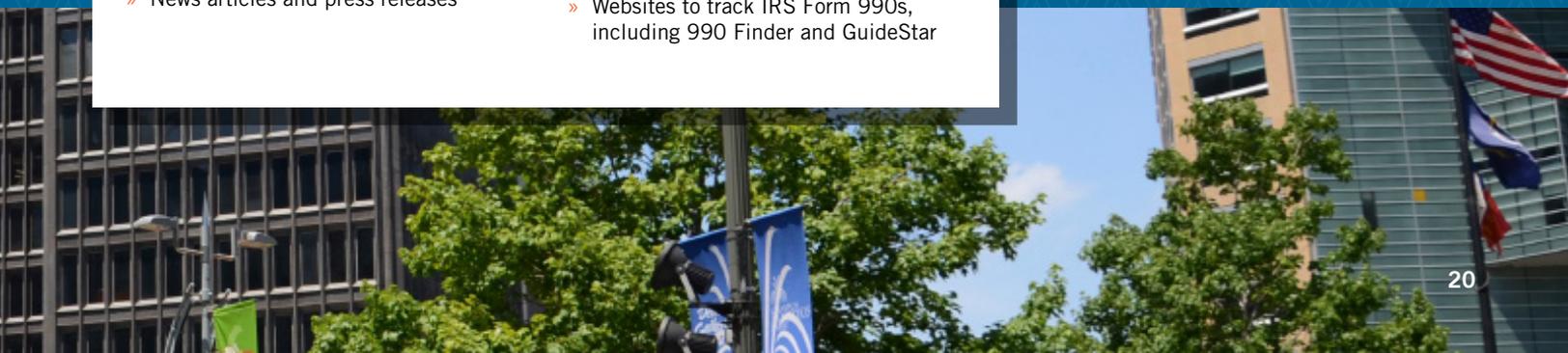
- » Integrated Postsecondary Education Data System (National Center for Education Statistics)
- » Data from WIA and WIOA Performance Reports
- » Data from workforce development service providers
- » Subscription Labor Market Analytic Services (\$)
- » Web searches, marketing materials, annual reports or reaching out to program staff

WHAT WORKFORCE DEVELOPMENT PARTNERSHIPS EXIST IN MY REGION?

- » Primary data collection
- » Web searches, news articles, and press releases

WHAT PUBLIC AND PHILANTHROPIC INVESTMENTS HAVE BEEN MADE IN THE WORKFORCE DEVELOPMENT SYSTEM?

- » Following the Money, Federal Reserve Bank of Atlanta
- » Foundation and funders' collaborative websites
- » News articles and press releases
- » State Economic Development Program Expenditures Database (\$), Council for Community and Economic Research
- » [USAspending.gov](https://www.usaspending.gov)
- » Websites to track IRS Form 990s, including 990 Finder and GuideStar





LABOR MARKET AND WORKFORCE DEVELOPMENT SYSTEM DATA TOOLKIT

WORKFORCE SUPPLY: WHO IS AND IS NOT WORKING IN MY REGION?



Indicators that address this question include:

- Who lives in my region?
- Who in my region is participating or not participating in the labor force?
- What is the unemployment rate in my region?
- Where do people in my region live and work?
- What are the characteristics of people whose jobs are located in my region?
- Who is seeking workforce development services and in what ways?
- What prior work experience do job seekers have?
- What skill levels do job seekers have?

WHO LIVES IN MY REGION?

Understanding the population of the region you are reviewing data for provides additional context to identify the workforce data that will be collected. It also allows for choosing comparison cities that have similar populations. Data to collect include population by age, race and ethnicity, and other demographics; population change; population change by select demographics; and net migration. Population trends provide information on shifts in the demographics of the community that also affect the social and economic conditions of the community and region.

EXAMPLES:

See this page for examples from the [Detroit Workforce Mapping Project](#).

[Community Data Snapshots, Chicago Metropolitan Agency for Planning \(CMAP\)](#): CMAP provides community snapshots for the Chicago region, which include data indicators related to population.

[Workforce Report Card 2015, Gulf Coast Workforce Board](#): The Gulf Coast Workforce Board reports on population growth in their region as well as comparison regions, and its impact on economic wellbeing.

Data sources:

- [American Community Survey](#) data from the U.S. Census Bureau includes a wide variety of population and demographic indicators.



Detroit had 258,807 jobs in the city in 2014, compared to 706,663 residents (of any age), which means that Detroit had jobs for only 37% of its population. In contrast, Atlanta had almost twice as many jobs as residents (183%), Cleveland had closer to a 1:1 ratio (118%), and other out-commuting cities analyzed ranged from 46%-68%.

Source: [Detroit Workforce Development System Mapping Project, Full Report, Corporation for a Skilled Workforce, 2](#)

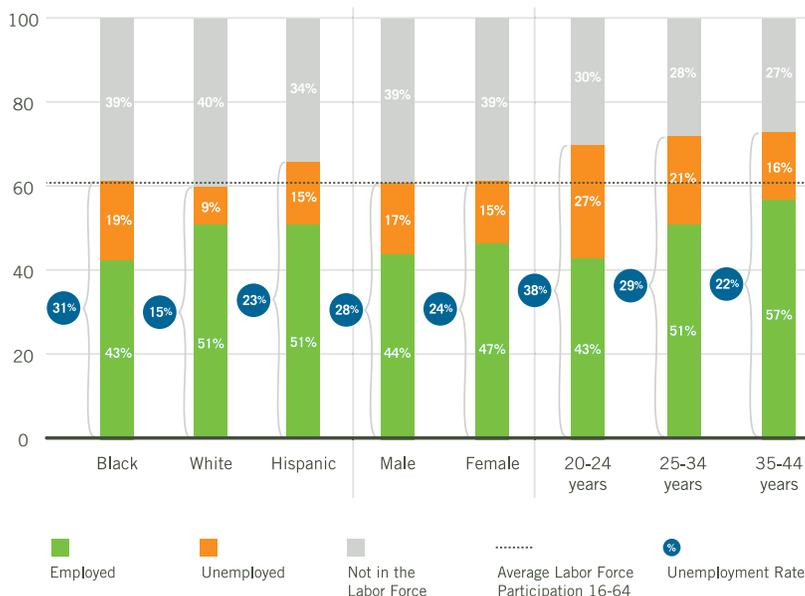
WHO IN MY REGION IS PARTICIPATING OR NOT PARTICIPATING IN THE LABOR FORCE?

One key to understanding workforce data is the concept of labor force participation. According to the American Community Survey, a person is counted in the labor force if they are a) currently employed or b) unemployed, but actively looking for work (defined as having taken some job-seeking action within the last four weeks). The labor force participation rate is the labor force divided by the total number of people eligible to participate in the labor force. This rate provides a picture of how many are working in a given geography. Likening this rate to other comparable regions can help provide a clearer picture of how a given geography is similar or dissimilar to others.

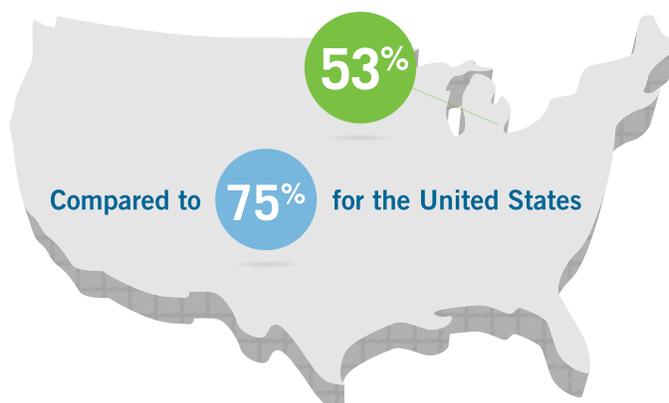
In any population, there are people who are not engaged in the labor force. This group includes people who cannot work (such as the institutionalized, disabled, or sick) as well as those who choose not to work (such as homemakers, full-time students, those living off investments, or retirees). Also included in the not-in-the-labor force pool are those who may wish to work, but are not actively looking for a job.

Understanding your region's workforce requires understanding the characteristics of the populations that are in the labor force and employed, in the labor force and unemployed, and not in the labor force. It is also important to look for variations in labor force participation by differing demographics, which can include race and ethnicity, gender, poverty status, educational attainment, and age, among others. Defining the age of interest to your data collection is important as well (all workers over age 16, ages 16-64, etc.) Demographic breakdowns help speak to possible disparities.

Labor Force Participation and Unemployment (2013)



Labor force participation and unemployment varies based on age, sex, race, and ethnicity. In Detroit, labor force participation is highest from age 20 to 44, with labor force participation rates from 70-73% across this age range.



In 2014, 53% of Detroit residents aged 16 to 64 years (242,000 people) reported working any amount of time over the last 12 months.

Source: [Detroit's Untapped Talent: Jobs and On-Ramps Needed, Corporation for a Skilled Workforce, 2-3](#)

WHO IN MY REGION IS PARTICIPATING OR NOT PARTICIPATING IN THE LABOR FORCE?

EXAMPLES:

See this page and previous page for examples from the **Detroit Workforce Mapping Project**.

One System for One City, New York City: This report provides an overview of New York City's workforce system, including data on labor force participation broken down by demographics of interest.

Data sources:

- **American Community Survey** data from the U.S. Census Bureau provides labor force status broken down by age, race and ethnicity, gender, poverty status, disability status, and educational attainment. Tables to look at include:
 - Work Status in the Past 12 Months
 - Employment (Labor Force) Status
 - Employment Status
 - Educational and Employment Status for the Population 25 to 64 Years
 - Poverty Status in the Past 12 Months of Individuals by Sex by Employment Status
- **The Local Area Unemployment Statistics (LAUS)** program from the Bureau of Labor Statistics provides monthly labor force estimates for regions.
- **National Equity Atlas:** Working Poor is one of the National Equity Atlas' equity indicators. Working poor can be broken down by race and ethnicity, gender, nativity, ancestry, state ranking, and workers by poverty. For each of these variables, the poverty threshold can be adjusted to 100, 150, or 200%.
- **State Labor Market Information Office.**

In 2014, there were 278,000 residents of Detroit aged 16 to 64 years in the labor force, compared to 168,000 residents who were not in the labor force. The overall labor force participation rate for city of Detroit residents who were not in the labor force. The overall labor force participation rate for city of Detroit residents in this age range was 62%, which is much lower than in neighboring Macomb and Oakland counties (76% and 77% respectively) and the state of Michigan (72%). It is also lower than comparison cities such as Cleveland and Atlanta (68% and 72%). To reach the same labor force participation rate as the state of Michigan, 43,300 Detroit residents would need to enter the labor force.

Of the 278,000 residents in the labor force, 60,500 were unemployed (21.7%) for a total of 229,000 individuals who are either unemployed or not participating in the labor force. This is much higher than the surrounding counties (7% in Macomb and 6% in Oakland) and comparison cities (ranging from 6% in Nashville to 19% in Cleveland).

Source: [Detroit's Untapped Talent: Jobs and On-Ramps Needed, Corporation for a Skilled Workforce, 2-3](#)

WHAT IS THE UNEMPLOYMENT RATE IN MY REGION?

The unemployment rate is calculated based on the number of unemployed persons divided by the labor force, and thus does not include people who are not in the labor force. Likening this rate to other comparable regions, including nationwide, state, and other comparison regions, can help provide a clearer picture of how a given geography is similar or dissimilar to others. It is also important to look for variations in unemployment by differing demographics, which can include race and ethnicity, gender, poverty status, educational attainment, and age, among others. Demographic breakdowns help speak to possible disparities.

Long-term unemployment is defined by the Bureau of Labor Statistics as those out of work for 27 weeks or longer. Those that make up this population are the participants most in need of workforce services, as they will likely have lost benefits and/or income, are more likely to become discouraged, will have a more difficult time finding employment, and are more likely to be facing poverty. These data are not generally available for sub-state geography, but if it is possible to acquire, it can provide critical information needed to adapt and cater services to this group for a given region.

EXAMPLES:

See previous pages for examples from the **Detroit Workforce Mapping Project**.

Baltimore Neighborhood Indicators Alliance, Jacob France Institute: Data indicators are provided according to “Vital Signs,” including workforce and economic development. More detailed reports are available as well.

City of Chicago Data Portal: The data portal provides the unemployment rates and other indicators by neighborhood.

Michigan’s Long-Term Unemployed, State of Michigan: This study uses Current Population Survey, Local Area Unemployment Statistics, and Unemployment Insurance Agency data to define and describe the long-term unemployed population in Michigan.

Race, Place, and Jobs: Reducing Unemployment Inequality in America’s Metros, PolicyLink: This brief analyzes racial and spatial inequality in employment across America’s 150 largest metro areas. It provides examples of how to analyze inequities in unemployment for a given place.

Data sources:

- The **Local Area Unemployment Statistics (LAUS)** program from the Bureau of Labor Statistics (BLS) posts monthly unemployment rate data for a variety of geographies, and this is the most timely source of labor market data. However, these data are only available for the entire population. Demographic breakdowns of unemployment can be calculated using **American Community Survey** data, but it is important to note that these data are not point-in-time data. It is the average of data collected over 1, 3, or 5 years, depending on data source and geography. It is useful for comparing demographic groups to one another, but should not be compared directly to the monthly unemployment rate from BLS, because the data collection methodology is different.
- **National Equity Atlas:** Unemployment is one of the National Equity Atlas’ equity indicators. Unemployment can be broken down by race and ethnicity, education, gender, nativity, and ancestry.
- **State Labor Market Information Office.**

WHERE DO PEOPLE IN MY REGION LIVE AND WORK?

Understanding the in-commuting/out-commuting patterns of a region can provide essential insight into mismatches between jobs and workers and inform transportation decision-making. This data includes work locations and job characteristics of the region's residents who work, and home locations and job characteristics of people whose jobs are located in the city. Distance from work data for both groups is also available.

EXAMPLES:

See this page for examples from the [Detroit Workforce Mapping Project](#).

[Fast City, Slow Commute, Center for an Urban Future:](#)

This data brief details commute times for various neighborhoods in New York City.

[Post-Katrina Commuter Patterns, Greater New Orleans Community Data Center:](#)

This report uses commuting patterns to answer questions about where low, moderate, and high-wage residents live and work across the New Orleans metropolitan area.

[Travel Trends: Understanding How Our Region Moves, Chicago Metropolitan Agency for Planning \(CMAP\):](#)

This report provides an overview of how those in the Chicago region travel, including commuting patterns.

Data sources:

- The U.S. Census Bureau's [OntheMap](#) Application allows users to select a geography and then view the work locations for those who live there and the home locations for people who work there, as well the characteristics of residents and workers, including age, earnings, industry distributions, race and ethnicity, educational attainment, and gender.

Due to the dynamics of the Detroit labor market, Detroit has both a tremendous amount of in-commuting and out-commuting labor. In 2013, only 26.5% of jobs within the city limits (including Hamtramck & Highland Park) were held by people who lived within the city limits, which means that 73.5% of jobs were held by people who commute into Detroit to work.

Even while 176,000 people commute into the city for work each day, a large majority of workers who live within the Detroit city limits (64%) commute outside the city to their jobs. Among workers who live in Detroit, 36% of those who leave the city for work earn in the lowest wage bracket (less than \$1,250/month as defined by data source), compared to 23% of those who live and work within the city.

This statistic points to the absence of entry-level job opportunities within the city, and adds a significant transportation burden to those who can least afford it. Forty-eight percent of Detroit-resident workers live at least 10 miles from their workplace.

Out-commuting workers are younger than those who both live and work in Detroit. They are more likely to work in goods-producing industries (construction, manufacturing) and trade/transportation/utilities industries than those who stay within the city. The most common destination cities are Warren, Southfield, Dearborn, Sterling Heights, and Farmington Hills, but workers are dispersed widely throughout the Metropolitan Detroit region.

Source: [Detroit Workforce Development System Mapping Project, Full Report, Corporation for a Skilled Workforce, 12](#)

WHAT ARE THE CHARACTERISTICS OF PEOPLE WHOSE JOBS ARE LOCATED IN MY REGION?



The data tell the story. While only 13% of Detroit residents have a Bachelor's degree, 33% of people working at jobs physically located in Detroit have a Bachelor's degree or higher. Jobs in Detroit held by people with less than a high school diploma represent only 10% of the total jobs, where 20% of the population has not attained that credential. Also, in-commuting workers are more likely to be White. In a city where 80% of the population is Black/African American, 58% of those working in jobs located in Detroit are White. The higher skill level required of jobs located in Detroit also results in higher wages. Over 50% of jobs in Detroit pay more than \$3,333 per month (around \$40K annually), but only 25% of workers living in Detroit (and working in Detroit or anywhere else) work in jobs that pay that amount.

This model of heavy services in suburban areas and professional jobs in the city is not unique to Detroit, but as the preceding section showed, it is particularly unbalanced in Detroit, and made that much worse by the inadequate public transportation system in Metro Detroit.

Source: [Detroit Workforce Development System Mapping Project, Full Report, Corporation for a Skilled Workforce, 19, 2](#)

These data can provide important information about who holds positions within a given geography and, when compared to demographic data, can further speak to disparities.

EXAMPLES:

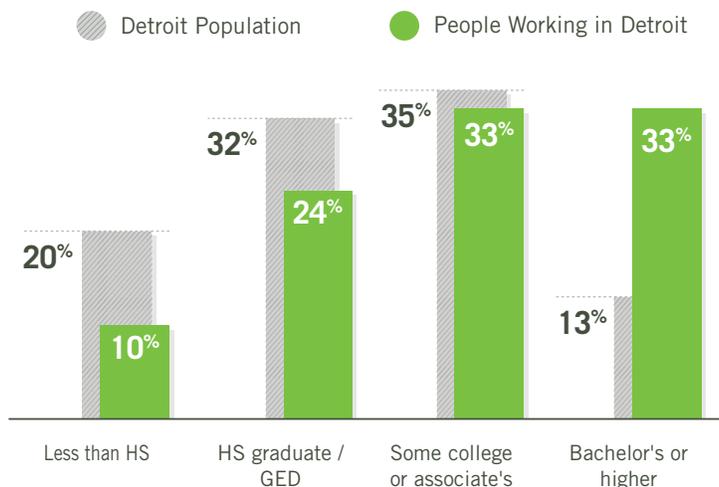
See this page for examples from the [Detroit Workforce Mapping Project](#).

[Post-Katrina Commuter Patterns, Greater New Orleans Community Data Center](#): This report uses commuting patterns to answer questions about where low, moderate, and high-wage residents live and work across the New Orleans metropolitan area.

Data sources:

- [The Quarterly Workforce Indicators \(QWI\)](#) data from the U.S. Census Bureau's Local Employment Dynamics dataset merges state labor market and unemployment program data with Census data and allows you to collect different data on workers for a given location (state, county, MSA, or Workforce Investment Area). You can decide on the x and y axis that you are most interested in, and then a table and chart will appear with desired information.

Education of People Working in Detroit Compared to Detroit Population (2013)



Source: [Detroit's Untapped Talent: Jobs and On-Ramps Needed, Corporation for a Skilled Workforce, 7](#)

WHO IS SEEKING WORKFORCE DEVELOPMENT SERVICES AND IN WHAT WAYS?

Understanding the number of participants entering the workforce development system and at what point, including agencies and programs, helps to better address questions about those not working in a region and the barriers they may be facing. It is beneficial to understand trends in participation over time and across programs as well.

Additionally, understanding the demographics of those entering the workforce development system helps better answer questions about the system, and who is in the most need of services, as well as provides data on potential disparities. It is important to crosswalk this data with data on unemployment demographics to understand if services are reaching those most in need.

EXAMPLES:

See this page for examples from the [Detroit Workforce Mapping Project](#).

[California State Final SWEAP Report, State Workforce and Education Alignment Project, National Skills Coalition:](#)

This report details how California participated in SWEAP, including the development of a dashboard, which includes information on WIOA participants. There are links to the dashboards included in the report.

[One System for One City, New York City:](#) This report provides an overview of New York City's workforce system, including data on workforce system participants.

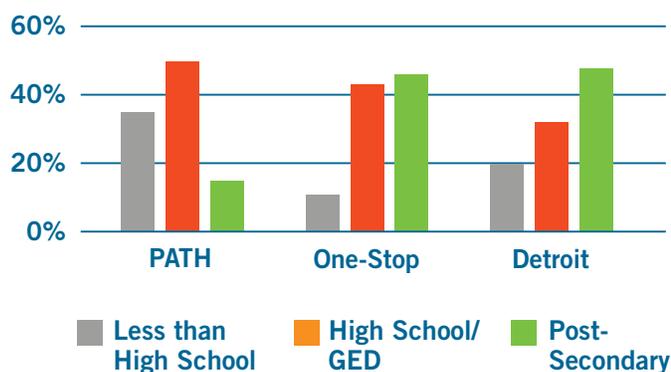
Data sources:

- Data from [workforce development service providers](#).
- [WIA and WIOA Performance Reports](#) includes quarterly or annual national and state level data for public workforce development programs.

From January to November of 2014, the Detroit Employment Solutions Corporation (DESC) served over 30,000 unique individuals. Approximately 24,000 entered through the One-Stop system and of these, 5,000 qualified for intensive services. An additional 6,000 people were part of the PATH (Welfare-to-Work) program, all of whom qualified for intensive services. All PATH participants were unemployed, as were 82% of the One-Stop participants.

The vast majority (greater than 90%) of both groups were Black/African American, and the PATH population was almost exclusively female. Almost three-quarters of PATH participants were below 29 years of age. PATH participants had the lowest educational attainment with only 15% having any postsecondary educational attainment, compared to 46% of the One-Stop population.

Educational Attainment of DESC Participants Compared to Detroit Total



Source: [Detroit Workforce Development System Mapping Project, Full Report, Corporation for a Skilled Workforce, 13](#)

WHAT PRIOR WORK EXPERIENCE DO JOB SEEKERS HAVE?



Understanding the prior work experience for workforce development system participants can help with understanding the skills participants already possess and if these skills are aligned or mismatched with demand for the region. Another way to understand the possible job skills possessed by non-working residents is by looking at what industries workers were in prior to registering for unemployment.

EXAMPLES:

See the next page for examples from the [Detroit Workforce Mapping Project](#).

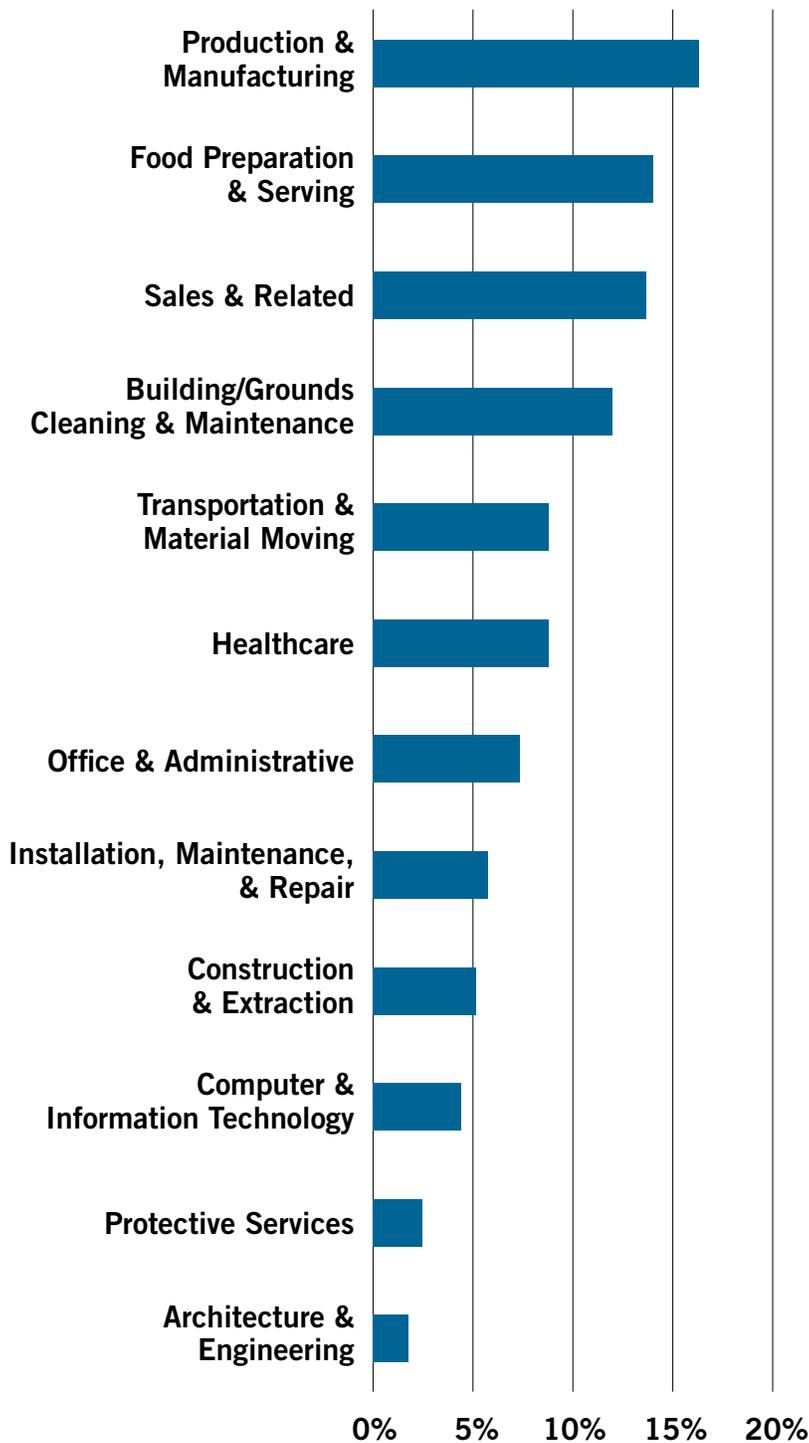
[Virginia Community Profiles, Virginia Employment Commission](#): These community profiles are provided at many geographical area levels and include many data points, including unemployment insurance data for industries and occupations.

Data sources:

- Data from [workforce development service providers](#).
- [State unemployment claimant data](#).

WHAT PRIOR WORK EXPERIENCE DO JOB SEEKERS HAVE?

Prior Job Experience



DESC also provided data compiled from multiple internal data sources regarding the prior work experience of almost 5,200 participants across its programs. Participants were most likely to report prior job experience in production & manufacturing (16.2%) and food preparation & serving (13.9%), and least likely to report prior experience in architecture & engineering (1.8%), protective services (2.4%), and computer & information technology (4.4%).

In 2014, in the city of Detroit, 20,500 workers in the administrative support services industry (NAICS 56) filed unemployment insurance (UI) claims. This accounted for nearly a fifth (18.8%) of UI claims, despite the industry only containing 4.7% of the city's jobs. The most common occupations in this industry are janitors and security guards, which together account for over 30% of all workers in the industry.

Other industries with large numbers of unemployment claims in 2014 included manufacturing (12,000), health care & social assistance (10,800), and accommodation and food services (6,700).

Losses in Detroit that outpace losses (based on claims) in the surrounding areas are for workers in health services and in accommodations and food services. Nearly 10% of UI claims in Detroit are for health services workers. Given the number of health system mergers in 2014, this variance is not surprising. It is also not surprising that there is a higher share of UI claims by food service and accommodations workers in Detroit, because while the industry is growing in the surrounding region (employed people there are demanding more services), the industry is declining in Detroit.

Source: [Detroit Workforce Development System Mapping Project, Full Report, Corporation for a Skilled Workforce, 13-14](#)

WHAT SKILL LEVELS DO JOB SEEKERS HAVE?



This data can include estimates on adults with low literacy levels for the region; amount of time needed to reach proficiency to pass the GED/high school equivalency test or enter job training; grade level equivalents; ability to speak English; and educational and credential attainment.

Understanding data related to the public school system for a region can further speak to the level of preparedness of residents for employment, specifically employment in areas with high demand, and gaps that the workforce development system will potentially need to fill. This data can also provide insight into the labor market information collected. Common indicators tied to this question can include graduation rates, test scores (ACT, SAT, etc.), GED rates, and high school dropout rates. There are many different indicators available depending on the scope of interest.

Educational attainment is listed above as an important demographic and a way to slice the data for differing data elements. Understanding overall educational and credential attainment is important to understanding how prepared residents are for the jobs available in their region.

EXAMPLES:

See the next page for examples from the [Detroit Workforce Mapping Project](#).

[Foundational Skills in the Service Sector, National Skills Coalition](#): This report details the low skills of service sector employees and the need for upskilling.

[School Districts, Central Ohio Compact](#): This dashboard allows users to select a school district and then view outcomes data.

[Virginia Community Profiles, Virginia Employment Commission](#): These community profiles are provided at many geographical area levels and include many data points, including English language skills.

[Workforce Information and Resource Exchange \(WIRE\), Chicago Jobs Council](#): The WIRE provides Illinois and national level indicators that speak to literacy.

[Workforce Report Card 2015, Gulf Coast Workforce Board](#): The Gulf Coast Workforce Board provides an in-depth section committed to providing education data from early childhood through postsecondary and work-based learning.

[Adult Training and Education: Results from the National Household Education Surveys Program of 2016, First Look, National Center for Education Statistics, Department of Education](#): This report details national data on adults' nondegree credentials and work experience programs.

WHAT SKILL LEVELS DO JOB SEEKERS HAVE?

Data sources:

- The **American Community Survey** data from the U.S. Census Bureau includes a number of indicators that speak to educational attainment; language spoken at home; ability to speak English; and limited English speaking households.
- Data from **local literacy service providers**.
- Data from **local public schools**: Schools often provide or are able to provide data on their system and individual schools in their system, including reporting requirements.
- The **National Center for Education Statistics (NCES)** provides data on many educational indicators, including national literacy and on reading and math proficiency. Depending on the data element, you can search for a particular school district. The NCES also provides users data on state-level credential attainment in the “Postsecondary/College” section.
- “Education levels and job requirements” is one of the **National Equity Atlas’** equity indicators. These data are broken down by race and ethnicity and can be further displayed by gender, nativity, and ancestry.
- Data from **workforce development service providers**: Partner organizations may be able to provide data on credential and competency attainment for their participants.
- **State Data on Approved Training Programs**: Some states house training information on websites for job seekers. These sites can contain completion data.
- **State Education Data**: Many states have their education data, which includes proficiency on reading and math, easily accessible. Often, you can search by school district. States often house education data, including information about schools, early childhood, K-12, postsecondary, workforce, and special education.
- **WIA and WIOA Performance Reports** includes quarterly or annual national and state level data for public workforce development programs.
- The **Workforce Insight (\$)** tool from Economic Modeling Systems, Inc. aggregates data from social media sources such as LinkedIn to develop a profile of a region’s workforce.

Adult literacy is a major challenge in Detroit. While data are difficult to come by, estimates on the number of functionally illiterate adults ranges from 1 in 3 in the State of Michigan to 47% for the city of Detroit. Many of the participants served by Reading Works are reading at a sixth-grade level or lower. Due to new higher standards for the GED test, Reading Works indicates that it can take from 12 to 36 months to bring these adults to a level of proficiency needed to pass the GED test or to succeed in many job training programs.

In a sample of 2,611 individuals that have been assessed at the One-Stop, the average reading grade level equivalent was 8.9 and the average math grade level equivalent was 7.0. These scores are below the ninth-grade level that is typically taken to correspond to the basic skills needed for entry-level employment, as well as the tenth-grade level typically needed for community college entry (after which remedial education would still be necessary before entering college-level classes).

Source: [Detroit Workforce Development System Mapping Project, Full Report, Corporation for a Skilled Workforce, 13-14](#)



*LABOR MARKET AND WORKFORCE DEVELOPMENT
SYSTEM DATA TOOLKIT*

WORKFORCE SUPPLY:

***WHAT BARRIERS TO OBTAINING
AND SUSTAINING EMPLOYMENT DO
RESIDENTS FACE?***



Indicators that address this question include:

- What is the poverty status of residents?
- How many residents are accessing public benefits?
- Do residents have access to transportation?
- Do residents have access to child care?
- What are the relevant health and mental health indicators for my community?
- How many residents or workforce development system participants have been involved with the criminal justice system and in what ways?
- What data are available on crime rates for my region?
- Is there affordable housing in my region? What data are available on homelessness?
- Do residents have access to the internet in their households?
- What data are available on residents experiencing multiple barriers to employment?

WHAT IS THE POVERTY STATUS OF RESIDENTS?

Poverty status is important to understand for both those working and not working in a given region as it speaks to the capacity of that region to be successful. Analyzing this data across differing demographics and locations can provide detailed information about who makes up those living in poverty as well as where they are living. Related indicators include economic disparities across demographics; poverty and employment; and how poverty measures up to self-sufficiency in your region (covered later in this toolkit). Additionally, some cities may have alternative poverty measures, such as in the New York City example below.

EXAMPLES:

See below for examples from the [Detroit Workforce Mapping Project](#).

[Center for Economic Opportunity \(CEO\) Poverty Measure 2005-2014, The City of New York:](#)

This report details an alternative poverty measure that better reflects the high cost of living in New York City.

[Persistent Low Wages in New Orleans' Economic Resurgence: Policies for Improving Earnings for the Working Poor, The Data Center:](#)

This report examines New Orleans' working poor by looking at indicators, including prevalence, demographics, locations, and commuting patterns, as well as strategies for improving economic conditions.

[Workforce Report Card 2015, Gulf Coast Workforce Board:](#)

The Gulf Coast Workforce Board reports on the percentage of families living in poverty as well as those who are working and in poverty.

[The Working Poor Families Project:](#) The Working Poor Families Project uses census data to release a number of indicators at the state level that speak to those living below the poverty line.

Data sources:

- Poverty is one of the ACS topics, and data can be found in a number of variables in [American Community Survey data](#) from the U.S. Census Bureau and at varying thresholds.
- The [Living Wage Calculator](#) from MIT calculates the family sustaining wage needed by estimating the typical expenses for a region. The calculator can estimate the wage needed for states, counties, and MSAs.
- Poverty is one of the [National Equity Atlas'](#) equity indicators. Poverty data can be broken down by race and ethnicity, age, nativity, ancestry, and state ranking.
- [Primary data collection](#) from workforce development system stakeholders on poverty reduction barriers.

Even Employed Detroiters Face Poverty

18.5% of all employed residents 16 years and older were in poverty in 2013 (39,000 people)



Even though... **31%** of them (12,000 people) worked full-time, full-year jobs over the last year.

We know that non-working residents face significant poverty. In 2013, in the population aged 20 to 64, 61% of unemployed residents had income under the poverty line, as did 52% of residents not in the labor force. But getting a job is often not enough to move out of poverty, especially since those who work are less likely to work full-time, full-year jobs compared to national averages. Working Detroiters still need access to support services that can help them reach self-sufficiency.

Source: [Detroit's Untapped Talent: Jobs and On-Ramps Needed, Corporation for a Skilled Workforce, 12](#)

HOW MANY RESIDENTS ARE ACCESSING PUBLIC BENEFITS?

Public benefits include state welfare programs, Food Stamps/SNAP, TANF, WIC, children receiving free or subsidized lunches, and health care programs such as Medicaid. This information can help inform the level of need in your region, gaps in the system, and barriers that potential job seekers face. Note that many of these programs also offer opportunities for participants to access the workforce development system.

EXAMPLES:

See below for examples from the [Detroit Workforce Mapping Project](#).

[Community Report Card 2016-2017, The Calhoun County Coordinating Council](#): This report outlines indicators related to economic and self-sufficiency, healthy family and social relationships, and access to community resources. This report also covers access to public benefits.

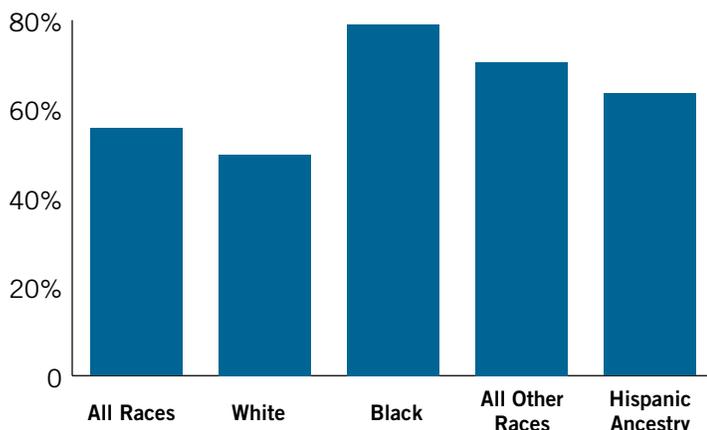
[State Fact Sheets: Trends in State TANF-to-Poverty Ratios, Center on Budget and Policy Priorities](#): These facts sheets allow users to view states' TANF enrollments and spending.

[Understanding the Dynamics of Disconnection from Employment and Assistance, OPRE & Urban InSTITUTE](#): This report details a study of women who were parents, unemployed, and not receiving TANF during unemployment.

Data sources:

- The [American Community Survey](#) data from the U.S. Census Bureau includes a number of indicators pertaining to public benefits. These data can be found under the variable “Public Assistance Income or Food Stamps/SNAP in the Past 12 Months for Households,” “Comparative Economic Characteristics,” “Public Assistance Income in the Past 12 Months for Households,” as well as a number variables that speak to health insurance coverage and characteristics of those uninsured or receiving benefits.
- [Office of Family Assistance](#) from the Office of the Administration for Children and Families provides state-level data on TANF funding.
- Data from [workforce development service providers](#): Partner organizations may be able to provide data on participant service utilization.
- [Primary data collection](#) from workforce development system stakeholders on use of public benefits.
- Some [State Departments of Public Health](#) or [State Unemployment Offices](#) may provide data on public benefits.

Percent of Deliveries Paid By Medicaid by Race of Mother, Calhoun County: 2015



Source: [Community Report Card 2016-2017, The Coordinating Council of Calhoun County, 46](#)

DO RESIDENTS HAVE ACCESS TO TRANSPORTATION?

Access to transportation is crucial to residents' ability to succeed in work and education. Data points include possession of a driver's license, access to a car, and availability of public transportation. When combined with data on the locations of jobs in a given region, this indicator speaks to barriers potentially facing residents. Understanding who has and does not have access to a vehicle can also speak to potential disparities in the region. Other related indicators can include transit time and miles travelled.

EXAMPLES:

See below for examples from the [Detroit Workforce Mapping Project](#).

[Barriers to Employment Opportunities in the Baltimore Region, Opportunity Collaborative:](#)

This report reviews barriers facing job seekers and includes survey findings that speak to residents who face barriers related to a lack of a driver's license.

[Fast City, Slow Commute, Center for an Urban](#)

[Future:](#) This data brief details commuting in New York City.

[Workforce Report Card 2015, Gulf Coast Workforce](#)

[Board:](#) The Gulf Coast Workforce Board includes a section of their report on quality of life, which speaks to mean travel time to work and usage of public transportation.

[Where the Jobs Are: Employer Access to Labor by Transit, Brookings:](#)

This report provides an analysis of transit in metro areas and its impact on labor.

Data sources:

- The [American Community Survey](#) data from the U.S. Census Bureau includes data that can be found under the variable "Means of Transportation to Work by Vehicles Available."
- The [H+T Affordability Index](#) from the Center for Neighborhood Technology provides data on the affordability of housing and transportation for a region, which includes fact sheets for regions as well.
- Car Access is one of the [National Equity Atlas'](#) equity indicators by providing the percentage of households without access to a vehicle. Car Access is broken down by race and ethnicity.
- Data from [workforce development service providers](#): Partner organizations may be able to provide data on access to transportation or possession of a driver's license.
- [Primary data collection](#) from workforce development system stakeholders on transportation barriers.

The lack of public transportation makes it hard for low-skilled Detroit residents to find and keep jobs.

- Among workers who live in Detroit, 37% of those who leave the city for work earn in the lowest wage bracket.
- The geographic footprint of Detroit and the location of many of the jobs make it difficult for Detroit residents without reliable public or private transportation to get to work.

Source: [Detroit Workforce System Mapping Project, Full Report, Corporation for a Skilled Workforce, 43](#)

DO RESIDENTS HAVE ACCESS TO CHILD CARE?



Child care is an obstacle to employment and training for many. Understanding your region's child care costs, as well as the availability and locations of affordable child care centers, is important in understanding and working on the barriers facing residents.

An additional data point could include researching TANF funding and other public assistance funding for child care in your state and region.

EXAMPLES:

Disparate Access: Head Start and CCDGB Data by Race and Ethnicity, CLASP: This report analyzes state-level data by race and ethnicity and differential access to Head Start preschool, Early Head Start (EHS), and Child Care and Development Block Grant (CCDBG)-funded child care.

Chicago Early Learning, Smart Chicago Collaborative: This is a tool to locate early learning centers in a region, not an example of a product reporting on affordable childcare.

Great Start to Quality, Early Childhood Investment Corporation: This is a tool to locate early learning centers in a region and compare quality, not an example of a product reporting on affordable childcare.

How Does Access to Childcare Affect High School Completion in Philadelphia's Multiple Pathways to Graduation Programs?, Public Citizens for Children and Youth: This report discusses barriers and solutions to accessing child care for those seeking to complete their high school education.

State Temporary Assistance for Needy Families Programs do not Provide Adequate Safety Net for Poor Families, Center on Budget and Policy Priorities: This map allows users to view states' TANF spending.

Data sources:

- **Office of Family Assistance** from the Office of the Administration for Children and Families provides state-level data on TANF funding.
- **Primary data collection** from workforce development system stakeholders on the availability, costs, and barriers for accessing child care for workforce participants.
- **State Departments of Licensing and Regulation** may provide data on licensed child care providers.
- **Web searches or phone calls with child care centers in the region:** Research locations, prices, and waitlist time of centers in the region.

WHAT ARE THE RELEVANT HEALTH AND MENTAL HEALTH INDICATORS FOR MY COMMUNITY?

Health indicators were a suggested data element by those interviewed, noting the importance in understanding the health of those you are serving and how it affects employment. Additionally, understanding health inequity can be helpful in understanding inequities in unemployment, especially as it relates to particular communities. Health and mental health indicators can include air pollution, diabetes, obesity, disability status, infant mortality, substance use, depression, and anxiety, as well as many other indicators that are relevant for your region.

EXAMPLES:

Baltimore Neighborhood Indicators Alliance, Jacob France Institute: The Baltimore Neighborhood Indicators Alliance provides data on Baltimore City overall as well as by neighborhoods and Community Statistical Areas in the city. Data indicators are provided according to “Vital Signs,” including children and family health. More detailed reports are available as well.

Community Report Card 2016-2017, The Calhoun County Coordinating Council: This report outlines indicators related to economic and self-sufficiency, healthy family and social relationships, and access to community resources. This report also covers many relevant health indicators for Calhoun County.

Community Dashboard, Impact Dupage: This community dashboard provides a number of indicators pertaining to health and mental health for the county and select cities, zipcodes, and census tracts. They also present information on disparities across the indicators.

Data sources:

- The **American Community Survey** data from the U.S. Census Bureau provides a number of indicators that speak to disability and can be broken down by a number of demographics.
- The **County Health Rankings and Roadmaps** website allows users to search for their county, and they are able to view many different health indicators.
- The **National Equity Atlas** provides data on a number of health indicators, including air pollution, obesity, asthma, and adults with diabetes. Select indicators can be broken down by race and ethnicity, source, state ranking, and poverty.
- **Primary data collection** from workforce development system stakeholders on health and mental health barriers.
- **State and local health department data.**

Hospitalization Rate Per 10,000 Population Due to Diabetes, By Age and Gender, Calhoun County: 2014^{i,iii}

		Number	Percent Distribution
Gender	Male	186	54.1%
	Female	158	54.9%
		Rate Per 10,000	
Age	Under 18 Years	27	7.3
	18-44 Years	105	30.9
	45-64 Years	100	27.3
	65+ Years	71	37.0

Preventable Hospitalizations Due to Diabetes, Calhoun County: 2014^{i,iii}

		Number	Percent Distribution
Gender	Male	146	52.1%
	Female	134	47.9%
		Rate Per 10,000	
Age	Under 18 Years	23	7.3
	18-44 Years	117	26.3
	45-64 Years	73	19.7
	65+ Years	67	30.3

Source: [Community Report Card 2016-2017, The Coordinating Council of Calhoun County, 41](#)

HOW MANY RESIDENTS OR WORKFORCE DEVELOPMENT SYSTEM PARTICIPANTS HAVE BEEN INVOLVED WITH THE CRIMINAL JUSTICE SYSTEM AND IN WHAT WAYS?

Understanding the presence of a criminal background, including data on felonies, misdemeanors, convictions, and non-convictions provides important information on the ability of residents to access certain careers. Many employers will not hire those with a criminal background or may only hire those with a non-conviction. Collecting data on this population will be helpful in guiding and directing workforce services to better meet the needs of this group. If possible, linking local corrections data with workforce development data would allow for better understanding of the criminal justice barriers facing participants.

Recidivism rates for your region may be a point of interest as well.

EXAMPLES:

[Architecture and Justice, Spatial Information Design Lab, Columbia University Graduate School of Architecture, Planning, and Preservation:](#) This report details the use of criminal justice system data to create maps of “million dollar blocks.”

[Barriers to Employment Opportunities in the Baltimore Region, Opportunity Collaborative:](#) This report reviews barriers faced by job seekers and includes survey findings that speak to residents who face barriers related to criminal records.

[Neighborhoods and Re-Entry in Detroit: Mapping Prison Data, Data Driven Detroit:](#) This report proposes a new framework for viewing criminal justice information at the neighborhood level in Detroit.

Data sources:

- The **Bureau of Justice Statistics** website allows you to search some state and national data corrections data. County level data are available for the juvenile justice system.
- The **Justice Atlas of Sentencing and Corrections** is an online tool for mapping the residential distribution of people involved in the criminal justice system. It uses aggregated address data to map the flow of people being removed to prison or re-entering communities from prison, and the standing population concentrations of people under parole or probation supervision.
- Data from **workforce development service providers**.
- **Primary data collection** from workforce development system stakeholders in your region can speak to the barriers facing those with criminal records in accessing employment. Primary data collection from prisons and jails in your region on what workforce development and educational resources are available to those incarcerated and their efforts to overcome employment barriers.
- **State Department of Corrections**.

WHAT DATA ARE AVAILABLE ON CRIME RATES FOR MY REGION?

Crime rate data can be helpful to understand the barriers facing residents and their quality of life. Could crime in residential areas be affecting access to work or education? In some regions, schools partner with local public safety departments to better understand barriers facing students and “opportunity youth.” Data on crime rates is also of interest to potential employers.

EXAMPLES:

Community Report Card 2016-2017, The Calhoun County Coordinating Council: This report outlines indicators related to economic and self-sufficiency, healthy family and social relationships, and access to community resources. This report also covers crime rates, including domestic violence, sexual assault, crime, and juvenile crime.

Workforce Report Card 2015, Gulf Coast Workforce Board: The Gulf Coast Workforce Board reports on crime prevalence for the Houston region, including violent crime per 100,000 inhabitants and property crime per 100,000 inhabitants.

Data sources:

- The **Bureau of Justice Statistics** Arrest Data Analysis Tool allows users to search for arrests based on a specific agency.
- The **County Health Rankings and Roadmaps** site allows users to search for their county, and they are able to view the violent crimes for that community.
- **CrimeMapping:** This data will only appear if a local agency has subscribed to this service. If it does, users can select the area they are interested in as well as the specific crimes and generate maps and reports that speak to the crimes reported in the selected time frame.
- The FBI **Uniform Crime Reporting Program (UCR)** website has a data tool that allows you to gather data on multiple crime indicators by nation, state, and local region.

With this year’s Report Card we introduce two new indicators that seek to further gauge the quality of life across regions. **Violent crime per 100,000 residents** was highest in the Gulf Coast region at 559 followed by Miami (539) and San Antonio (460). Denver had the lowest rate at 315 incidents per 100,000 residents. **Property crime per 100,000 residents** was highest in San Antonio at 4,415 followed by Miami (3,691) and the Gulf Coast region (3,489). The lowest rate was found in San Diego with 2,192 incidents per 100,000 residents.

IS THERE AFFORDABLE HOUSING IN MY REGION? WHAT DATA ARE AVAILABLE ON HOMELESSNESS?

It is generally thought that if households have to spend more than 30% of their income to pay for housing, they must make a difficult choice between having adequate shelter and satisfying other critical needs. Understanding the percentage of renters and homeowners that pay over 30% of their income on housing can be helpful information in understanding quality of life and also commuting patterns.

A related measure of interest in many regions is what data is available on residents experiencing homelessness.

Other related data points include foreclosure rates, housing and tenure, housing type, housing size, housing age, and renters' rights.

EXAMPLES:

[The 2017 Annual Homeless Assessment Report \(AHAR\) to Congress, The U.S. Department of Housing and Urban Development:](#) This report covers the Point-in-Time (PIT) estimates conducted each year.

[Out of Reach 2017, National Low Income Housing Coalition:](#) This report examines the affordability gap between the cost of housing and the wages of millions of renters. For states, you can view the wages needed to afford housing as well as how many hours would need to be worked at minimum wage to afford rent.

[National Alliance to End Homelessness:](#) This website provides reports and resources on homelessness, including "The State of Homelessness in America" and the "Homeless System Evaluator Tool."

[Workforce Report Card 2015, Gulf Coast Workforce Board:](#) The Gulf Coast Workforce Board includes a section of their report on quality of life, including median home values, appreciation rates, percentage of housing units with monthly home ownership costs greater than 30%, ratio of home value to annual income, and rate of homeownership versus renting.

Data sources:

- The **American Community Survey** data from the U.S. Census Bureau provides a number of indicators that speak to housing, including "comparative housing characteristics," which can be broken down by a number of demographics.
- The **H+T Affordability Index** from the Center for Neighborhood Technology provides data on the affordability of housing and transportation for a region, which includes fact sheets for regions as well.
- The **HUD Exchange** provides data from the Department of Housing and Urban Development, including Point in Time (PIT) estimates of homelessness at both the state level, as well as by Continuums of Care (CoC), which are local planning bodies. It also provides administrative data about the programs serving the homeless in communities.
- The **National Equity Atlas** provides data on housing burden, which can be broken down by race/ethnicity and state ranking.
- **Neighborhood Stabilization Program Data** from the U.S. Department of Housing and Urban Development includes neighborhood level foreclosure data.
- The **Housing Wage Calculator** from the National Low Income Housing Coalition can be used to determine how much you need to earn to afford a particular rent in your state.
- **Primary data collection** from workforce development system stakeholders on housing barriers.

DO RESIDENTS HAVE ACCESS TO THE INTERNET IN THEIR HOUSEHOLDS?

Lack of internet access is a significant barrier to employment. Understanding household internet access for your region and in particular for smaller geographies such as neighborhoods can illuminate if residents in your region are unable to access current employment opportunities, provide additional context on the economic structure of a household, and uncover other barriers potentially facing households that lack internet access. Additionally, cross-walking this indicator with which employment or training programs require online applications can speak to recruitment or obstacles to training and connecting unemployed residents to employment opportunities.

Other related characteristics include the availability of computers and phone service.

EXAMPLES:

[Home Broadband 2015: The share of Americans with broadband at home has plateaued, and more rely on their smartphones for online access, PEW Research Center:](#) This report focuses on digital access and the digital divide, as well as discusses barriers facing those without broadband access at home.

[Searching for Work in the Digital Era, PEW Research Center:](#) This report details how important digital access is for employment as well as the lack of confidence some Americans have in their use of digital job searching tools.

[The Top 25 Worst Connected U.S. Cities, 2015, National Digital Inclusion Alliance:](#) This release details the worst connected cities in the U.S. by household access to broadband subscriptions using ACS data.

Data sources:

- The [American Community Survey](#) data from the U.S. Census Bureau provides a number of indicators that speak to housing, including “internet access,” “computer availability,” and “telephone service,” which can be broken down by a number of demographics, including employment.

Percentage of households without fixed broadband subscriptions 185 cities with 50,000 or more households

Source: 2015 American Community Survey 1-Year Estimates

	Total Households	No fixed broadband subscriptions		Worst-connected rank
		Number of households	Percent of households	
Median, all 185 cities			28.6%	
Top 25:				
Detroit, MI	255,580	138,006	54.0%	1
Brownsville, TX	52,309	27,316	52.2%	2
Cleveland, OH	167,667	81,024	48.3%	3
Memphis, TN	250,324	116,861	46.7%	4
Shreveport, LA	75,823	34,424	45.4%	5
Laredo, TX	69,026	31,315	45.4%	6
Birmingham, AL	93,467	42,011	44.9%	7
Jackson, MS	62,092	27,105	43.7%	8
Miami, FL	171,720	74,022	43.1%	9
Dayton, OH	56,466	24,200	42.9%	10
Greensboro, NC	115,301	49,352	42.8%	11
Rochester, NY	84,946	36,243	42.7%	12
Hialeah, FL	71,124	30,265	42.6%	13
New Orleans, LA	156,591	66,432	42.4%	14
Baltimore, MD	238,400	100,790	42.3%	15
Buffalo, NY	109,961	46,342	42.1%	16
St. Louis, MO	141,312	59,536	42.1%	17
Pasadena, TX	51,820	21,823	42.1%	18
Houston, TX	849,974	354,645	41.7%	19
Augusta-Richmond County, GA	69,567	28,986	41.7%	20
El Paso, TX	222,557	92,212	41.4%	21
Savannah, GA	52,331	21,565	41.2%	22
Milwaukee, WI	232,104	95,356	41.1%	23
Corpus Christi, TX	117,609	48,206	41.0%	24
Macon-Bibb County, GA	59,683	24,105	40.4%	25

Source: [The Top 25 Worst Connected U.S. Cities, 2015, National Digital Inclusion Alliance](#)

WHAT DATA ARE AVAILABLE ON RESIDENTS EXPERIENCING MULTIPLE BARRIERS TO EMPLOYMENT?



Many of those entering the workforce development system are facing significant barriers to employment. However, when resources are thin, understanding the most in need of the group and how to best serve them and in what order can be essential. Therefore, understanding how many participants need assistance in more than one area and which areas are the highest priority can help guide and direct services.

EXAMPLES:

[Barriers to Employment Opportunities in the Baltimore Region, Opportunity Collaborative:](#)

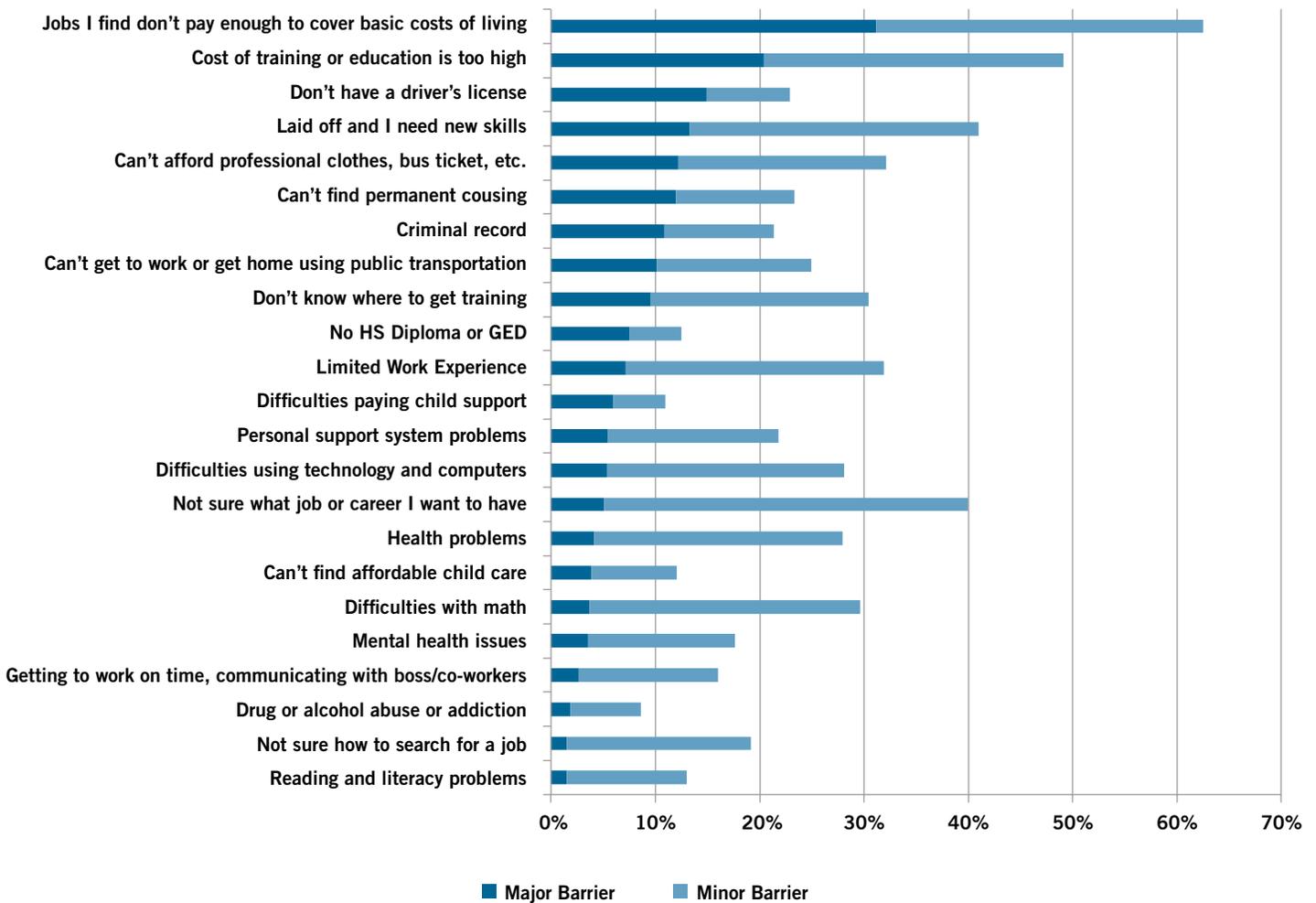
This report reviews barriers facing job seekers and includes survey findings that speak to residents who face multiple barriers to employment.

Data sources:

- Data from [workforce development service providers](#).
- [Primary data collection](#), which can include interviews, focus groups, and surveys with workforce development system stakeholders that can speak to the difficulties facing residents who experience multiple barriers and which barriers to address in providing services.

WHAT DATA ARE AVAILABLE ON RESIDENTS EXPERIENCING MULTIPLE BARRIERS TO EMPLOYMENT?

Figure 2 Ranking of Barriers to Employment Opportunity – Percentage of Job Seekers Encountering Barriers and Percentage of Workers Who Rate Each Barrier as a “Major” Barrier (Score of 4 or 5 on a 5-point scale), Baltimore Region



Source: Survey of Job Seekers in the Baltimore Region, 2013, n=1037. Responses are weighted by demographic and geographic variables from the American Community Survey 5-year Estimates 2012.

The barriers that keep many of Baltimore’s residents from gaining access to family-supporting careers are interconnected and complex. Workforce development managers are quick to point out that people who come through their doors usually face multiple barriers to employment and a survey of over 1,000 job seekers in the Baltimore region found that the majority (82%) of job seekers face at least three barriers to employment and more than half of job seekers (55%) report facing six or more barriers (Figure 2).



*LABOR MARKET AND WORKFORCE DEVELOPMENT
SYSTEM DATA TOOLKIT*

***WORKFORCE DEMAND:
WHAT JOBS ARE AVAILABLE IN
MY REGION?***

Indicators that address this question include:

- What are the top industries for employment in my region?
- What are the top occupations for employment in my region?
- What career pathways are available in my region?
- What skills are required for jobs in my region?
- How many establishments are in my region and what are their sizes?
- To what extent do jobs in my region pay family-supporting wages?
- Are the jobs in my region part time or full time?
- Which industries are best in my region for target populations?
- What are the current job openings in my region?
- What is known about employer hiring policies and practices?

WHAT ARE THE TOP INDUSTRIES FOR EMPLOYMENT IN MY REGION?



The industry mix for a region paints an important picture of employment demand. This data element speaks to the industries with the most openings or jobs, including the types of jobs available for an industry, average earnings, the training needed, historical industry data, and the likelihood of employment in a given area to grow or decline in the future. These trends are important in planning. It is equally important to cross-walk this information with the skills available among residents in a given area. Comparing these data points to those in comparison cities can be helpful as well.

Demographic data on workers by industry can also provide important insights. Worker age data informs the potential for retirees and the future need for new entrants. Data such as race and ethnicity, gender, and educational attainment can inform strategies.

Additionally, the workforce development system may be using a sector approach or have targeted industries of interest, which may not be the industries with the most employment but that are ideal for employment for residents in the region for other reasons.

EXAMPLES:

See next page for examples from the [Detroit Workforce Mapping Project](#).

[Driving Opportunity in Detroit: Building a Middle-Skill Workforce to Strengthen Economic Recovery and Expand the Middle Class, New Skills at Work, JPMorgan Chase & CO.](#): While this report focuses on middle skills, it does provide an overview of industries with a growing need for employment in the region.

Data sources:

- [Current Employment Statistics from the Bureau of Labor Statistics](#) allows you to look up industry estimates on employment, hours, and earnings for states, MSAs, and Metropolitan Divisions.
- [State Labor Market Information Office](#): State labor market offices can provide data on industry employment, projections, and wages.
- Some [Subscription Labor Market Analytic Services \(\\$\)](#) allow you to research industries for a given geography. Industry data provided includes employment, location quotients, historic and projected growths, and demographics, among others.
- The [Quarterly Census of Employment and Wages \(QCEW\)](#) from the Bureau of Labor Statistics allows you to look up information for select MSAs on employment, location quotient, and wages.
- The [Quarterly Workforce Indicators \(QWI\)](#) data from the U.S. Census Bureau's Local Employment Dynamics includes demographic data by industry.

WHAT ARE THE TOP INDUSTRIES FOR EMPLOYMENT IN MY REGION?

	Detroit				Tri-County without Detroit			
	2014 Jobs	2009-2014 % Change	2011-2014 % Change	% of Total Jobs	2014 Jobs	2009-2014 % Change	2011-2014 % Change	% of Total Jobs
Government	60,333	-19.4%	-10.4%	23%	111,268	-15.5%	-6.8%	7%
Retail, Hospitality, Arts & Recreation	38,047	-2.7%	-2.4%	15%	315,281	3.9%	2.8%	20%
Health Care	37,297	5.3%	1.6%	14%	188,398	2.6%	0.2%	12%
Manufacturing	19,659	20.7%	8.9%	8%	191,550	18.6%	10.5%	12%
Transportation & Warehousing	15,936	12.3%	1.8%	6%	40,278	18.5%	13.4%	3%
Professional, Scientific and Technical Services	14,472	2.2%	2.0%	6%	174,037	22.6%	14.8%	11%
Construction	6,367	0.7%	0.2%	2%	61,174	-0.6%	1.2%	4%
Office/ Administrative occupations (all industries)	15,040	-9.6%	-5.6%	6%	77,490	4.0%	2.3%	5%
IT occupations (all industries)	6,101	2.7%	1.8%	2%	50,481	15.9%	9.0%	3%

We know that non-working residents face significant poverty. In 2013, in the population aged 20 to 64, 61% of unemployed residents had income under the poverty line, as did 52% of residents not in the labor force. But getting a job is often not enough to move out of poverty, especially since those who work are less likely to work full-time, full-year jobs compared to national averages. Working Detroiters still need access to support services that can help them reach self-sufficiency.

Source: [Detroit Workforce System Mapping Project, Full Report, Corporation for a Skilled Workforce, 20](#)

WHAT ARE THE TOP OCCUPATIONS FOR EMPLOYMENT IN MY REGION?

The mix of occupations for a geography shows demand for a region. This data can include the types of jobs available, average earnings, historical occupation data, and the likelihood of employment in a given area to grow or decline in the future. Staffing patterns can be used to identify the mix of occupations within a particular industry.

Data on openings and separations can be used to identify anticipated need for new labor market entrants. Separations is a measure provided on an occupation by occupation basis and considers overall occupational growth and the need for new workers due to retirement, those switching occupations, or leaving the labor force. It is not a measure of how many individual job openings there are likely to be (job postings data), but how many new workers will be needed to fill demand in the occupation.

In October 2017, the Bureau of Labor Statistics stopped using their replacement methodology and began using the separations methodology, which is not only more reliable but also more reflective of younger workers and those in non-traditional career pathways. The replacements methodology only accounted for those leaving an occupation due to retirement.

EXAMPLES:

[Labor & Economy Dashboard, Workforce Intelligence Network \(WIN\)](#): WIN's dashboard allows users to view the top jobs quarterly for a region overall and by specific sectors.

[MSP Sector Analysis Manufacturing Surplus and Gap Overview, Real Time Talent](#): This example details demand, occupation, and skill data and provides an example of how to format this type of data for a variety of stakeholders. This examples also details analysis on employment gaps in the sector.

[The NYC Labor Market Information Service, The City of New York \(CUNY\)](#): This website offers many different career and occupation-related products.

[State of the Louisville Regional Labor Market, KentuckianaWorks](#): This labor market overview presents the top 25 high demand occupations that pay above a family-supporting wage. These data are presented by job postings, growth, and possible retirements.

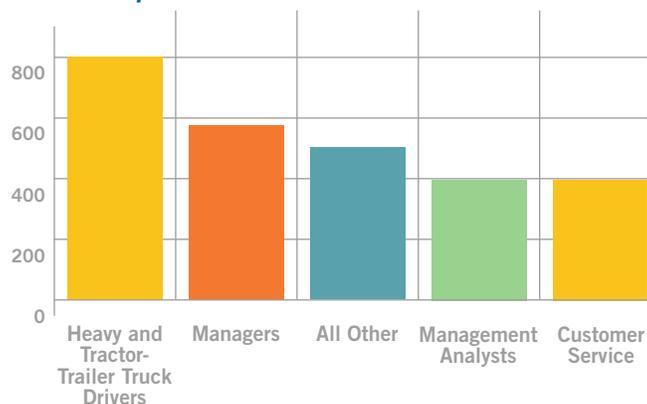
[Target Occupation Profiles \(TOPS\), Chicago Cook Workforce Partnership](#): Profiles are provided on seven sectors with information detailing jobs, growth, yearly openings, wage levels, average yearly salary, duties, information to determine if the job will be a good fit, advancement opportunities, training opportunities, largest employers, and other related jobs.

[Careers in Social Work: Outlook, Pay, and More, Career Outlook, Bureau of Labor Statistics](#): This occupational overview includes different information about the work as well as data and analysis of using the new BLS separations methodology.

Data sources:

- **Occupational Employment Statistics (OES)** from the Bureau of Labor Statistics provides occupational information including employment and wages for select geographies.
- **State Labor Market Information Office**: State labor market offices can provide data on occupational employment, projections, and wages.
- Some **Subscription Labor Market Analytic Services (\$)** allow you to research occupations for a given geography. Occupation data provided includes historical and projected employment, location quotients, earnings, job postings data, etc.

Detroit Top Jobs



Source: [Detroit Data Snapshots, Workforce Intelligence Network](#)

WHAT CAREER PATHWAYS ARE AVAILABLE IN MY REGION?



The Workforce Innovation and Opportunity Act (WIOA) mandates that local workforce boards convene their education partners to develop career pathways, which would allow residents to more seamlessly access occupational and related training to prepare for and advance within specific jobs and industry sectors. Career Pathways provide jobseekers the tools to access in demand careers, including multiple entry and exit points, opportunities for advancement, support, and the skills or credentials required.

Understanding the pathways available in your region is an important and well-documented step towards employing residents, especially those with barriers.

Outside of workforce boards, employers or other organizations in your region may be developing career pathways.

For those interested in developing career pathways, the resources in this toolkit will allow you to identify relevant occupations and sectors for your region, as well as the skills needed and training available. They will also provide different options for formatting the data. The information included is most useful when grounded in what is relevant for your audience which may be different than the examples included. For data sources on how to begin collecting information on relevant pathways for your region, please see “What are the top industries for employment in my region?”; “What are the top occupations for employment in my region?”; and “What skills are required for jobs in my region?”. Other indicators and data sources may be relevant as well depending on your approach.

In addition to Career Pathways, there are Career Pathways Systems. For more information on their development, please see the U.S. Department of Labor, Employment and Training Administration’s [Career Pathways Toolkit: An Enhanced Guide and Workbook for System Development](#). Resources to support their development are not included below as the toolkit focuses on using labor market information and data. However, it is important to be aware of Career Pathways Systems in a region.

WHAT CAREER PATHWAYS ARE AVAILABLE IN MY REGION?

EXAMPLES:

Accounting Career Pathway, Real Time Talent: This example details demand, occupation, and skill data and provides an example of how to format this type of data for jobseekers.

A Way Forward: Career Pathway Development in Detroit, Workforce Intelligence Network: This report describes the development of retail and hospitality career pathways model in Detroit.

Careers in Colorado, Colorado Workforce Development Council: is a website dedicated to helping identify career pathways in the state of Colorado. You can view information on pathways for specific regions as well.

Develop a Career Ladder/Lattice: CareerOneStop, U.S. Department of Labor, Employment and Training Administration: This user guide details the process for developing career ladders and lattices, including examples.

Driving Opportunity in Detroit: Building a Middle-Skill Workforce to Strengthen Economic Recovery and Expand the Middle Class, New Skills at Work, JPMorgan Chase & CO.: This report speaks to the middle skills gap present in Detroit and includes career pathways for Detroiters.

Data sources:

- **Current Employment Statistics** from the **Bureau of Labor Statistics** allows you to look up industry estimates on employment, hours, and earnings for states, MSAs, and Metropolitan Divisions.
- **Occupational Employment Statistics (OES)** from the **Bureau of Labor Statistics** provides occupational information including employment and wages for select geographies.
- The **Occupational Outlook Handbook** contains detailed information on a wide variety of occupations, including training expectations and work environments.
- **O*NET** also contains detailed information for a wide variety of occupations, including numerical measurements of different kinds of knowledge, skills, and abilities that allow for comparing relative skill levels of occupations.
- **“Real-Time” Labor Market Information Services (\$)** may include data on skills, education, and training requirements of job postings.
- Some State Departments’ websites, including **State Departments of Licensing and Regulation** may include licensing, registries, or certifications for regulated professions.
- **State Labor Market Information Office:** State labor market offices can provide data on industry employment, projections, and wages.
- Some **Subscription Labor Market Analytic Services (\$)** allow you to research industries for a given geography. Industry data provided includes employment, location quotients, historic and projected growths, and demographics, among others.
- The **Quarterly Census of Employment and Wages (QCEW)** from the **Bureau of Labor Statistics** allows you to look up information for select MSAs on employment, location quotient, and wages.
- The **Quarterly Workforce Indicators (QWI)** data from the **U.S. Census Bureau’s Local Employment Dynamics** includes demographic data by industry.
- **Primary data collection**, including interviews, focus groups, and surveys with stakeholders and employers targeted at understanding any career pathways in place, in your region.
- **Web searches, news articles, and press releases.**

WHAT CAREER PATHWAYS ARE AVAILABLE IN MY REGION?



HEALTH CARE PATHWAY³⁴

Middle-skill occupations in healthcare provide opportunities for career advancement. Some occupations pay entry-level wages, but allow for workers to attain higher incomes as they acquire additional education and experience. Below are examples of career pathways in healthcare.

	Occupation	Median Hourly Wage (Detroit MSA)	Education Level	Industry-Valued Certifications	Skills and Competencies
High-Skill	Registered Nurse	\$32.87	Bachelor's degree or Associate's degree with five plus years of experience	Registered Nurse	<ul style="list-style-type: none"> - Acute and critical patient care - Treatment planning - Patient evaluation and monitoring - Case management and care plans
	Auditing and Compliance Specialist	\$29.21	Bachelor's degree	RHIA Certification, Certified HIPAA Administrator	<ul style="list-style-type: none"> - Advanced clinical billing - Accounting - Business administration - Auditing - Mentoring - Problem solving
Middle-Skill	Surgical Technologist	\$20.10	Associate's degree	Certified Surgical Technologist	<ul style="list-style-type: none"> - Surgical equipment and technology - Operating room experience - Patient preparation - Aseptic technique - Time management - Multitasking
	Health Information Manager	\$16.79	Associate's degree or postsecondary certificate	RHIT Certification	<ul style="list-style-type: none"> - ICD-10 - Electronic health records - Clinical procedure terminology - CPT - Microsoft Excel - Organizational skills - Research - Writing
Entry-Level	Medical Assistant	\$13.37	High school diploma with moderate on-the-job training	First Aid CPR AED Medical Assistant Certification	<ul style="list-style-type: none"> - Vital signs measurement - Patient preparation - Cleaning - Injections - Communication skills - Basic computer skills
	Medical Biller	\$13.34 (entry-level wage)	High school diploma with moderate on-the-job training		<ul style="list-style-type: none"> - Scheduling and appointment setting - Basic medical terminology - Basic billing systems - Data entry and word processing - Customer service - Communication skills

³⁴ Information for healthcare career pathway is drawn from Burning Glass Labor/Insight and EMSI Complete Employment 2014.2 and is informed by community college program descriptions from Wayne County and Macomb Community Colleges.

WHAT SKILLS ARE REQUIRED FOR JOBS IN MY REGION?

Understanding the education, training, and other skill requirements of a region's occupations and career pathways is a crucial part of understanding demand. It is equally important to correlate this information with the skills and education available among residents in a given area. Once occupations of interest have been identified, there are a number of data sources that will allow you to collect both qualitative and quantitative information on job requirements.

EXAMPLES:

See next page for examples from the [Detroit Workforce Mapping Project](#).

[Baltimore Regional Talent Development Pipeline Study, Opportunity Collaborative](#): This report outlines the workforce supply and demand of the Baltimore Region. Part of their analysis includes training required for industries.

[Driving Opportunity in Detroit: Building a Middle-Skill Workforce to Strengthen Economic Recovery and Expand the Middle Class, New Skills at Work, JPMorgan Chase & CO.](#): This report details the education, skills, and competencies needed for several different career pathways in Detroit.

[Target Occupation Profiles \(TOPS\), Chicago Cook Workforce Partnership](#): Profiles are provided on seven sectors with information detailing jobs, growth, yearly openings, wage levels, average yearly salary, duties, information to determine if the job will be a good fit, advancement opportunities, training opportunities, largest employers, and other related jobs.

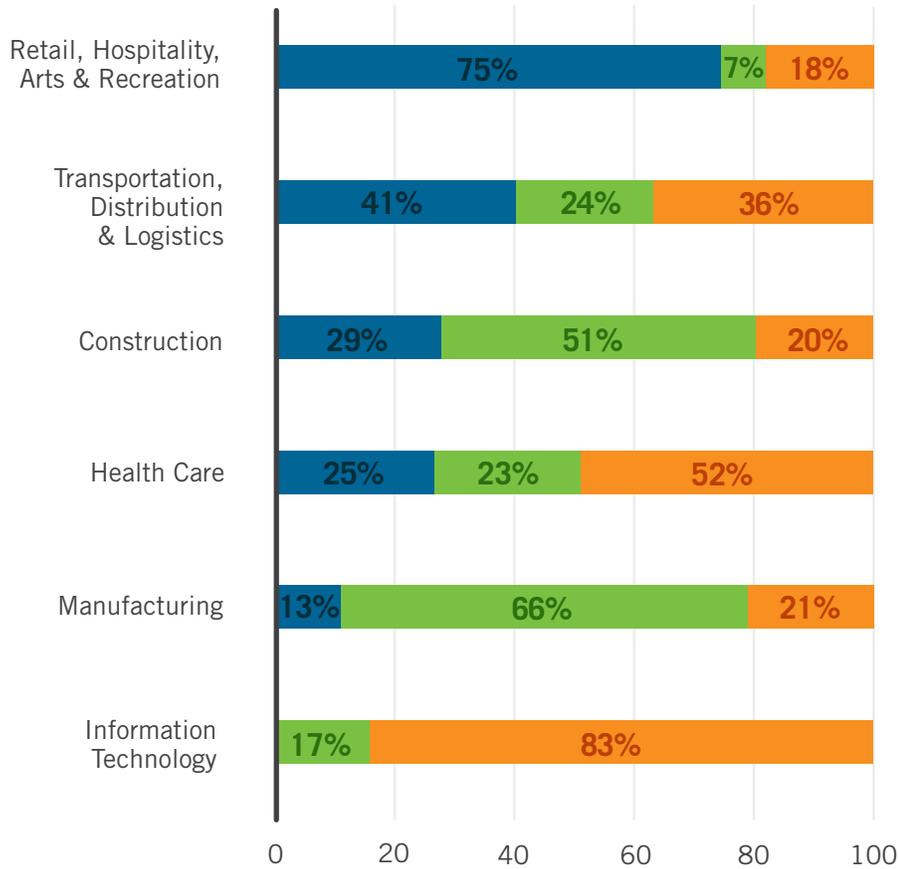
[Workforce Supply Tool, Ohio Higher Ed and Ohio Education Resource Center](#): Intended to help employers make decisions about recruitment, this tool profiles occupations in Ohio at the state or regional level, including information on O*Net descriptions, important skills, earnings per hour, and numbers employed.

Data sources:

- The [Occupational Outlook Handbook](#) contains detailed information on a wide variety of occupations, including training expectations and work environments.
- [O*NET](#) also contains detailed information for a wide variety of occupations, including numerical measurements of different kinds of knowledge, skills, and abilities that allow for comparing relative skill levels of occupations.
- [“Real-Time” Labor Market Information Services \(\\$\)](#) may include data on skills, education, and training requirements of job postings.
- Some [State Departments’ websites](#), including [State Departments of Licensing and Regulation](#) may include licensing, registries, or certifications for regulated professions.
- Some [Subscription Labor Market Analytic Services \(\\$\)](#) allow one to research occupations for a given geography. Occupation data may include education and training requirements and, via a crosswalk with IPEDS data, educational completions in associated programs.

WHAT SKILLS ARE REQUIRED FOR JOBS IN MY REGION?

Job Preparation Requirements by Sector



Minimal Preparation

Jobs that usually only require a high school diploma or less, with or without short-term on the job training.

Moderate Preparation

Jobs that usually require a high school diploma and moderate to long term on the job training or apprenticeship AND jobs that usually require some kind of postsecondary training such as certificate programs, including people with some college but no degree.

High Preparation

Jobs that require prior work experience in the occupation regardless of education (i.e., first line supervisors) AND any job requiring an associate's degree or higher.

To assess the variation among sectors in terms of entry-level job opportunities, CSW determined the distribution of jobs requiring minimal, moderate or high levels of preparation within each sector.

Source: [Detroit's Untapped Talent: Partnerships and Pathways to Success, Corporation for a Skilled Workforce, 6](#)



HOW MANY ESTABLISHMENTS ARE IN MY REGION AND WHAT ARE THEIR SIZES?



The number of firms, firm size, and employment by firms can help provide another perspective of demand for the region. How many small businesses are in your region and how many people do they employ?

EXAMPLES:

[The Economic Impact of the U.S. Retail Industry, National Retail Foundation and PricewaterhouseCoopers LLP](#): This report details the retail industry including establishment and firm size data.

[Industrial Jobs of the Future: Ensuring Diverse Participation in San Francisco's Growing Manufacturing Economy, SFMade](#): This report details the employment needs of the San Francisco manufacturing sector, including details on establishments.

[Virginia Community Profiles, Virginia Employment Commission](#): These community profiles are provided at many geographical area levels and include many data points, including establishment data.

Data sources:

- [County Business Patterns \(CBP\) and ZIP Code Business Patterns \(ZBP\)](#) from the U.S. Census Bureau provide information on establishments overall and by size.
- [ReferenceUSA \(\\$\)](#) provides detailed real-time databases of U.S. businesses. A subscription is required, but many local libraries are subscribers and data can be acquired through them.
- Some [Subscription Labor Market Analytic Services \(\\$\)](#) allow you to research the number of establishments for select regions.

In 2015 there were approximately 11,000 manufacturing industry jobs in San Francisco County. The city's manufacturing businesses are small: those 11,000 jobs are spread across over 700 establishments, with an average of just 15 jobs per establishment. According to labor market projections, total manufacturing employment is projected to decline by 4% through 2020. However, from SFMade's position on the ground, it seems likely that recent gains will continue and the city will see growth instead.

Source: [Industrial Jobs of the Future: Ensuring Diverse Participation in San Francisco's Growing Manufacturing Economy, SFMade, 4](#)

TO WHAT EXTENT DO JOBS IN MY REGION PAY FAMILY-SUPPORTING WAGES?

Calculating the family-supporting wages for a region allows stakeholders to get a better sense of job quality for a given job and if that job will lead to self-sufficiency. It is helpful to compare these data to the wages for available jobs and top occupations in a region, and also to poverty thresholds.

EXAMPLES:

State of the Louisville Regional Labor Market, KentuckianaWorks: This labor market overview presents the top occupations and job postings by family-supporting wages.

Workforce Report Card 2015, Gulf Coast Workforce Board: The Gulf Coast Workforce Board reports on the living wage required for a family of four for Houston and comparison cities. They also report on other monthly costs for a family of four.

Data sources:

- **The Living Wage Calculator** from MIT calculates the family-sustaining wage needed by estimating the typical expenses for a region. The calculator can estimate the wage needed for states, counties, and MSAs.
- **Occupational Employment Statistics (OES)** from the Bureau of Labor Statistics provides occupational information including employment and wages for select geographies.
- **State Labor Market Information Office:** State labor market offices can provide data on occupational employment, projections, and wages.
- Some **Subscription Labor Market Analytic Services (\$)** allow you to research occupations for a given geography. Occupation data provided includes historical and projected employment, location quotients, earnings, job postings data, etc.

Top 30 Job Postings in the Louisville MSA in the Fourth Quarter of 2016 Paying Above the Family-Supporting Wage*

25th-75th Percentile Pay Ranges for Each Job



Source: State of the Louisville Regional Labor Market, Fourth Quarter 2016, KentuckianaWorks, 5

ARE THE JOBS IN MY REGION PART TIME OR FULL TIME?

Understanding the status of jobs in a region can provide important information on demand and the quality of jobs. Although some labor force participants prefer to work part time, others are hoping for an increase in hours that will allow for more sustainable employment.

EXAMPLES:

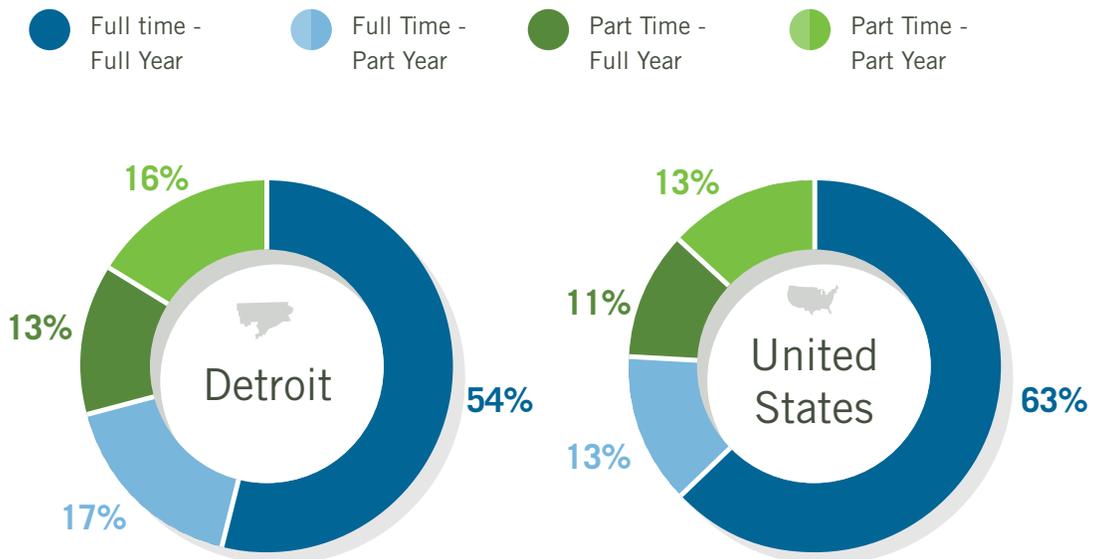
See below for examples from the [Detroit Workforce Mapping Project](#).

[The Ratio of Part-Time Employed Remains High, But Improving, Advisor Perspectives](#): This article analyzes national part time employment data.

Data sources:

- The [American Community Survey](#) data from the U.S. Census Bureau provides a number of indicators on work status, including data on weeks and number of hours worked, which can be broken down by various demographics.
- The [Occupational Outlook Handbook](#) provides some work schedule information on an occupation-by-occupation basis, which can be found under “work environments” for that occupation.

Detroit has More Part-Time Workers (2013)



Source: [Detroit's Untapped Talent: Jobs and On-Ramps Needed, Corporation for a Skilled Workforce, 12](#)

WHICH INDUSTRIES ARE BEST IN MY REGION FOR TARGET POPULATIONS?

Staffing patterns and career pathways are important to understanding the trajectory of a given entry-level job, but they are often directed at the overall population. Frequently missing from these analyses is an understanding of goodness of fit for target populations, such as returning citizens/ex-offenders and opportunity/at-risk youth. Not all jobs will be available for all populations depending on job requirements. Doing this homework for your region can provide critical information to those with possible barriers to employment and help guide participants toward more suitable occupations or industries. It will be important to understand which populations these include for your region.

EXAMPLES:

[Building Bridges to Help Chinese Families Reach Economic Self-Sufficiency, Chinatown Families Economic Self-Sufficiency Coalition](#): This report details employer perspectives on recruiting, work environments, and potential barriers in their industries faced by Chinese workers who are bilingual or with limited English proficiency.

[Connecting Baltimore's Opportunity Youth to Careers, Job Opportunities Task Force](#): While this report is not a catalogue of industries or employers hiring opportunity youth, it does include recommendations for connecting opportunity youth to employment, including using industry-based workforce development programs and career pathways approaches.

[Connecting Young Adults to Skills and Jobs, National Fund for Workforce Solutions](#): This report covers strategies for connecting opportunity youth to employment, including partnering with employers. The report also details the importance of collecting regional labor market data to identify industries in high demand to develop appropriate pathways and ladders for youth.

[Returning Citizens, Pure Michigan Talent Connect](#): Information on misconceptions around hiring returning citizens as well as other helpful information, including employers who hire returning citizens.

Data sources:

- **Primary data collection**, including interviews, focus groups, and surveys with stakeholders and employers designed to understand the perspectives of stakeholders and employers on which industries are most likely to hire target populations in your region.

WHAT ARE THE CURRENT JOB OPENINGS IN MY REGION?

Job postings data (also known as “real-time” labor market information) speak to demand and provide an estimate on the number of openings in a region. This data includes job postings by overall volume as well as specific occupations in demand for the region. Understanding the length of time jobs have been open can also illustrate the difficulty a region has in meeting the demand.

Note that job posting information may not be representative. Data comes from online job postings that skew towards higher-skilled positions. Job postings may be speculative and not equate to an actual position needing to be filled. Many postings do not include education, experience, and training requirements. Industry categorization is generated by algorithm, leading to a high error rate, and geography can be hard to match. However, even with these limitations, job posting data provides the most up-to-date snapshot of current demand in a region.

EXAMPLES:

See this page for examples from the [Detroit Workforce Mapping Project](#).

[Driving Opportunity in Detroit: Building a Middle-Skill Workforce to Strengthen Economic Recovery and Expand the Middle Class, New Skills at Work, JPMorgan Chase & CO.](#)

This report speaks to the middle skills gap present in Detroit and part of the analysis includes the length of time job postings were available as an indicator of the struggles employers face in filling openings.

[State of the Louisville Regional Labor Market, KentuckianaWorks](#)

This labor market overview presents the top 30 job postings by typical entry-level education required.

[Where are the Jobs, Chicago Cook Workforce Partnership](#)

The Chicago Cook Workforce Partnership releases a summary of online job postings quarterly. This summary includes the number of job postings; a breakdown of the top industries; the top employers by industry; and the occupations, credentials and skills by industry.

Data sources:

- [Local job postings sites](#).
- [“Real-Time” Labor Market Information Services \(\\$\)](#) typically allow you to research job postings data. Data may include overall volume of postings by specific occupation type and broader occupational groupings, postings by industry, wage data, and skills, education, and training required.

Overall job postings in Detroit have fluctuated in the past four years. A trough in 2012 of 46,559 postings was followed by a peak of 79,033 postings in 2013 (70% increase). In 2014, postings remained high at 73,041 (7.6% drop from 2013).

The same occupations have maintained their top postings positions since 2011. In Detroit, most of these jobs are for highly-skilled, highly-trained/experienced workers. Examples include: software developers, applications; heavy and tractor-trailer truck drivers; registered nurses; sales reps for wholesale and manufacturing; and computer systems analysts. Sixty percent of jobs that include a preferred educational attainment level require a Bachelor’s degree or higher.

Source: [Detroit Workforce System Mapping Project, Full Report, Corporation for a Skilled Workforce, 23](#)

WHAT IS KNOWN ABOUT EMPLOYER HIRING POLICIES AND PRACTICES?

Speaking to workforce development system stakeholders and employers in a given area can provide essential information about demand that cannot be obtained through LMI data. Questions to be answered can include the following: Do employers hire from training programs? Do employers expect employees to have completed a training program or do they use another mechanism (which could mean that adding training capacity does not solve a skills or worker shortage)? How long does it usually take to fill positions? What other sources do they hire from – temporary agencies, the workforce development system, etc.?

EXAMPLES:

[Building Bridges to Help Chinese Families Reach Economic Self-Sufficiency, Chinatown Families Economic Self-Sufficiency Coalition](#): This report details employer perspectives on recruiting and work environments, among other topics.

[Employer Perspectives on Workers with Disabilities, Interagency Committee on Disability Research](#): This report outlines a summit that was held to bring together researchers, business leaders, and policymakers to better advance the research of and voice of employers and the demand side as it pertains to hiring workers with disabilities. The paper outlines the details of the summit as well as the strategies created to collect more comprehensive information on the demand side.

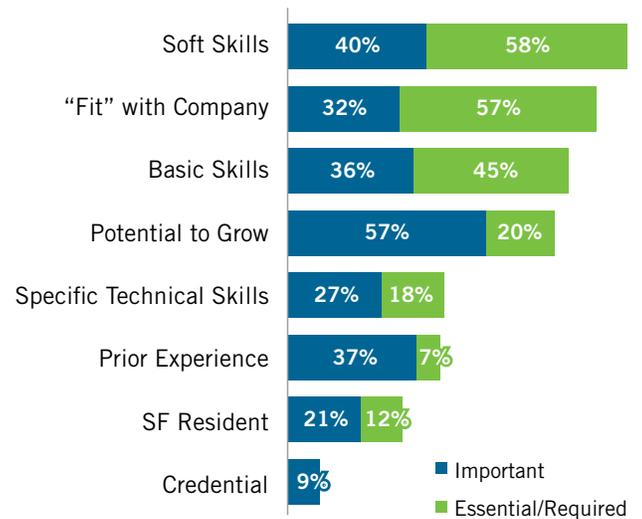
[Employer Perspectives on Southeast Labor Market Conditions, Federal Reserve Bank of Atlanta](#): The Federal Reserve Bank of Atlanta conducted a survey with business contacts to better understand their hiring plans, wage trends, and outlook for growth.

[Industrial Jobs of the Future: Ensuring Diverse Participation in San Francisco's Growing Manufacturing Economy, SFMade](#): This report details the employment needs of the San Francisco manufacturing sector, including employer perspectives.

Data sources:

- **Primary data collection**, including interviews, focus groups, and surveys with stakeholders and employers designed to answer the key policy questions facing your region.

Importance for Hiring



In general, however, employers were less interested in specific technical skills than in so-called “soft” or employability skills (polite, comes to work on time, dresses appropriately), as well as a potential employee’s “fit” with the company. When asked what was most important to them in hiring, 72% said it was “Finding the right person to grow in my business long-term” compared to only 28% who were focused on “Finding the right person to fill the immediate workforce need.”

Source: [Industrial Jobs of the Future: Ensuring Diverse Participation in San Francisco's Growing Manufacturing Economy, SFMade, 6-7](#)



LABOR MARKET AND WORKFORCE DEVELOPMENT SYSTEM DATA TOOLKIT

WORKFORCE DEVELOPMENT SYSTEM: HOW IS THE WORKFORCE DEVELOPMENT SYSTEM HELPING PEOPLE IN MY REGION ACHIEVE, RETAIN, AND ADVANCE IN EMPLOYMENT?



Indicators that address this question include:

- **What are the organizations, educational institutions, and other entities in the workforce development system and where are they located?**
- **What data exists on organizations, educational institutions, and entities, including performance and outcomes data?**
- **What are the federal, state, and local policies supporting workforce development?**
- **What public and philanthropic investments have been made in the workforce development system?**
- **What workforce development partnerships exist in my region?**

WHAT ARE THE ORGANIZATIONS, EDUCATIONAL INSTITUTIONS, AND OTHER ENTITIES IN THE WORKFORCE DEVELOPMENT SYSTEM AND WHERE ARE THEY LOCATED?

Before collecting this data, it is important to determine your parameters. Workforce development system entities can include public workforce development system organizations, nonprofit or faith-based organizations, and both private and public educational institutions, among others. When planning to inventory these entities, it is important to have a clear scope or definition for what should be included. You will also need to define the geography that you will use, which may be different than the geography you have used for other data collection. For instance, a city-based study may find that many education and training providers are located outside the city limits.

EXAMPLES:

See the next page for examples from the **Detroit Workforce Mapping Project**.

[Alameda County Environmental Scan and Asset Mapping Final Report, Public Consulting Group:](#)

This report determined the workforce development “assets” for Alameda County by defining the asset groups and regions of the county and then mapping the locations of the assets to determine accessibility in gaps.

[Chicago Workforce Development Programs: System Map and Inventory, Chapin Hall at the University of Chicago:](#)

This report includes a program map and inventory of workforce development programs and services. The program map includes a series of charts that include program name, city agency, state agency, federal agency, service provider, target customer, services, and policy/funding source.

[Snapshot of NYC Workforce Development System, Career Pathways: One City Working Together, New York City:](#)

This snapshot provides an overview of workforce development system programs, including information on the program, funding, populations served, and outcomes.

[Workforce Information and Resource Exchange \(WIRE\), Chicago Jobs Council:](#) The WIRE includes a provider directory, which allows users to search for workforce services by name, location, service, community, populations served, or organization type.

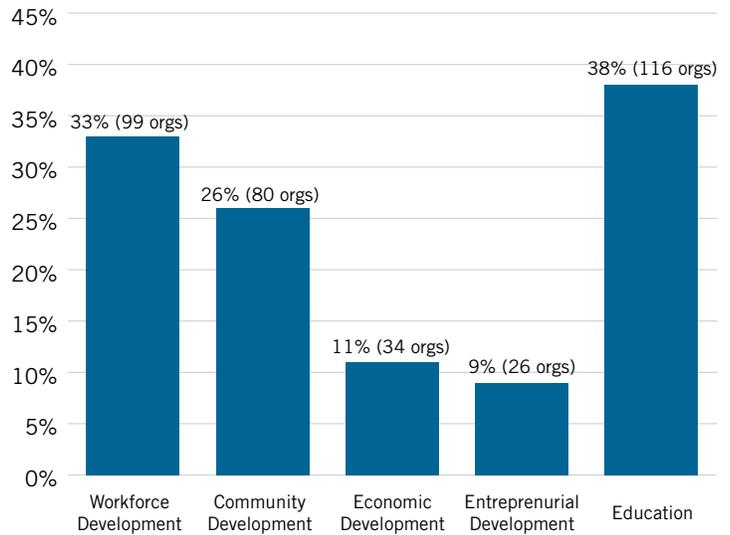
Data sources:

- United Way’s **2-1-1** allows users to search for services in their community.
- The **Integrated Postsecondary Education Data System (IPEDS)** allows you to search for academic programs in a state.
- Data from **workforce development service providers:** Partner workforce organizations may have lists of existing educational and workforce development programs.
- Some **Subscription Labor Market Analytic Services (\$)** allow you to research educational program information. For example, educational institution data can be collected via IPEDs data retrieved through the EMSI.
- **Web searches, marketing materials, annual reports or reaching out to program staff.**

WHAT ARE THE ORGANIZATIONS, EDUCATIONAL INSTITUTIONS, AND OTHER ENTITIES IN THE WORKFORCE DEVELOPMENT SYSTEM AND WHERE ARE THEY LOCATED?

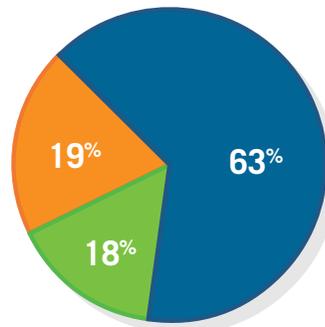
Our inventory research revealed that services needed to support employment by Detroit residents were being provided by a much larger set of organizations than just “traditional” workforce service providers. In addition to workforce service providers, these included educational institutions, economic development organizations, community development organizations, and entrepreneurial service providers. There is a great deal of overlap between the activities in community development and workforce development, such as organizations like Community Development Advocates of Detroit, which provides a “citywide voice for Detroit neighborhoods.” We found 27 organizations that provided services in more than one category, which suggests that organizations in Detroit actively seek to service the multiple barriers many Detroit residents face. The adjacent chart illustrates the distribution of organizations among these categories. Note the high volume of community development organizations that also provide labor market attachment related services, as well as the high volume of educational providers. This chart demonstrates that a significant portion of the work done to connect individuals to the labor market takes place in educational institutions, including adult basic education, universities, community colleges, and proprietary schools.

Types of Organizations Providing Workforce Services

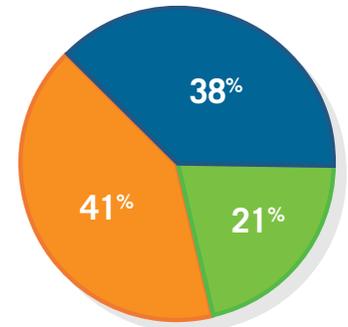


In our research, we investigated program offerings throughout the Metro Detroit area. Most of the providers of workforce-readiness and foundational skills programs described above are within the Detroit city limits. However, for those trying to access postsecondary education and training, the opposite is true, as most of those institutions are located outside the city, or in the Tri-County area (defined as Wayne, Oakland, and Macomb counties, not including Detroit). Due to the geographic size of the city of Detroit, even accessing programs within the city can be a challenge.

Workforce Service Provider Locations



Post Secondary Educational Institutional Locations



● In Detroit
 ● Within 5 mile radius
 ● In outer Tri-County

Source: [Detroit Workforce System Mapping Project, Full Report, Corporation for a Skilled Workforce, 20](#)

WHAT DATA EXISTS ON ORGANIZATIONS, EDUCATIONAL INSTITUTIONS, AND ENTITIES, INCLUDING PERFORMANCE AND OUTCOMES DATA?

The type of data available will depend on the type of organization. For educational institutions, what are the programs and completion rates for your region? For workforce programs, what data are available on those who entered employment, and/or retained employment, and their average earnings? What are the outcomes for youth and adults? What about data on those placed in education, attainment of degrees or certifications, and literacy and numeracy gains? Apart from required Workforce Innovation and Opportunity Act (WIOA) measures, your workforce development system may have common metrics of interest that are being tracked.

Data sources:

- The **Integrated Postsecondary Education Data System (IPEDS)** allows you to search for academic programs in a state and provides data on a number of variables.
- Data from **workforce development service providers**: Partner workforce organizations may have data they can share on their service performance and outcomes. This includes data on workforce development services, education data, and training programs data.
- Some **Subscription Labor Market Analytic Services (\$)** allow you to research educational program information, including program completion data.
- **Web searches, marketing materials, annual reports or reaching out to program staff**: Community-based organization program completion data can be collected from annual reports or from partnering organizations.
- **WIA and WIOA Performance Reports** includes quarterly or annual national and state level data for public workforce development programs.

EXAMPLES:

See below for examples from the **Detroit Workforce Mapping Project**.

Career Pathways: One City Working Together, New York City: This report provides an in-depth look at the city's workforce agencies, including outcomes tracked.

College Wage Tracker, California Community Colleges Chancellor's Office: This site allows users to select a college and program and see median wages and total awards.

Higher Education, Central Ohio Compact: This dashboard allows users to select a campus and then view outcomes data.

Workforce Benchmarking Network, CSW: This network provides information to help users benchmark workforce service provider outcomes against those of similar programs across the country. It also assists organizations with using their internal data for continuous improvement and works with communities to develop shared metrics.

Meeting State and Worker Demand, A Report on Labor Market Outcomes for Montana Colleges, Montana Department of Labor & Industry: This report details higher education outcomes for the state of Montana intended to help the system evaluate their talent pipeline and ensure that programs are meeting the needs of the workforce.

Identifying and securing data to determine how well the system is functioning and how well residents fare in the labor market is extremely difficult. Absent a reliable public database of the outcomes of these programs and services, the only way to secure outcome data is organization by organization, many of which use differing metrics and definitions. Certainly, individual organizations can and do provide outcome data; what's lacking is a way to aggregate that data across organizations at the systems level (see more in Systems Observations section). As a result, our report does not provide data on the number of people being served, how many people are served in specific programs, or what the outcomes are for those served (job placement, credential attainment, etc.). As an example, we collected outcomes from the 2013 annual reports of 5 large, multi-service community-based organizations and found that, in aggregate, they served nearly 26,000 people (although with possible duplication of individuals across organizations). However, this represents just 22% of an estimated 120,000 people who may need services (the 71,000 already unemployed workers and the additional 49,000 individuals who would need to enter the labor force for Detroit to match the state's labor force participation rate).

WHAT ARE THE FEDERAL, STATE, AND LOCAL POLICIES SUPPORTING WORKFORCE DEVELOPMENT?



Workforce development policies determine the relationship of agencies administering programs with those serving residents as well as how funding is allocated and the way services are provided. Understanding these policies and how they work in your region is an important aspect in mapping the workforce development system. Depending on the region where you live, other policies may be relevant to review and include depending on how they affect your residents and services.

EXAMPLES:

[Chicago Workforce Development Programs: System Map and Inventory, Chapin Hall at the University of Chicago](#): This report provides an overview of the agencies and policies that shape the workforce development system.

Data sources:

- **Primary data collection**, including interviews, focus groups, and surveys with stakeholders and employers targeted at understanding the policies that affect those working in the workforce development system.
- The **State Business Incentives Database (\$)** from Council for Community and Economic Research (C2ER) offers a database of all state incentives, which can inform understanding of state policy agendas. This resource requires a membership.
- **Web searches of federal, state, and local policies.**

WHAT PUBLIC AND PHILANTHROPIC INVESTMENTS HAVE BEEN MADE IN THE WORKFORCE DEVELOPMENT SYSTEM?

Understanding funding is critical to mapping out the workforce development system in a region. There are many ways to look at funding. Funding can be analyzed by funding provided to organizations of interest, by the funder, or by another specific framework that makes sense for your region.

EXAMPLES:

See the next page for examples from the [Detroit Workforce Mapping Project](#).

[An Analysis of Public Workforce Development Resources, Metropolitan Chicago Region](#): This report details the federal, state, and local resources that supported workforce development in the metropolitan Chicago region in fiscal year 2010.

[Federal Funding Tool, National Skills Coalition](#): This tool allows you to view current and historical federal funding at the national level across programs.

[Investing in Baltimore's Workforce: Leveraging Opportunity and Moving to Scale, Job Opportunities Task Force, Baltimore Integration Partnership](#): This brief analyzes Baltimore's workforce training resources and provides recommendations for overcoming resource constraints using national models.

[Putting DC to Work: A Resource Map of the District's Workforce Development Dollars, DC Fiscal Policy Institute](#): This funding map outlines what the District of Columbia spends on workforce development as well as services offered and who is served.

Data sources:

- [Following the Money, Federal Reserve Bank of Atlanta](#): This resource is for Community and Economic Development (CED) funds. Federal Reserve Banks of Philadelphia and Atlanta created a tool to help understand the way in which foundation grants supporting CED activities were distributed across 366 metropolitan areas in the United States. The research relied on data provided by the Foundation Center that captured grants of at least \$10,000 made by the 1,000 largest foundations between 2008 and 2013.
- [Foundation and funders' collaborative websites](#).
- [News articles and press releases](#).
- The [State Economic Development Program Expenditures Database \(\\$\)](#) from The Council for Community and Economic Research (C2ER) offers a database of all state expenditures, including economic development and workforce expenditures. This resource requires a membership.
- [USAspending.gov](#) allows you to search for federal funding.
- Websites are available to help track IRS Form 990s, including [990 Finder](#) and [GuideStar](#).

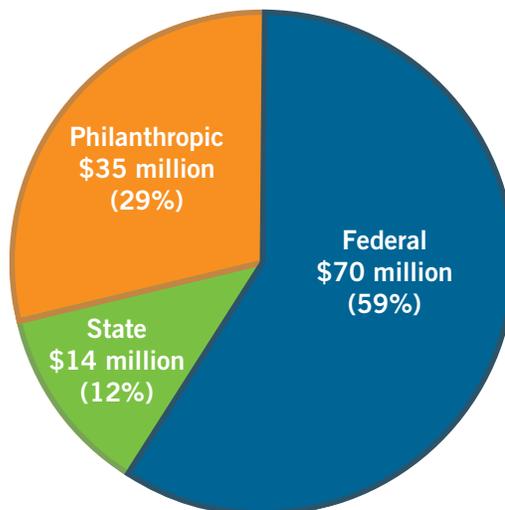
WHAT PUBLIC AND PHILANTHROPIC INVESTMENTS HAVE BEEN MADE IN THE WORKFORCE DEVELOPMENT SYSTEM?

Consistent with CSW's interest in career pathways frameworks, we divided the overall funding into five categories:

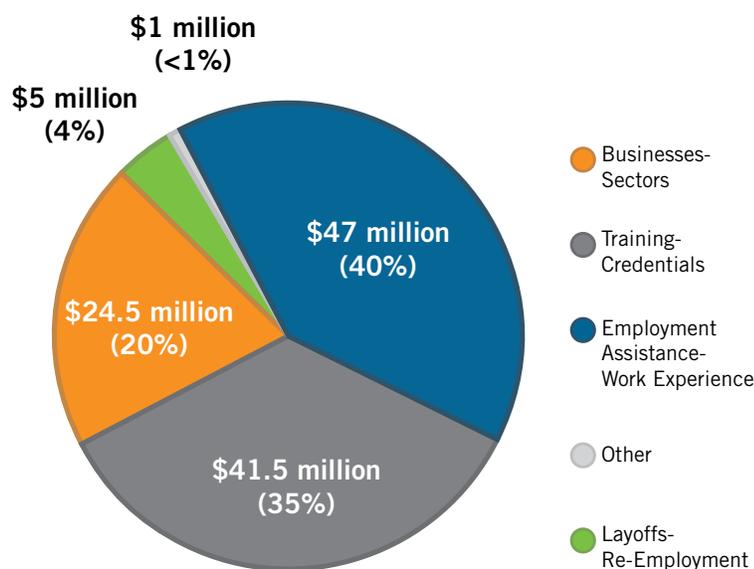
- 1. Employment Assistance-Work Experience:** Programs that provide employment assistance and work experiences, and programs that provide entry points for specific populations, for example, summer youth employment programs.
- 2. Training-Credentials:** Programs that provide education, training and credentials. Includes any level of vocational or critical skill building and training, whether generally, or for in-demand occupations and fields, but geared to individuals, not the sector participants, for example, ESL programs or general skills training programs for job seekers.
- 3. Businesses-Sectors:** Programs from any of the above categories that are geared toward a specific sector or occupational category, for example, programs that aim to recruit under-represented populations into specific industries, often targeted directly to businesses.
- 4. Layoffs:** Re-employment programs explicitly focused on support to either companies or individuals in layoff and re-employment situations, for example, programs that help laid-off workers explore and gain access to transitional support resources and career placement assistance.
- 5. Other:** Related programs that do not fit into any of the above.

The last two categories (Layoffs and Other) are both small, but are necessary to reflect the full set of funding coming into the system. The first three (Employment Assistance-Work Experience, Training-Credentials, and Businesses-Sectors) are closely aligned — though not a perfect match — to a career pathways analysis in Detroit.

Total Detroit System Funding by Source, Jan 2013-Dec 2014



Total Detroit System Funding by Focus Area, Jan 2013-Dec 2014



Source: [Detroit Workforce System Mapping Project, Full Report, Corporation for a Skilled Workforce, 25-26](#)

WHAT WORKFORCE DEVELOPMENT PARTNERSHIPS EXIST IN MY REGION?



Mapping out and researching the existing partnerships for a given region provides an overview of how the system works, including where there is alignment, fragmentation, and duplication. This can include industry sector strategy partnerships, workforce development committees dedicated to a specific issue, partnerships with committed employers, etc.

EXAMPLES:

See below for examples from the **Detroit Workforce Mapping Project**.

Career Pathways: Progress Update, New York City:

This recommendation update notes partnerships throughout the report that contribute to the city's progress.

The **National Fund for Workforce Solutions** website provides information on regional collaborations.

Data sources:

- **Primary data collection**, including interviews, focus groups, and surveys with stakeholders and employers targeted at understanding any partnerships that may be taking place.
- **Web searches, news articles, and press releases.**

Program Spotlight

LIFT

Opened in the Corktown neighborhood of Detroit in 2014, **LIFT (formerly the American Lightweight Materials Manufacturing Innovation Institute)** is a public-private partnership that develops and deploys advanced lightweight materials manufacturing technologies for defense and commercial applications. The Institute's mission is to act as the bridge between basic research and final product commercialization of innovative manufacturing technologies and practices.

Integrative education, training, and workforce development is a core aspect of the LIFT mission. LIFT is convening industry, government, economic development, non-profit, academic, and workforce development partners to design and deliver education and workforce development programs to help ensure an educated and skilled advanced manufacturing workforce.

Source: [Detroit's Untapped Talent: Partnerships and Pathways to Success, Corporation for a Skilled Workforce, 10](#)

APPENDIX A: DATA SOURCES

The following tables include further information on data sources found in **bold** throughout the document.

Federal Data Sources

Data sources in this section include data for multiple states. The list is sorted alphabetically.

Data Source	Organization	Link	Frequency	Timeframe	Geography
2-1-1	United Way Worldwide	http://www.211.org	Unclear	Unclear	City, County, and ZIP Code
990 Finder	Foundation Center	http://foundationcenter.org/find-funding/990-finder	Annual	Calendar year	Organization
American Community Survey (ACS)	U.S. Census Bureau	http://factfinder.census.gov/	Annual	Calendar year	Nation, State, MSA, County, City, Census Tract
Bureau of Justice Statistics	Bureau of Justice	https://www.bjs.gov/	Varies	Varies	Nation, State, County for some
County Business Patterns (CBP) and Zip Code Business Patterns (ZCBP)	U.S. Census Bureau	http://factfinder.census.gov/	Annual	Calendar year	County, Zip Code
County Health Rankings and Roadmaps	University of Wisconsin	http://www.countyhealthrankings.org/	Annual	Calendar year	County
Crime Mapping	Private	http://www.crimemapping.com/	Rolling	User defined	Local Law Enforcement Agency
Current Employment Statistics (CES)	U.S. Bureau of Labor Statistics	https://www.bls.gov/sae/	Monthly	Month	Nation, State, MSA, Metropolitan Division
Following the Money	Federal Reserve Bank of Atlanta	https://www.frbatlanta.org/community-development/data-and-tools/following-the-money.aspx	One-time	2008-2013	MSA
GuideStar	GuideStar	https://www.guidestar.org/Home.aspx	Unclear	Calendar year	Organization

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Data Source	Organization	Link	Frequency	Timeframe	Geography
House Wage Calculator	National Low Income Housing Coalition	http://nlihc.org/library/wagecalc	Unclear	Unclear	State
HUD Exchange	U.S. Department of Housing and Urban Development	https://www.hudexchange.info/	Varies	Varies	Varies
Integrated Postsecondary Education Data System (IPEDS)	National Center for Education Statistics (NCES)	https://nces.ed.gov/ipeds/	Annual	Academic year	Nation, State, Institution
IPUMS-USA	University of Minnesota	https://usa.ipums.org/usa/	Annual	Calendar year	Region, State, Metro Area, Public Use Microdata Area, City
Justice Atlas	Justice Atlas	http://www.justiceatlas.org/	Varies	Varies	State
Living Wage Calculator	Massachusetts Institute of Technology	http://livingwage.mit.edu/	Annual	Calendar year	State, MSA, County, City
Local Area Unemployment Statistics (LAUS)	U.S. Bureau of Labor Statistics	https://www.bls.gov/lau	Monthly	Month	Nation, State, MSA, County, City
National Center for Education Statistics (NCES)	National Center for Education Statistics (NCES)	https://nces.ed.gov/	Varies	Varies	Varies
National Equity Atlas	Policy Link and USC PERE	http://nationalequityatlas.org/	Varies	Varies	Nation, State, MSA, City
Neighborhood Stabilization Program	U.S. Department of Housing and Urban Development	https://www.hudexchange.info/programs/nsp/	Varies	Varies	Varies

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Data Source	Organization	Link	Frequency	Timeframe	Geography
O*NET	U.S. Department of Labor	https://www.onetonline.org/	Rolling	N/A	Nation
Occupational Employment Statistics (OES)	U.S. Bureau of Labor Statistics	https://www.bls.gov/oes/	Annual	3-yr average	Nation, State, MSA, Metropolitan Division, and Nonmetropolitan Areas
Occupational Outlook Handbook	U.S. Bureau of Labor Statistics	https://www.bls.gov/ooh/	Biannual	N/A	Nation
Office of Family Assistance	U.S. Department of Health and Human Services	https://acf.hhs.gov/ofa	Varies	Annual	State
OnTheMap	U.S. Census Bureau	http://onthemap.ces.census.gov/	Annual	Calendar year	Nation, State, MSA, County, City, Neighborhood
Quarterly Census of Employment and Wages (QCEW)	U.S. Bureau of Labor Statistics	https://www.bls.gov/cew/	Quarterly	Quarterly	Nation, State, MSA, County
Quarterly Workforce Indicators (QWI)	U.S. Census Bureau	https://qwiexplorer.ces.census.gov/	Quarterly	Quarterly	State, County, MSA, Workforce Investment Area
“Real-Time” Labor Market Information Services (\$)	Examples include but are not limited to: Burning Glass Technologies and TalentNeuron	<p><i>Burning Glass Technologies:</i> http://burning-glass.com/</p> <p><i>TalentNeuron:</i> https://www.wantedanalytics.com</p> <p>Each vendor provides a different value set with differing limitations, and users will need to determine which are most appropriate for the desired information.</p>	Depends on vendor	Depends on vendor	Depends on vendor
ReferenceUSA (\$)	Infogroup	http://resource.referenceusa.com/	Ongoing	Varies	State, MSA, City, Zip Code, Neighborhood

APPENDIX A: DATA SOURCES

Data Source	Organization	Link	Frequency	Timeframe	Geography
State Business Incentives Databas (\$)	Council for Community and Economic Research (C2ER)	http://stateincentives.org/	Biannual	Varies	State
State Economic Development Program Expenditures Database (\$)	Council for Community and Economic Research (C2ER)	http://stateexpenditures.org/	Annual	Annual	State
Subscription Labor Market Analytic Services (\$)	Examples include but are not limited to: Economic Modeling Systems, Inc. (EMSI) and Chmura	<p><i>Economic Modeling Systems, Inc.</i> http://www.economicmodeling.com/</p> <p><i>Chmura:</i> http://www.chmuraecon.com/</p> <p>Each vendor provides a different value set with differing limitations, and users will need to determine which are most appropriate for the desired information.</p>	Depends on vendor	Depends on vendor	Depends on vendor
Uniform Crime Reporting Program	Federal Bureau of Investigations	https://ucr.fbi.gov/	Annual	Calendar year	Nation, State, Local Law Enforcement Agency
USAspending.gov	U.S. Department of the Treasury	https://www.usaspending.gov/Pages/Default.aspx	Daily	2008 to present	State, Territory, County, Zip Code, Agency
WIA and WIOA Performance Reports	U.S. Department of Labor	https://www.doleta.gov/performance/results/eta_default.cfm#wiasrdQuarterly	Unclear	Quarterly, Annual	State, Nation
Workforce Insight (\$)	Economic Modeling Systems Inc	http://www.economicmodeling.com/workforce-insight/	Unknown	Unknown	Unknown

APPENDIX A: DATA SOURCES

State Data Sources

Many of the data sources in the previous section do not include data for local areas. Often this data can be acquired through state agencies and organizations. There is not space in this toolkit to list all of them, but the types of organizations are listed below.

- [State Labor Market Information offices](#)
- State Unemployment Claimant Data
- State Education Data
- State Approved Training Provider lists
- State Health Departments

Local Data Sources

Some very specific data can only be collected through talking directly with local agencies, organizations, and service providers. These include, but are not limited to:

- Local workforce development service providers
- Local literacy service providers
- Local public schools
- Local health departments
- Local primary data collection with job seekers, employers, education and training providers, and other stakeholders

APPENDIX B: DATA COLLECTION, ANALYSIS, AND REPORTING

While this is not meant to be a guide for how to collect, analyze, and report data, we have included a few tips and resources in this section to help unfamiliar users get started.

Ethics

A critical component of data collection, analysis, and reporting is ensuring that you are paying attention to ethics and appropriate research methods. This includes, but is not limited to, using ethical and culturally responsive data collection principles, protecting data collected appropriately (especially primary data), citing data responsibly, and reporting data in a just manner (not misleading or editing data collected to meet your needs).

Some resources on ethics include:

[American Evaluation Association Guiding Principles for Evaluators](#)

[American Evaluation Association Statement on Cultural Competence in Evaluation](#)

[Better Evaluation](#)

This website is a resource for evaluators. However, it provides resources that would benefit a variety of users on collecting, storing, analyzing, and reporting data, including ethics and quality standards.

[Cultural Competence in Research, Annotated Bibliography, Harvard Catalyst and the Harvard Clinical and Translational Science Center](#)

This annotated bibliography documents many papers and sources dedicated to conducting culturally competent research.

[Resources for Research Ethics Education](#)

This source is aimed at those teaching research ethics. It contains a helpful description and resources for a variety of research ethics topics.

Data Collection

If your intention is to collect primary research or conduct a comprehensive workforce development system scan, and your team does not have research expertise on staff, then it is best to engage another entity (please see suggestions at the front of the toolkit).

However, for smaller scale projects, there are many research method books and online resources dedicated to helping users collect data ethically and responsibly. Some online resources include:

[Better Evaluation](#)

This website is a resource for evaluators. However, it provides resources that would benefit a variety of users on collecting, storing, analyzing, and reporting data, including ethics and quality standards.

[PEW Research Questionnaire Design](#)

This reference reviews how to create a survey.

[W.K. Kellogg Foundation Evaluation Handbook](#)

This handbook is geared toward conducting evaluations. It documents data collection methods and provides other relevant advice for many types of research.

APPENDIX B: DATA COLLECTION, ANALYSIS, AND REPORTING

Data Analysis

If your intention is to conduct new or more in-depth analyses than your staff is familiar with, then it is best to engage another entity (please see suggestions at the front of the toolkit).

For those interested in expanding their analysis capacity and for suggestions on workforce data analysis training, below are some resources.

[Chicago Jobs Council](#)

The Chicago Jobs Council offers a variety of trainings, including trainings on using, finding, and understanding program and labor market data.

[The Council for Community and Economic Research \(C2ER\)](#)

C2ER offers training, including Labor Market Information Analyst training.

[The Labor Market Institute](#)

The LMI Institute offers comprehensive training for professionals using LMI data.

[Workforce Professionals Training Institute \(WPTI\)](#)

WPTI offers many different workforce trainings, including training on using and understanding Labor Market Intelligence data.

Data Reporting and Visualization

Interpreting and reporting data is a critical step in the process—the data that you collect is only as useful as the meaning that you make from it. It is important to tell a story, use appropriate data visualization and reporting mediums for your target audience, and to report data ethically and using culturally responsive best practices.

One other reporting note: your interpretation of the data collected is only one view. What do others in the community notice when examining the data? Including the perspectives of the community you are working with and key stakeholders will make your report more credible and engaging.

There are many online resources for data visualization. Some resources include:

Data Visualization

[Ann K. Emery](#)

Ann Emery provides data visualization and design tips on her website, and she also provides more in-depth instruction through webinars, workshops, and events.

[Dark Horse Analytics, Clear Off the Table](#)

This article has a short gif that shows a clear way to present data in a table.

[Picturing the Workforce: Considerations for Effectively Presenting Data, Workforce Data Quality Campaign](#)

This resource is specifically designed for workforce data and for communicating effectively with workforce development audiences to inspire change.

APPENDIX B: DATA COLLECTION, ANALYSIS, AND REPORTING

[Potent Presentations, the American Evaluation Association](#)

This resource was created for the American Evaluation Association conferences. However, the guidelines they present are widely applicable.

[Stephanie Evergreen](#)

Stephanie Evergreen has written two books on data visualization — *Presenting Data Effectively: Communicating Your Findings for Maximum Impact* and *Effective Data Visualization: The Right Chart for the Right Data*. Her website and blog also have helpful tips on selecting the right charts for your data, making charts in Microsoft Excel, and presenting your data effectively. She also provides other learning opportunities, including a Data Academy. Some favorite resources include:

- [Data Visualization Checklist](#)
- [Qualitative Chart Chooser](#)

Creating Infographics

[13 Incredible Tools for Creating Infographics](#)

This article lists free resources for users interested in creating infographics.

[Pretty and Pretty Useful: How to Create Awesome Infographics, Vision Critical](#)

This article was written for marketing purposes but still contains helpful infographic design advice.



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