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Three Rivers

Workforce Investment Area

Career Pathways for Adults

Pennsylvania Department of Education
Bureau of Postsecondary and Adult
Education Division of Adult Education

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Section 1: Career Pathways

Introduction to Career Pathways

According to the *ABE Career Connections: A Manual for Integrating Adult Basic Education into Career Pathways* (MPR Associates, 2010),

> ABE pathways focus on the educational and employment needs of adults by offering: '… a series of connected education and training programs and support services that enable individuals to secure employment within a specific industry or occupational sector, and to advance over time to successively higher levels of education and employment in that sector (Jenkins 2006, p.6).' (p. 7, para. 3)

This resource contains career pathway maps for three targeted industries in Pennsylvania: Natural Gas, Manufacturing, and Healthcare. We also have included career pathway maps for the Hospitality and Retail industries. These maps are visual representations of potential career pathways within specific industry sectors. Regional information is included in customized documents for each of the following targeted Workforce Investment Areas (WIAs): Lehigh Valley, Luzerne-Schuylkill, Northern Tier, Northwest, Southern Alleghenies, Southwest Corner, Three Rivers, and Westmoreland-Fayette. Where available, the career pathway maps contain the following information: Job Title, Salary, Annual Openings, Job Growth, Required Education and Certifications, and Educational Institutions.

Using Career Pathway Maps

As adult education providers move their programs toward or expand existing career pathways activities, program staff—most often case managers and teachers—can use career pathway maps in various ways to support these changes in their basic skills, and career awareness and development classes. Case managers, for example, can use career pathway maps with students to 1) inform students of the variety of occupations available within an industry and the salary they can expect, 2) help them understand the education and experience needed to enter employment within a potential industry, and 3) gain a perspective on the additional education and experience needed to move up a career ladder once employed within an industry. Although these career pathway maps focus on the entry-level positions, they show potential pathways that students could follow to advance to higher-level positions with an employer. Case managers as well as teachers also could use these career pathway maps to help students set short- and long-term educational and employment goals.

The Center for American Progress recently reported that promising career development programs incorporate the following key features:

- Tailor services to local labor market trends, which enables the programs to provide the most relevant and useful career information
- Tailor services to individual clients' specific needs—covering a broad range of education and training levels
- Form local partnerships with community-based organizations, colleges, and employers (Choitz, Soares, & Pleasants, 2010, p. 3).

Adult education providers can use career pathway maps as a strategy for incorporating these key features in their programs through career awareness and development, and basic skills development classes. For example, teachers can use the maps to guide students through the process of researching current and projected local labor market trends to be considered, among other factors, when making career decisions. As teachers become better acquainted with students' interests and educational needs, they routinely consider which lessons are appropriate for students' levels, selecting and modifying them accordingly. Once teachers can tailor plans and materials further to accommodate students' full range of education and training levels, they can show how the skills being taught in the classroom align with the occupational skill requirements of the local jobs. Case managers and teachers can explore the resources available through their local PA CareerLink® and colleges or other postsecondary education institutions for additional opportunities. They might also contact local unions or employers to organize a career fair or guest speakers' panel—or work with their PA CareerLink® operators to involve students in these activities, integrating basic skills development and application into the experience. Community-based organizations might provide support services to help students achieve their short- and long-term goals.

As in any class, instruction related to career awareness and development should start at the lowest level of skill competencies and build on prior knowledge. When creating lesson plans, ensure that all students have the basic foundational competencies required for the workplace. Then, focus on the industry specific topics. Once students have an understanding of the workplace and the targeted industry, instruction can move into occupation specific topics. The goal is to increase awareness of the workplace, broaden awareness to targeted industries, and then the various occupations or opportunities available within an industry. Teachers should help students to make informed decisions and bring awareness to the educational and career opportunities available along various career paths. Finally, career pathways teachers should not be teaching students how to do the jobs being explored. Employers expect employees to come prepared with basic workplace and academic skills necessary to be a good employee. Employers also expect them to have a basic understanding of the industry and the occupations

that have job openings. They will train employees on how to perform the job for which they are hired.

In the career awareness and development class example above, teachers are encouraged to engage students in research on local labor market trends. This research provides a work-focused context in which students can apply and practice communication, math, and critical thinking skills. As such, teachers can review and discuss a career map in class, incorporating opportunities to build reading comprehension, vocabulary development, and/or math skills. Students might then apply those skills in researching the local labor market to identify potential employers and employment requirements. They may be able to identify potential openings, On-the-Job Training (OJT) opportunities, and career ladders/lattices within a company. If students have past experience, teachers could use the career pathway maps to show where their experience might allow them to enter at a higher level with an employer. Based on the information that students collect on possible careers and employment, teachers might plan additional activities to further develop and apply basic skills. For example, teachers might have students read more in-depth information about a selected company with local job openings and then develop several questions to ask at a potential job interview to show knowledge about the company's work. Finally, teachers should stress to students that, as potential employees, they will be expected to continue to upgrade their skills if they expect to be promoted or apply for a higher-level position along a career path.

According to the *Career Ladder/Lattice General Instructions* found on the CareerOneStop website (U.S. Department of Labor, 2011b),

> Career ladders and lattices consist of a group of related jobs that comprise a career. They often include a pictorial representation of job progression in a career…as well as detailed descriptions of the jobs and the experiences that facilitate movement between jobs.…Career ladders display only vertical movement between jobs. In contrast, career lattices contain both vertical and lateral movement between jobs and may reflect more closely the career paths of today's work environment. (para. 2-3)

As can be seen in this description of career ladders and lattices, career pathway maps are not the only way to think about career development. Teachers also should explore and incorporate these other resources to support the career pathways model. For example, The U.S. Department of Labor, Employment and Training Administration has developed the *Competency Model Clearinghouse* which offers a *Career Ladder/Lattice Tool* that can be helpful in developing industry career paths. Employers, educators, and workforce professionals can use this tool as well as The U.S. Department of Labor's *Building Blocks for Competency Models Tool*

to create materials and outline “careers and the critical experiences individuals should acquire in order to progress through careers in an industry” (U.S. Department of Labor, 2011b, para. 1).

The following explains the Building Blocks for Competency Models found on the U.S. Department of Labor’s (2011d) CareerOneStop website:

> The Building Blocks for Competency Models consist of a set of "building blocks" for competency model development. These "building blocks" are arranged in nine tiers with each tier containing a set of related competencies. The arrangement of the tiers in a pyramidal shape represents the increasing level of specificity and specialization of content. As a user moves up through the various tiers of the model, the competencies become specific to certain industries and/or occupations. The nine tiers are grouped into three categories:

Occupation-Related Competencies
Tier 9 – Management Competencies
Tier 8 – Occupation-Specific Requirements
Tier 7 – Occupation-Specific Technical Competencies
Tier 6 – Occupation-Specific Knowledge Competencies

Industry-Related Competencies
Tier 5 – Industry-Sector Technical Competencies
Tier 4 – Industry-Wide Technical Competencies

Foundational Competencies
Tier 3 – Workplace Competencies
Tier 2 – Academic Competencies
Tier 1 – Personal Effectiveness Competencies

Foundational Competencies

At the base of the model, Tiers 1 through 3 represent competencies that provide the foundation for success in school and in the world of work. Foundational competencies are essential to a large number of occupations and industries. Employers have identified a link between foundational competencies and job performance and have also discovered that foundational competencies are a prerequisite for workers to learn industry-specific skills.

Industry-Related Competencies

The competencies shown on Tiers 4 and 5 are referred to as Industry Competencies and are specific to an industry or industry sector. Industry-wide technical competencies cut

across industry sub-sectors making it possible to create career lattices where a worker can move easily across industry sub-sectors. Rather than narrowly following a single occupational career ladder, this model supports the development of an agile workforce.

Occupation-Related Competencies

The competencies on Tiers 6, 7, 8, and 9 are referred to as Occupational Competencies. Occupational competency models are frequently developed to define performance in a workplace, to design competency-based curriculum, or to articulate the requirements for an occupational credential such as a license or certification. (para. 2-8)

When integrating career awareness into instruction, students should be made aware of the following job information fields. The descriptions, found on the U.S. Department of Labor's CareerOneStop website, could be used as lesson topics or discussion topics in class. Teachers could use the descriptions to compare and contrast employer expectations, and the differences between industries and/or occupations.

Job Title	A designation that indicates an individual's official position in an organization. A job title often indicates an individual's authority and responsibilities as well as the activities and duties performed.
Job Level	Job level indicates position of a particular job within an organization or industry. Some examples of job levels are entry-level, mid-level, management-level, executive-level, or entrepreneur.
Job Description	A job description is a statement of the work performed in a job, how that work is accomplished, and why the work is performed. Job descriptions can include information regarding job tasks as well as the tools and technology used to perform tasks.
Perform Supervisory Duties?	Some jobs have a supervisory component that is not explicit in their list of tasks. Other jobs clearly list supervisory duties among tasks. A supervisor is responsible for the day-to-day actions of a group of employees and represents employee issues to higher level management.
Education	Most organizations have specific education requirements an individual must fulfill in order to be considered qualified for a position. Educational requirements vary by the organization and the type of job but some examples include a high school diploma, some college, post-secondary certificate, and Master's degree.
Workforce Preparation	Most jobs have specific training requirements an individual must fulfill to be considered proficient at a job. Many different types of training exist; some types are apprenticeship training, on-the-job training, and in-plant training.
Duration	Training requirements for jobs can vary widely in duration. Some formal training programs can last more than 10 years while others can last less than one month.

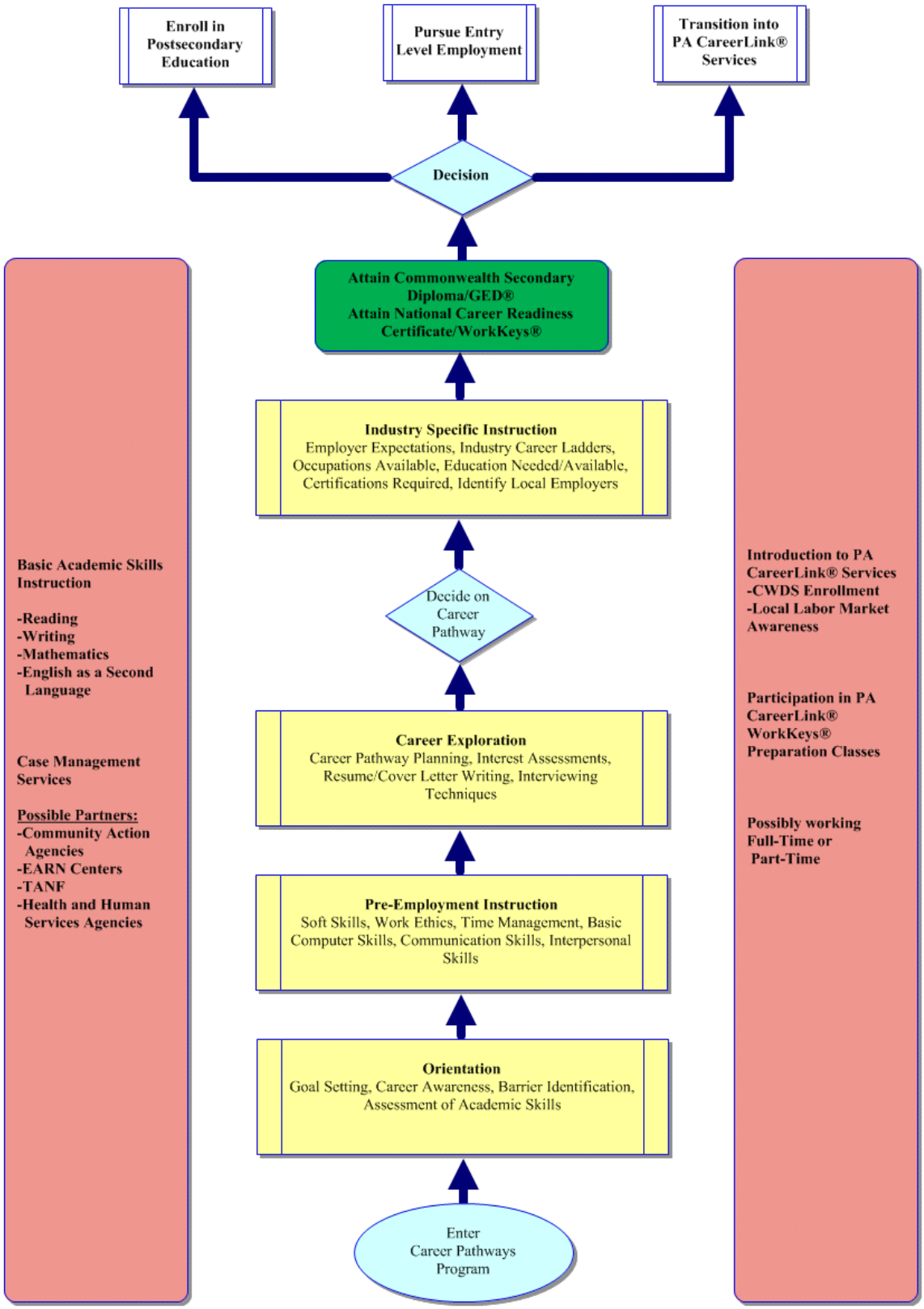
Work Experience	Work experience is the know-how an individual gains when working in a job. Some employers expect individuals to have prior work experience in a related job to be considered for a position.
Can work experience and education substitute for each other?	While some employers may establish both work experience and educational requirements, other employers may accept work experience in lieu of an educational requirement or vice versa. For example, one job may require both a Master's degree **and** 5 years of related work experience while another job may accept **either** a Master's degree with no related work experience **or** a Bachelor's degree with 5 years of related work experience.
Licensure	Licensure is a state's grant of legal authority to practice the profession within a designated scope of practice. Licensure prohibits anyone from practicing a profession who is not licensed, regardless of whether the individual has been certified by a private organization.
Certification	Certification is an often voluntary process where individuals meet established standards to demonstrate their competence, experience, knowledge and skill in a particular profession or occupation to employers and the public.
Salary/Wages	Salary is the amount of gross income a job provides for one year. If salary information is unavailable you can also record hourly wage estimates. A wage is the amount of income a job provides that is received on an hourly, daily, or weekly basis.
Employment Outlook	Employment outlook is an estimation of future growth of an occupation. Employment outlook can be represented by employment increase in number of jobs (employment in 2006 = 3,800 and estimated employment in 2016 = 4,830) or percentage of growth increase (27% percent increase in employment from 2006 to 2016).
References	Record resources and/or notes you may need when revising or updating this career ladder/lattice. For example, copy and paste searched job titles and related codes as well as links to Web sites used to complete the job information fields.

(U.S. Department of Labor, 2011c, Appendix A)

Career Pathways Program Map

The *Career Pathways Program Map* (Hardy, 2011a) illustrates the steps students might follow as they work through the services of a career pathways program. Along the career pathway, they may participate in various services; however, the goal for any career pathways student is transition to postsecondary education, entry-level employment, or additional PA CareerLink® Services.

Career Pathways Program Map



Section 2: Natural Gas Industry

Overview of the Natural Gas Industry

According to the Natural Gas Supply Association (2011) website,

> The process of getting natural gas out of the ground, and to its final destination to be used, is a complicated one. There is a great deal of behind-the-scenes activity that goes into delivering natural gas to your home, even though it takes only the flick of a switch to turn it on….[There are many steps involved] that allow the natural gas industry to get their product out of the ground, and transform it into the natural gas that is used in your homes and in industry.
>
> - The Exploration section outlines how natural gas is found, and how companies decide where to drill wells for it.
> - The Extraction section focuses on the drilling process, and how natural gas is brought from its underground reservoirs to the surface.
> - The Production section discusses what happens once the well is drilled, including the processing of natural gas once it is brought out from underground.
> - The Transport section outlines how the natural gas is transported from the wellhead and processing plant, using the extensive network of pipelines throughout North America.
> - The Storage section describes the storage of natural gas, how it is accomplished, and why it is necessary.
> - The Distribution section focuses on the delivery of natural gas from the major pipelines to the end users, whoever they may be.
> - The Marketing section discusses the role that natural gas marketers play in getting the gas from the wellhead to the end user. (para.1)

Pennsylvania Partnerships

According to the ShaleNet (2011) website, "Marcellus ShaleNET is a coalition between Westmoreland County Community College [WCCC] (lead agency) and Pennsylvania College of Technology [Penn College], West Virginia Northern Community College, Eastern Gateway Community College in Ohio, and Broome Community College in New York" (para. 1).

The mission of the coalition is

> To design a comprehensive recruitment, training, placement, and retention program for high priority occupations in the natural gas drilling and production industry. With WCCC serving as the western hub and Penn College serving as the eastern hub, ShaleNET brings Workforce Investment Boards, their One Stops, industry, and training providers

> together to build a Marcellus-wide industry-recognized uniform training and certification program aggregating and augmenting existing curricula and adopting best practices as identified. This effort is funded by a three-year, $4.9 million grant from the United States Department of Labor, Employment and Training Administration. (ShaleNet, 2011, para. 2-3)

The Marcellus Shale Education & Training Center (MSETC, 2011) is

> a collaboration between Pennsylvania College of Technology and Penn State Cooperative extension to provide a wide variety of resources to the community and the oil-and-gas industry. Central operations are located in the Center for Business & Workforce Development on the main campus of Pennsylvania College of Technology in Williamsport. Additional facilities utilized for specific needs include Penn State Cooperative Extension offices, Penn College's North Campus in Wellsboro, and various Penn State campus locations.

Progression of Education and Training

In order for the natural gas industry to function, a wide array of people with a variety of educational backgrounds and experience must be available. Many occupations within the natural gas industry require higher levels of education; however, many of the entry-level jobs only require a high school diploma or equivalent. Once hired, employees will receive extensive on-the-job training.

- High School Diploma or Commonwealth Secondary School Diploma/GED
- National Career Readiness Certificate/WorkKeys®
- Fit4 Natural Gas community college training
- Postsecondary Vocational Training
- Nationally Recognized Certificates
- Associate Degree
- Bachelor of Science Degree
- Master of Science Degree

Certifications

Employees in this industry are not always required to have the certifications listed below to be hired. However, many employers do require employees to attain them within a specified timeframe. To help potential employees in the area, the Fit4 Natural Gas training, offered through ShaleNET, allows individuals the opportunity to get these certifications and occupational training prior to employment.

- OSHA Rough Terrain Forklift

- PEC/Premier Basic SafeLand USA Orientation
- Defensive Driver Certification from the Centre for Transportation Safety
- Certified Operations Technician for the Oil & Gas Industry from the Gas Technology Institute
- American Heart Association's First Aid & CPR
- Oilfield Heavy Equipment Safety

Support Services

The following organizations may provide educational opportunities, career counseling, academic support, financial aid, and case management services to support job attainment and career advancement.

- Adult Education Programs
- Career and Technical Centers
- Community Action Agency
- Community Colleges, Higher Education, and Private Schools
- Health and Human Service Agencies
- PA CareerLink®

Career Pathway Maps

Many possible career paths are available in the natural gas industry. This document contains three career pathway maps related to natural gas industry in the Three Rivers WIA:

- *Three Rivers WIA Natural Gas Extraction Career Pathway Map* (Hardy, 2011e)
- *Three Rivers WIA Transportation Career Pathway Map* (Hardy, 2011g)
- *Three Rivers WIA Welding Career Pathway Map* (Hardy, 2011h)

Natural Gas Extraction
Three Rivers WIA

Information contained in this career pathways map is specific to this Workforce Investment Area. Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction
-academic preparation for entry into Fit4Natural Gas program

Fit4Natural Gas program available through:
-Westmoreland County Community College

Postsecondary Education available through:
-Community College of Allegheny County
-Forbes Road Career and Technology Center
-Western Area Career and Technology Center

FIT4 Natural Gas

Natural Gas Industry Specific Curriculum
> Roustabout
> Floor hand
> Production Technician
> CDL
> Welding

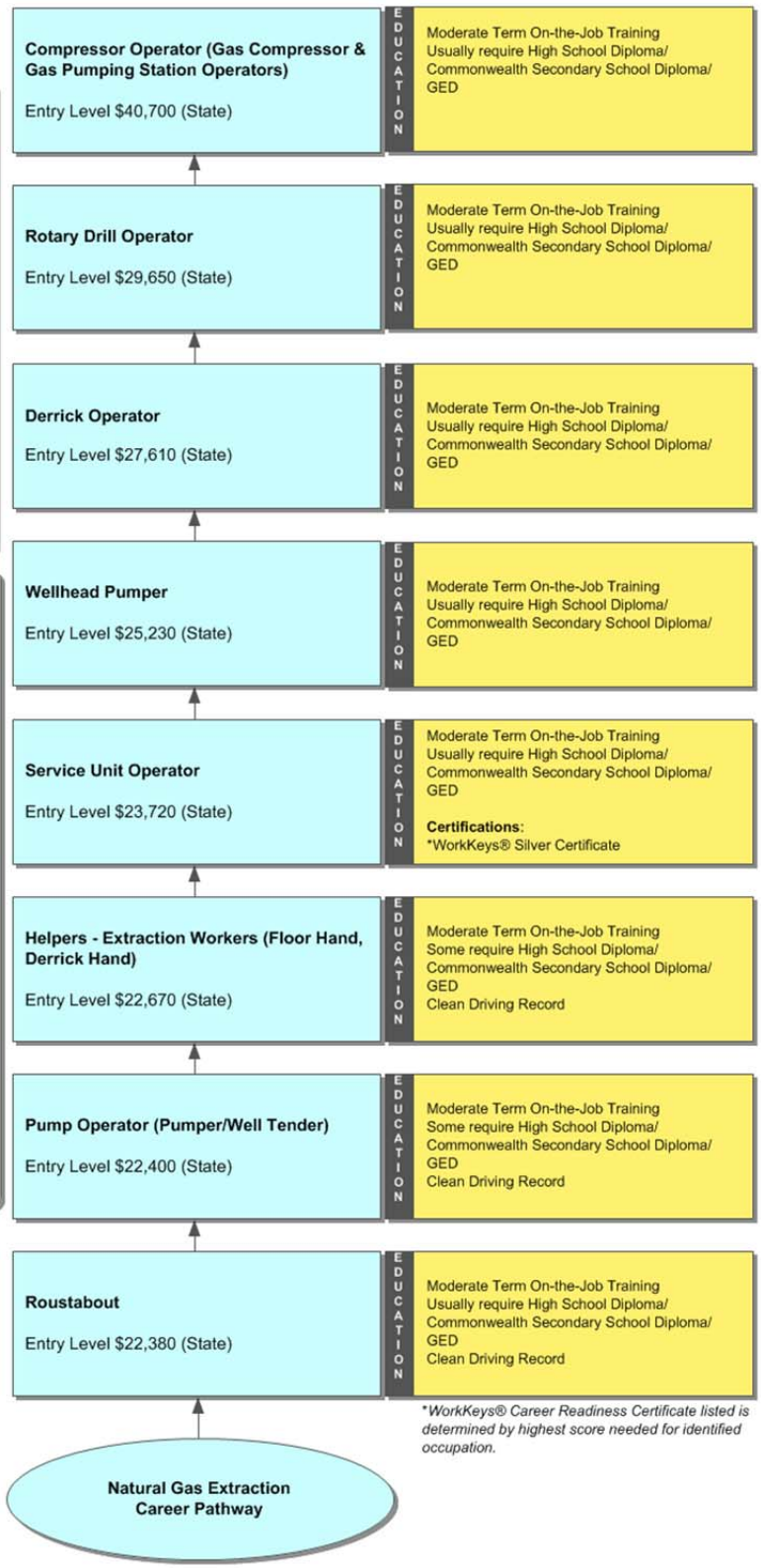
Industry Specific Training Certifications:
> OSHA Rough Terrain Forklift
> PEC/Premier Basic SafeLand USA Orientation
> Defensive Driver Certification from the Center for Transportation Safety
> Certified Operations Technician for the Oil & Gas Industry from the Gas Technology Institute
> American Heart Association First Aid & CPR
> Oilfield Heavy Equipment Safety

Career Coaching

Employment Preparation
> Earn a WorkKeys® Career Readiness Certificate

Employer Networking

Sources of Information:
-ACT®, Inc. (2011). WorkKeys Scores Needed by Jobs. http://www.act.org/workkeys/skillsearch.html
-PA CareerLink® Bradford County
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011a). 2011 High priority occupations for Three Rivers WIA region. Retrieved from http://www.paworkstats.state.pa.us/gsipub/index.asp?docid=504
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011b). Labor Market Information System. Retrieved from https://paworkstats.geosolinc.com
-U.S. Department of Labor, Employment and Training Administration. (2011). CareerOneStop, Retrieved from http://www.careeronestop.org
-U.S. Department of Labor, Employment and Training Administration. (2011). O*Net Online. Retrieved from: http://www.onetonline.org



Transportation
Three Rivers WIA

Information contained in this career pathways map is specific to this Workforce Investment Area. The information contains projections of anticipated openings, entry level salary, and job growth. Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction

CDL training available through:
-Pittsburgh Diesel Institute
-PIA Truck Driving School
-Swanson Driving School

Transportation Career Pathway

Truck Drivers, Heavy or Tractor-Trailer
Entry Level $25,710
Annual Openings 123 Increase 6%

EDUCATION: Short Term On-the-Job Training
Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record
Certifications: Class A CDL, May require hazmat & tanker endorsements
*WorkKeys® Gold Certificate

Industrial Truck and Tractor Operators
Entry Level $21,950
Annual Openings 50 Decrease -4.52%

EDUCATION: Short Term On-the-Job Training
Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record
Certifications: Class B CDL, May require hazmat & tanker endorsements
*WorkKeys® Silver Certificate

Refuse & Recyclable Material Collectors
Entry Level $20,800
Annual Openings 11 Decrease -4.76%

EDUCATION: Short Term On-the-Job Training
Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record
Certifications: Class B CDL, May require hazmat & tanker endorsements
*WorkKeys® Bronze Certificate

Truck Drivers, Light or Delivery Services
Entry Level $19,900
Annual Openings 81 Decrease -.66%

EDUCATION: Short Term On-the-Job Training
Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record
Certifications: Class B CDL, May require hazmat & tanker endorsements
*WorkKeys® Silver Certificate

Bus Drivers, School
Entry Level $17,550
Annual Openings 47 Increase .5%

EDUCATION: Short Term On-the-Job Training
Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record
Certifications: Class B CDL

Laborers and Freight, Stock, and Material Movers, Hand
Entry Level $17,420
Annual Openings 295 Decrease -.5%

EDUCATION: Short Term On-the-Job Training
Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record
Certifications: Skid Steer Safety Certification

Driver/Sales Worker
Entry Level $15,750
Annual Openings 37 Decrease -9.13%

EDUCATION: Short Term On-the-Job Training
Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record

*WorkKeys® Career Readiness Certificate listed is determined by highest score needed for identified occupation.

Sources of Information:
-ACT®, Inc. (2011). WorkKeys Scores Needed by Jobs. http://www.act.org/workkeys/skillsearch.html
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011a). 2011 High priority occupations for Three Rivers WIA region. Retrieved from http://www.paworkstats.state.pa.us/gsipub/index.asp?docid=504
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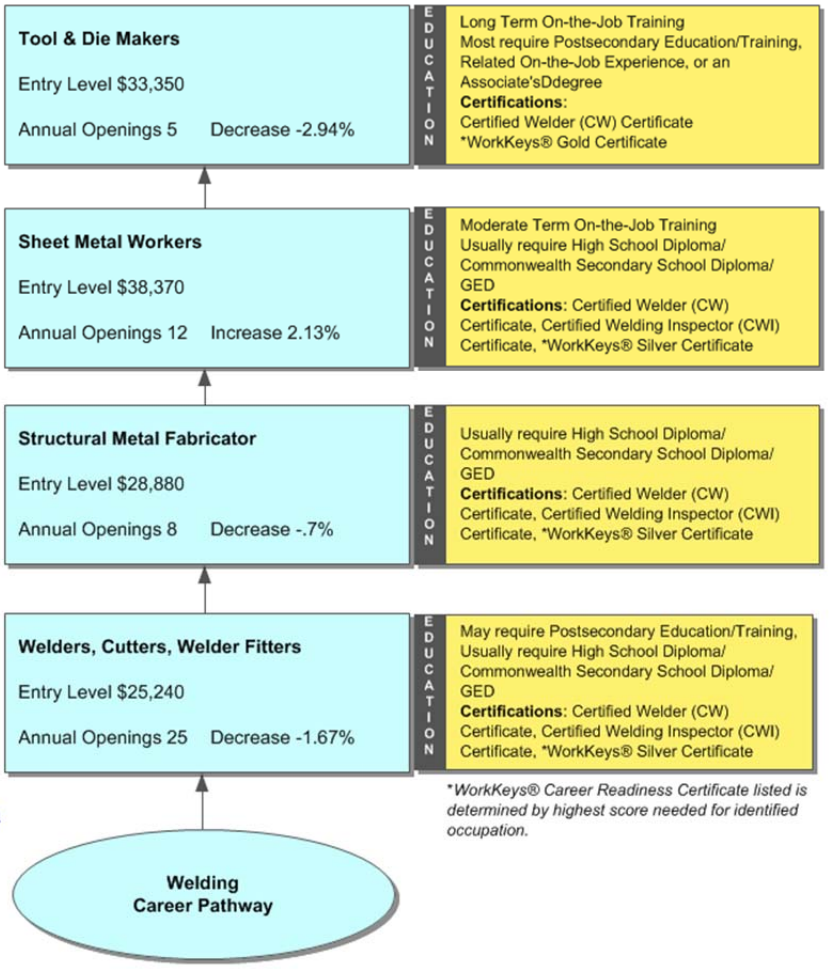
-U.S. Department of Labor, Employment and Training Administration. (2011). CareerOneStop. Retrieved from http://www.careeronestop.org
-U.S. Department of Labor, Employment and Training Administration. (2011). O*Net Online. Retrieved from: http://www.onetonline.org

Welding
Three Rivers WIA

Information contained in this career pathways map is specific to this Workforce Investment Area. The information contains projections of anticipated openings, entry level salary, and job growth. Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction

Postsecondary Education available through
-A. W. Beattie Career Center
-Community College of Allegheny County
-Dean Institute of Technology
-Triangle Tech



**WorkKeys® Career Readiness Certificate listed is determined by highest score needed for identified occupation.*

Sources of Information:
-ACT®, Inc. (2011). WorkKeys Scores Needed by Jobs. http://www.act.org/workkeys/skillsearch.html
-American Welding Society. http://www.aws.org/w/a/
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011a). 2011 High priority occupations for Three Rivers WIA region. Retrieved from http://www.paworkstats.state.pa.us/gsipub/index.asp?docid=504
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011b). Labor Market Information System. Retrieved from https://paworkstats.geosolinc.com
-U.S. Department of Labor, Employment and Training Administration. (2011). CareerOneStop. Retrieved from http://www.careeronestop.org
-U.S. Department of Labor, Employment and Training Administration. (2011). O*Net Online. Retrieved from: http://www.onetonline.org

Section 3: Manufacturing Industry

Overview of the Manufacturing Industry

According to the U.S. Department of Labor's (2010c) Industries at a Glance,

> 'The manufacturing sector comprises establishments engaged in the mechanical, physical, or chemical transformation of materials, substances, or components into new products. Establishments in the Manufacturing sector are often described as plants, factories, or mills and characteristically use power-driven machines and materials-handling equipment. However, establishments that transform materials or substances into new products by hand or in the worker's home and those engaged in selling to the general public products made on the same premises from which they are sold, such as bakeries, candy stores, and custom tailors, may also be included in this sector. Manufacturing establishments may process materials or may contract with other establishments to process their materials for them. Both types of establishments are included in manufacturing (North American Industry Classification System).' (para. 1-2)

Pennsylvania Partnerships

- The Pennsylvania Center for Advanced Manufacturing Careers (PCAMC)
- Pennsylvania Center for Green Careers
- Industrial Resource Centers
- Regional Career and Education Partnerships
- Regional Manufacturing Industry Partnerships

Progression of Education and Training

There are many occupations within the manufacturing industry that require higher levels of education; however, there are many that only require a high school diploma or equivalent. Most occupations in the manufacturing industry require employees to participate in continuous on-the-job training.

- High School Diploma or Commonwealth Secondary School Diploma/GED
- High school career center program articulated with community college industrial training
- National Career Readiness Certificate/WorkKeys®
- Postsecondary Vocational Training
- Nationally Recognized Certificates
- Associate Degree
- Bachelor of Science Degree
- Master of Science Degree

Certifications

The National Association of Manufacturers (NAM, 2011) endorses the Manufacturing Skills Certification System which validates the skills and competencies of incoming workers for meeting the demands of the manufacturing business.

These are nationally-portable, industry recognized certifications endorsed:

- **For Work Ready Candidates**
  - National Career Readiness Certificate (NCRC) issued by ACT (Bronze, Silver, Gold, Platinum)
  - NCRC Plus (Skill Categories include: Work Discipline, Teamwork, Managerial Potential, Customer Service Orientation)
- **For Certified Production Technicians**
  - The Manufacturing Skill Standards Council's (MSSC) Certified Production Technician (CPT) - (Credentialed Assessments in: Safety, Quality Practices & Measurement, Manufacturing Processes & Production, and Maintenance Awareness)
- **For Certified Machinists and Metalformers**
  - National Institute of Metalworking Skills (NIMS) - Certifications range from entry level to master level, stackable credentials in the following areas: Machining, Metalforming, Stamping, Press Brake, Slide Forming, Screw Machining, Die Making, Machine Building, & Machine Maintenance, Service, and Repair
- **For Certified Welders**
  - American Welding Society (AWS) Certified Welder Certifications
- **For Certified Technologists and Engineers**
  - Society of Manufacturing Engineers (SME) - The Certified Manufacturing Technologist (CMfgT) and The Certified Manufacturing Engineer (CMfgE)

Support Services

The following organizations may provide educational opportunities, career counseling, academic support, financial aid, and case management services to support job attainment and career advancement.

- 2+2+2 Leadership Grant Network
- Adult Education programs
- Apprenticeship Programs
- Career and Technical Centers
- Community Action Agency

- Community Colleges, Higher Education, and Private Schools
- Health and Human Service Agencies
- PA CareerLink®

Career Pathways Maps

There are many possible career paths available with the manufacturing industry. This document contains the following examples related to manufacturing in the Three Rivers WIA:

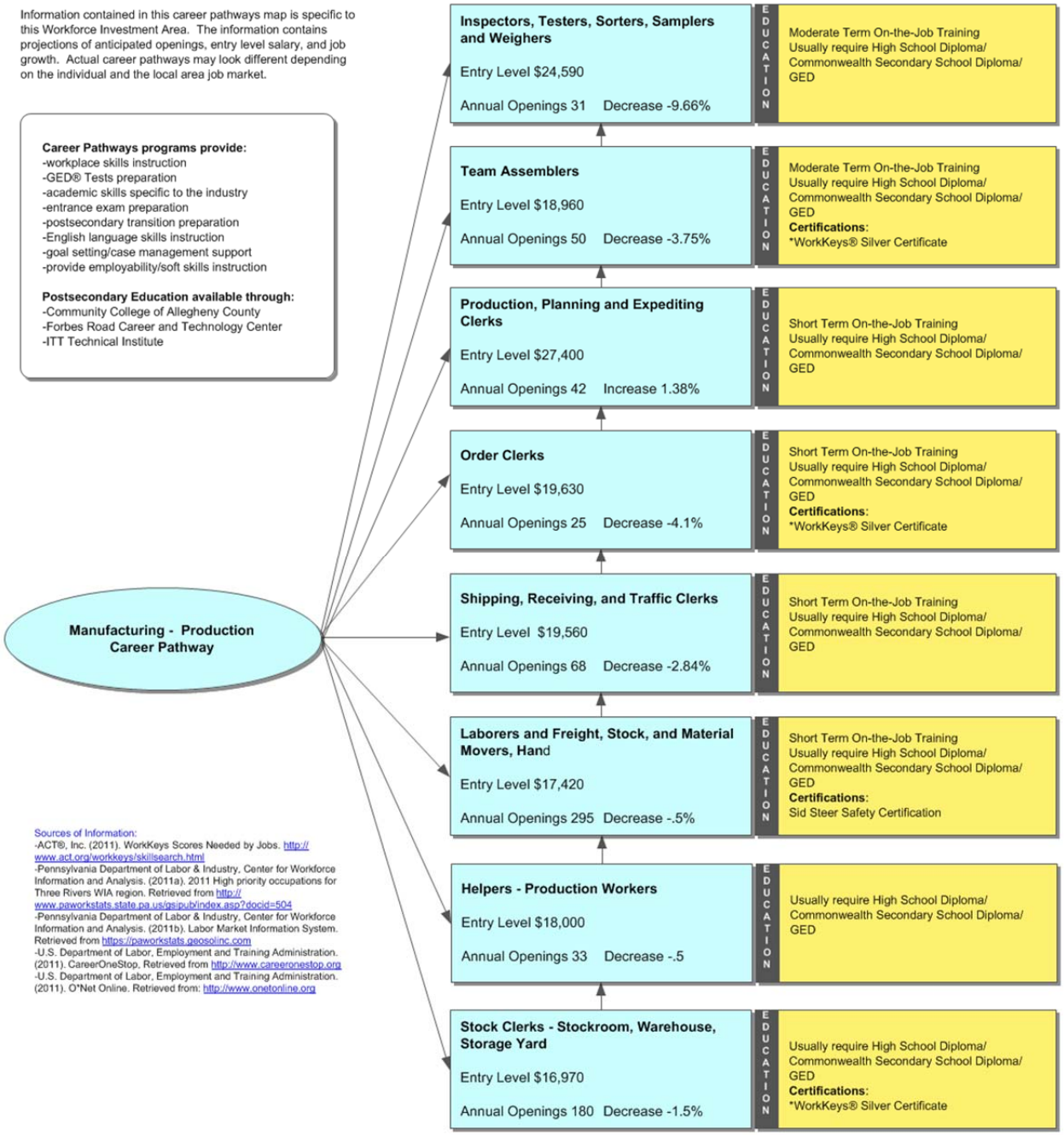
- *Three Rivers WIA Production Career Pathway Map* (Hardy, 2011f)
- *Three Rivers WIA Maintenance Career Pathway Map* (Hardy, 2011c)
- *Three Rivers WIA Metal and Plastic Career Pathway Map* (Hardy, 2011d)
- *Three Rivers WIA Welding Career Pathway Map* (Hardy, 2011h)
- *Three Rivers WIA Transportation Career Pathway Map* (Hardy, 2011g)

Manufacturing - Production
Three Rivers WIA

Information contained in this career pathways map is specific to this Workforce Investment Area. The information contains projections of anticipated openings, entry level salary, and job growth. Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction

Postsecondary Education available through:
-Community College of Allegheny County
-Forbes Road Career and Technology Center
-ITT Technical Institute



**WorkKeys® Career Readiness Certificate listed is determined by highest score needed for identified occupation.*

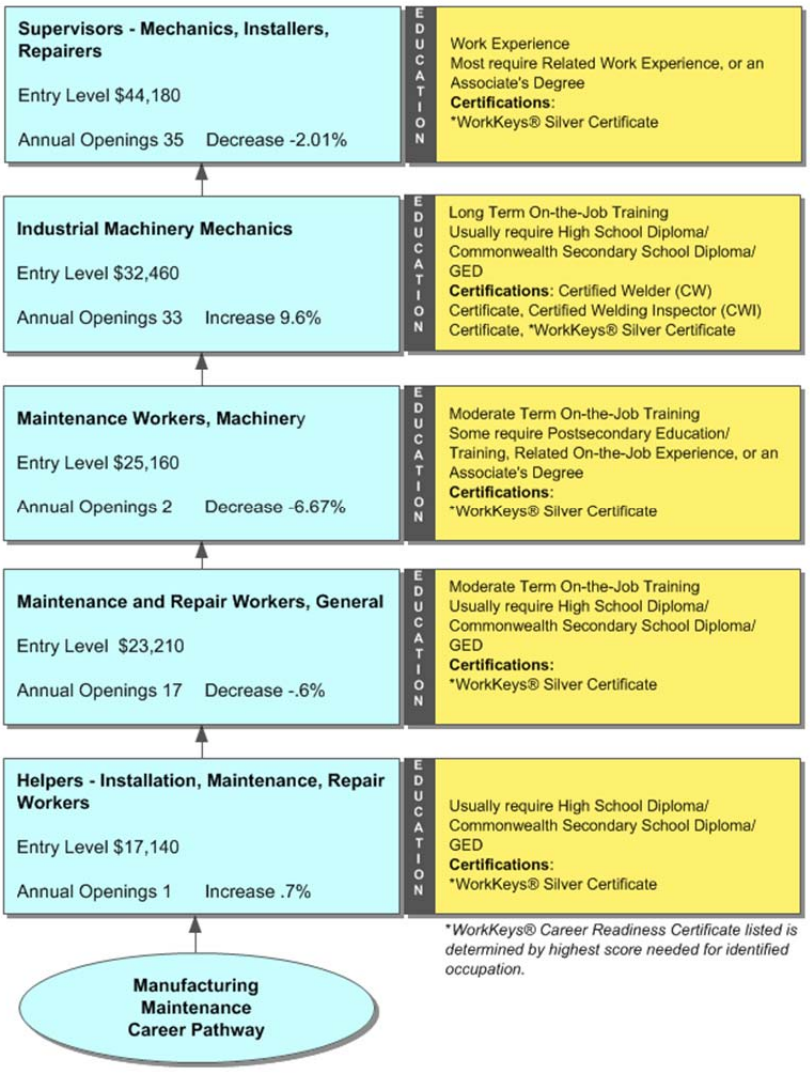
Sources of Information:
-ACT®, Inc. (2011). WorkKeys Scores Needed by Jobs. http://www.act.org/workkeys/skillsearch.html
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011a). 2011 High priority occupations for Three Rivers WIA region. Retrieved from http://www.paworkstats.state.pa.us/gsipub/index.asp?docid=504
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011b). Labor Market Information System. Retrieved from https://paworkstats.geosolinc.com
-U.S. Department of Labor, Employment and Training Administration. (2011). CareerOneStop. Retrieved from http://www.careeronestop.org
-U.S. Department of Labor, Employment and Training Administration. (2011). O*Net Online. Retrieved from: http://www.onetonline.org

Manufacturing - Maintenance
Three Rivers WIA

Information contained in this career pathways map is specific to this Workforce Investment Area. The information contains projections of anticipated openings, entry level salary, and job growth. Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction

Postsecondary Education available through:
-Community College of Allegheny County



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-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011b). Labor Market Information System. Retrieved from https://paworkstats.geosolinc.com
-U.S. Department of Labor, Employment and Training Administration. (2011). CareerOneStop. Retrieved from http://www.careeronestop.org
-U.S. Department of Labor, Employment and Training Administration. (2011). O*Net Online. Retrieved from: http://www.onetonline.org

Manufacturing - Metal and Plastic Three Rivers WIA

Information contained in this career pathways map is specific to this Workforce Investment Area. The information contains projections of anticipated openings, entry level salary, and job growth. Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction

Postsecondary Education available through:
-Community College of Allegheny County
-Forbes Road Career and Technology Center

**WorkKeys® Career Readiness Certificate listed is determined by highest score needed for identified occupation.*

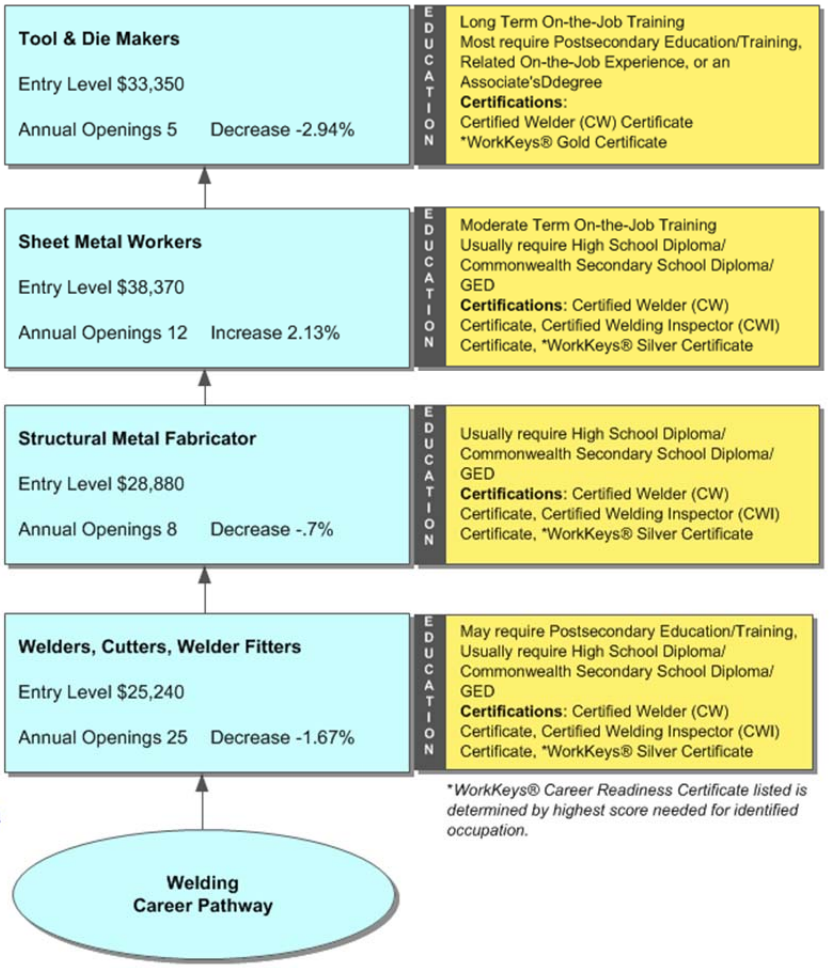
Sources of Information:
-ACT®, Inc. (2011). WorkKeys Scores Needed by Jobs. http://www.act.org/workkeys/skillsearch.html
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011a). 2011 High priority occupations for Three Rivers WIA region. Retrieved from http://www.paworkstats.state.pa.us/gsipub/index.asp?docid=504
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011b). Labor Market Information System. Retrieved from https://paworkstats.geosolinc.com
-U.S. Department of Labor, Employment and Training Administration. (2011). CareerOneStop. Retrieved from http://www.careeronestop.org
-U.S. Department of Labor, Employment and Training Administration. (2011). O*Net Online. Retrieved from: http://www.onetonline.org

Welding
Three Rivers WIA

Information contained in this career pathways map is specific to this Workforce Investment Area. The information contains projections of anticipated openings, entry level salary, and job growth. Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction

Postsecondary Education available through
-A. W. Beattie Career Center
-Community College of Allegheny County
-Dean Institute of Technology
-Triangle Tech



**WorkKeys® Career Readiness Certificate listed is determined by highest score needed for identified occupation.*

Sources of Information:
-ACT®, Inc. (2011). WorkKeys Scores Needed by Jobs. http://www.act.org/workkeys/skillsearch.html
-American Welding Society. http://www.aws.org/w/a/
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011a). 2011 High priority occupations for Three Rivers WIA region. Retrieved from http://www.paworkstats.state.pa.us/gsipub/index.asp?docid=504
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011b). Labor Market Information System. Retrieved from https://paworkstats.geosolinc.com
-U.S. Department of Labor, Employment and Training Administration. (2011). CareerOneStop. Retrieved from http://www.careeronestop.org
-U.S. Department of Labor, Employment and Training Administration. (2011). O*Net Online. Retrieved from: http://www.onetonline.org

Transportation
Three Rivers WIA

Information contained in this career pathways map is specific to this Workforce Investment Area. The information contains projections of anticipated openings, entry level salary, and job growth. Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction

CDL training available through:
-Pittsburgh Diesel Institute
-PIA Truck Driving School
-Swanson Driving School

Transportation Career Pathway

Truck Drivers, Heavy or Tractor-Trailer Entry Level $25,710 Annual Openings 123 Increase 6%	EDUCATION	Short Term On-the-Job Training Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record **Certifications**: Class A CDL, May require hazmat & tanker endorsements *WorkKeys® Gold Certificate
Industrial Truck and Tractor Operators Entry Level $21,950 Annual Openings 50 Decrease -4.52%	EDUCATION	Short Term On-the-Job Training Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record **Certifications:** Class B CDL, May require hazmat & tanker endorsements *WorkKeys® Silver Certificate
Refuse & Recyclable Material Collectors Entry Level $20,800 Annual Openings 11 Decrease -4.76%	EDUCATION	Short Term On-the-Job Training Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record **Certifications**: Class B CDL, May require hazmat & tanker endorsements *WorkKeys® Bronze Certificate
Truck Drivers, Light or Delivery Services Entry Level $19,900 Annual Openings 81 Decrease -.66%	EDUCATION	Short Term On-the-Job Training Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record **Certifications**: Class B CDL, May require hazmat & tanker endorsements *WorkKeys® Silver Certificate
Bus Drivers, School Entry Level $17,550 Annual Openings 47 Increase .5%	EDUCATION	Short Term On-the-Job Training Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record **Certifications**: Class B CDL
Laborers and Freight, Stock, and Material Movers, Hand Entry Level $17,420 Annual Openings 295 Decrease -.5%	EDUCATION	Short Term On-the-Job Training Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record **Certifications**: Skid Steer Safety Certification
Driver/Sales Worker Entry Level $15,750 Annual Openings 37 Decrease -9.13%	EDUCATION	Short Term On-the-Job Training Usually require High School Diploma/ Commonwealth Secondary School Diploma/ GED, Clean Driving Record

Sources of Information:

-ACT®, Inc. (2011). WorkKeys Scores Needed by Jobs. http://www.act.org/workkeys/skillsearch.html
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011a). 2011 High priority occupations for Three Rivers WIA region. Retrieved from http://www.paworkstats.state.pa.us/gsipub/index.asp?docid=504
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-U.S. Department of Labor, Employment and Training Administration. (2011). O*Net Online. Retrieved from: http://www.onetonline.org

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Section 4: Healthcare Industry

Overview of the Healthcare Industry

Over half a million different types of organizations make up the healthcare industry. About three-fourths of the health care organizations are physician, dentists, and other health practitioners' offices. Hospitals employ 35% of all healthcare workers. "The healthcare industry diagnoses, treats, and administers care around the clock, responding to the needs of millions of people—from newborns to the terminally ill" (U.S. Department of Labor, 2010b, para. 2).

The Allied Health section of the healthcare industry refers to the occupations that provide medical care and support but are not physicians, nurses, or dentists. Occupations in the Allied Health field provide diagnostic, technical, therapeutic, and direct patient care and support. Health Information Management (HIM) is an example of this section of healthcare. HIM includes occupations that record, compile, update, and store medical records. National, state, and company rules regulate how these data are managed and stored. Technology innovations are continuously changing how health information is recorded and maintained.

> Devices such as hand-held computers are used [to] record a patient's medical history. Information on vital signs and orders for tests are transferred electronically to a main database; this process eliminates the need for paper and reduces recordkeeping errors. Adoption of electronic health records is, however, relatively low presently. (U.S. Department of Labor, 2010b, para. 14)

Nursing is defined as "the protection, promotion, and optimization of health and abilities, prevention of illness and injury, alleviation of suffering through the diagnosis and treatment of human response, and advocacy in the care of individuals, families, communities, and populations" (American Nurses Association, 2011). According to the Pennsylvania Center for Health Careers (2007),

> Direct-care occupations form a critical segment of Pennsylvania's health and long-term supportive services delivery system. Direct-care workers go by many designations and work in a variety of service settings. They include nursing assistants, home health aides, personal care aides and attendants, home care workers, and direct support professionals. Nursing assistants and home health aides provide essentially the same services in Medicare- and Medicaid-certified nursing homes and home health agencies. Under the direction of a licensed nurse, they assist consumers with activities of daily living (ADLs) such as eating, dressing, bathing, and toileting; they also perform clinical tasks such as range-of-motion exercises and blood pressure readings. Home health aides may also perform light housekeeping tasks, such as preparing food or changing linens. (p. 16)

This work may take place in a consumer's home or in a long-term living facility. "These occupational designations [of nurses and direct care workers] vary according to the levels of training, the setting in which direct-care workers are employed, as well as the community of consumers they serve" (Pennsylvania Center for Health Careers, 2007, para. 1).

Pennsylvania Partnerships

- PA Center for Health Careers
- Regional Healthcare Industry Partnerships
- Regional Career and Education Partnerships
- Pennsylvania Area Health Education Center

Progression of Education and Training

The Healthcare section of the U.S. Department of Labor's (2010b) *Career Guide to Industries* states that

> A wide variety of people with various educational backgrounds are necessary for the healthcare industry to function….[Some jobs] require many years of training beyond graduate school. However, most of the occupations in the healthcare industry require less than four years of college. (Training and Advancement section, para.1)

- High School Diploma or Commonwealth Secondary School Diploma/GED
- National Career Readiness Certificate/WorkKeys®
- Postsecondary Vocational Training
- Nationally Recognized Certificates
- Associate Degree
- Bachelor of Science Degree
- Master of Science Degree

Certifications

Certifications and licensure vary by the level of care that is provided, employer, and type of healthcare setting. Certifications and/or licensure are often specific to Pennsylvania; however, it is often transferrable to and from other states. Below is a list of relevant certifications for each occupation.

- *Phlebotomist*
  - Phlebotomy Technician Certification (PBT)
- *Radiologic Technician*
  - Primary radiography certification
- *Radiologic Technologist*
  - Specialized radiological specialty area certification (i.e., mammography, computer tomography (CT), etc.)
- *Cardiovascular Technician*

    - Certified Cardiographic Technician (CCT)
    - Certified Rhythm Analysis Technician (CRAT)
- *Cardiovascular Technologist*
    - Registered Congenital Cardiac Sonographer (RCCS)
    - Registered Cardiac Electrophysiology Specialist (RCES)
    - Registered Cardiovascular Invasive Specialist (RCIS)
    - Registered Cardiac Sonographer (RCS)
    - Registered Phlebology Sonographer (RPhS)
    - Registered Vascular Specialist (RVS)
- *Medical/Clinical Laboratory Technician*
    - Medical Laboratory Technician Certification (MLT)
- *Medical/Clinical Laboratory Technologist*
    - Medical Technologist Certification (MT)
- *Medical Records and Health Information Technicians*
    - Registered Health Information Technician (RHIT)
    - Certified Coding Association (CCA)
    - Certified Coding Specialist (CCS)
    - Certified Coding Specialist – Physician-based (CCS-P)
- Medical Transcriptionist
    - Registered Medical Transcriptionists (RMT)
    - Certified Medical Transcriptionist (CMT)
- HIM Manager
    - National Registered Health Information Administrator (RHIA) certification

Support Services

The following organizations may provide educational opportunities, career counseling, academic support, financial aid, and case management services to support job attainment and career advancement.

- Adult Education Programs
- Career and Technical Centers
- Community Action Agency
- Community Colleges, Higher Education, and Private Schools
- Health and Human Service Agencies
- Healthcare Employers
- Healthcare Unions and Training Funds
- PA CareerLink®

Career Pathway Maps

Many possible career paths are available in the healthcare industry. This document contains three career pathway maps related to healthcare in the Three Rivers WIA:

- *Three Rivers WIA Healthcare—Allied Health—Diagnostic Career Pathway Map* (Hardy & Long, 2011a)
- *Three Rivers WIA Healthcare—Nursing/Direct Care Career Pathway Map* (Hardy & Long, 2011c)
- *Three Rivers WIA Healthcare—Health Information Management Career Pathway Map* (Hardy & Long, 2011b)

Healthcare - Allied Health - Diagnostic
Three Rivers WIA

Information contained in this career pathways map is specific to this Workforce Investment Area (WIA). The information contains projections of anticipated openings, entry level salary, and job growth. Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction

Postsecondary Education available through:
-A. W. Beattie Career Center
-Community College of Allegheny County
-Penn State Greater Allegheny
-Penn State New Kensington
-Pittsburgh Technical Institute
-Sanford Brown

Healthcare
Allied Health - Diagnostic
Career Pathway

Radiologic Technologist Entry Level $33,230 Annual Openings 34 Increase 6.51%	EDUCATION	Typically requires an Associate's Degree **Certifications**: *WorkKeys® Silver Certificate Specialized radiological specialty area certification (i.e. mammography, computer tomography (CT), etc.)
Radiologic Technician Entry Level $33,230 Annual Openings 34 Increase 6.51%	EDUCATION	Postsecondary Education/Training or an Associate's Degree **Certifications**: **Primary Radiography Certification
Cardiovascular Technologist Entry Level $28,000 Annual Openings 18 Increase 17.24%	EDUCATION	Associate's Degree **Certifications**: **Certified Cardiographic Technician (CCT) Specialty Area Certifications availalbe (i.e. RCCS, RCES, RCIS, RCS, RPhS, RVS)
Cardiovascular Technician Entry Level $28,000 Annual Openings 18 Increase 17.24%	EDUCATION	Typically requires an Associate's Degree, some EKG technicians may be trained on the job **Certifications**: **Certified Cardiographic Technician (CCT) **Certified Rhythm Analysis Technician (CRAT)
Medical/Clinical Laboratory Technologist Entry Level $38,010 Annual Openings 41 Increase 6.88%	EDUCATION	Typically requires a Bachelor's Degree **Certifications**: *WorkKeys® Gold Certificate **Medical Technologist Certification (MT)
Medical/Clinical Laboratory Technician Entry Level $24,620 Annual Openings 35 Increase 7.05%	EDUCATION	Postsecondary Education/Training or an Associate's Degree **Certifications**: *WorkKeys® Gold Certificate **Medical Laboratory Technician Certification (MLT)
Phlebotomist Entry Level $22,290 Annual Openings 13 Increase 3.8%	EDUCATION	Usually requires High School Diploma/ Commonwealth Secondary School Diploma/ GED **Certifications**: **Phlebotomy Technician Certification (PBT)

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-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011a). 2011 High priority occupations for Three Rivers WIA region. Retrieved from http://www.paworkstats.state.pa.us/gsipub/index.asp?docid=504
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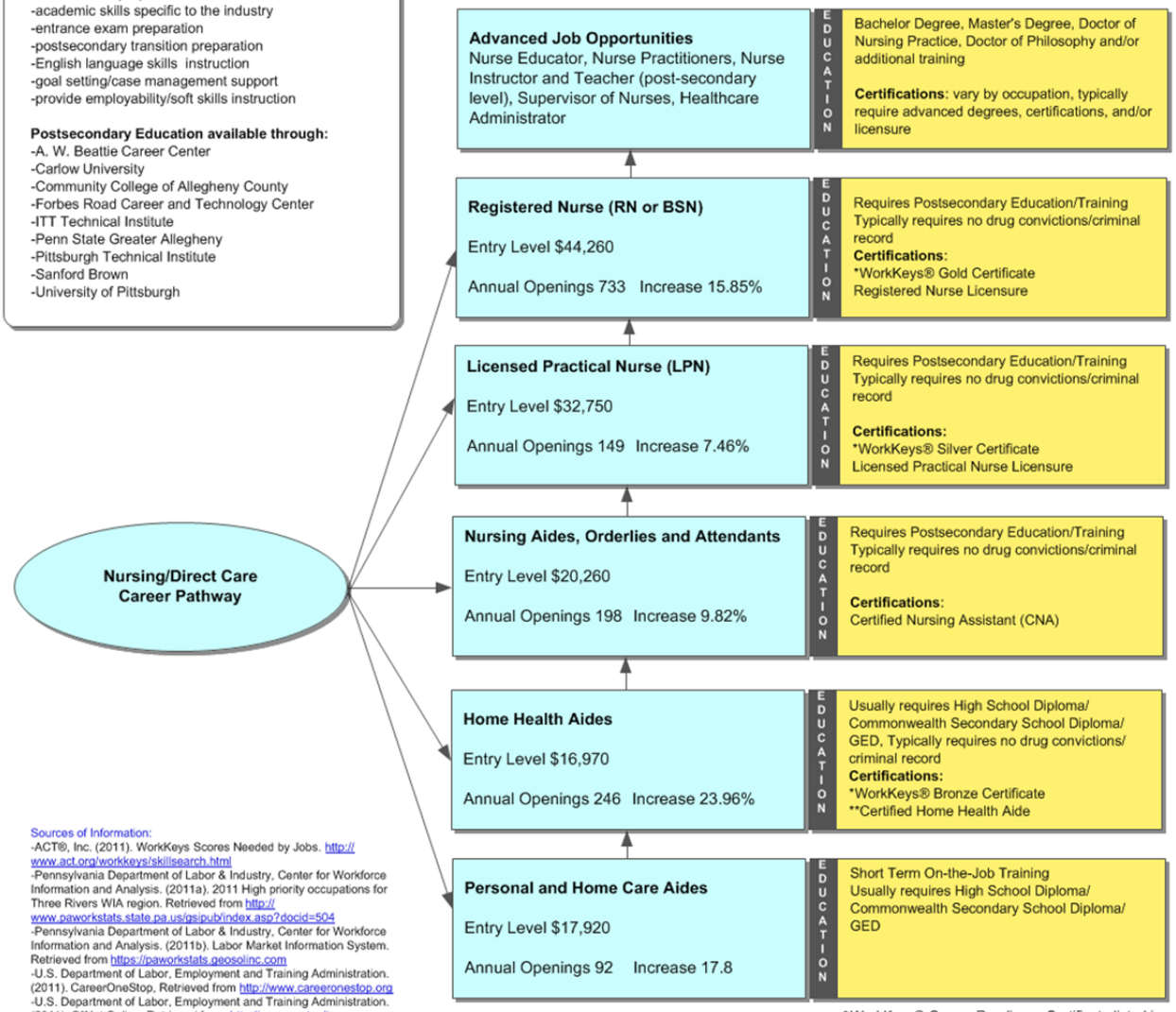
-U.S. Department of Labor, Employment and Training Administration. (2011). O*Net Online. Retrieved from: http://www.onetonline.org

Healthcare - Nursing/Direct Care
Three Rivers WIA

Information contained in this career pathways map is specific to this Workforce Investment Area (WIA). The information contains projections of anticipated openings, entry level salary, and job growth. Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction

Postsecondary Education available through:
-A. W. Beattie Career Center
-Carlow University
-Community College of Allegheny County
-Forbes Road Career and Technology Center
-ITT Technical Institute
-Penn State Greater Allegheny
-Pittsburgh Technical Institute
-Sanford Brown
-University of Pittsburgh



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-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011a). 2011 High priority occupations for Three Rivers WIA region. Retrieved from http://www.paworkstats.state.pa.us/gsipub/index.asp?docid=504
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011b). Labor Market Information System. Retrieved from https://paworkstats.geosolinc.com
-U.S. Department of Labor, Employment and Training Administration. (2011). CareerOneStop. Retrieved from http://www.careeronestop.org
-U.S. Department of Labor, Employment and Training Administration. (2011). O*Net Online. Retrieved from: http://www.onetonline.org

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***Certification are available, but may not be required by employers.*

Healthcare - Health Information Management
Three Rivers WIA

Information contained in this career pathways map is specific to this Workforce Investment Area (WIA). The information contains projections of anticipated openings, entry level salary, and job growth. Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction

Postsecondary Education available through:
-A. W. Beattie Career Center
-Bidwell Training Center Inc.
-Bradford School
-Career Training Academy
-Community College of Allegheny County
-ITT Technical Institute
-Pittsburgh Technical Institute
-Sanford Brown

Sources of Information:
-ACT®, Inc. (2011). WorkKeys Scores Needed by Jobs. http://www.act.org/workkeys/skillsearch.html
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011a). 2011 High priority occupations for Three Rivers WIA region. Retrieved from http://www.paworkstats.state.pa.us/gsipub/index.asp?docid=504
-Pennsylvania Department of Labor & Industry, Center for Workforce Information and Analysis. (2011b). Labor Market Information System. Retrieved from https://paworkstats.geosolinc.com
-U.S. Department of Labor, Employment and Training Administration. (2011). CareerOneStop. Retrieved from http://www.careeronestop.org
-U.S. Department of Labor, Employment and Training Administration. (2011). O*Net Online. Retrieved from: http://www.onetonline.org

Health Information Management Career Pathway

Medical and Health Services Manager
Entry Level $51,340
Annual Openings 44 Increase .7%

EDUCATION: Postsecondary Education/Training, Associate's Degree and Experience, or Bachelor's degree

Certifications:
**Microsoft Office Specialist Certification, Registered Health Information Administrator (RHIA)

Medical Transcriptionists
Entry Level $25,220
Annual Openings 13 Increase 1.14%

EDUCATION: Typically requires Postsecondary Education/ Training

Certifications:
**Registered Medical Transcriptionist (RMT), Certified Medical Transcriptionist (CMT)

Medical Records and Health Information Technicians
Entry Level $24,120
Annual Openings 38 Increase 5.31%

EDUCATION: Typically requires Associate's degree

Certifications:
*WorkKeys® Silver Certificate
**Registered Health Information Technician (RHIT), Certified Coding Association (CCA), Certified Coding Specialist (CCS), Certified Coding Specialist Physician-based (CCS-P)

First-Line Supervisor/Managers of Office and Administrative Support Workers
Entry Level $32,320
Annual Openings 150 Decrease -.5%

EDUCATION: Postsecondary Education/Training, Associate's Degree and Experience, or Bachelor's degree

Certifications:
*WorkKeys® Silver Certificate
**Microsoft Office Specialist Certification

Medical Secretaries
Entry Level $21,120
Annual Openings 67 Increase 4.5%

EDUCATION: Usually requires High School Diploma or Commonwealth Secondary School Diploma, May require Postsecondary vocational training

Certifications:
*WorkKeys® Bronze Certificate
**Microsoft Office Specialist Certification

Receptionist/Office Clerks
Entry Level $18,240
Annual Openings 388 Increase 1.16%

EDUCATION: May require a High School Diploma/ Commonwealth Secondary School Diploma/ GED

Certifications:
*WorkKeys® Silver Certificate

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Section 5: Hospitality Industry

Overview of the Hospitality Industry

Occupations in ancillary service industries increase in demand as other industries increase. Many occupations within different industries increase in order to accommodate the growth of another industry. Hospitality and retail are two that are most likely to be affected by the increase in population to an area.

> Food services and drinking places may be the world's most widespread and familiar industry. These establishments include all types of restaurants, from fast-food eateries to formal dining establishments. They also include cafeterias, caterers, bars, and food service contractors that operate the food services at places such as schools, sports arenas, and hospitals (U.S. Department of Labor, 2010a, para. 2).
>
> Workers in this industry perform a variety of tasks. They prepare food items from a menu or according to a customer's order, keep food preparation and service areas clean, accept payment from customers, and provide the establishment managerial or office services, such as bookkeeping, ordering, and advertising. Cooks, waiters and waitresses, and combined food preparation and serving workers accounted for 3 out of 5 food services jobs…(U.S. Department of Labor, 2010a, Occupations in the Industry section, para. 1).
>
> Food service managers hire, train, supervise, and discharge workers in food services and drinking places establishments. They also purchase supplies, deal with vendors, keep records, and help whenever an extra hand is needed. Executive chefs oversee the kitchen, select the menu, train cooks and food preparation workers, and direct the preparation of food. In fine-dining establishments, *maitre d's* may serve as hosts or hostesses while overseeing the dining room. Larger establishments may employ general managers, as well as a number of assistant managers. Many managers and executive chefs are part owners of the establishments they manage (U.S. Department of Labor, 2010a, Occupations in the Industry section, para. 6).

Pennsylvania Partnerships

Regional Career and Education Partnerships

Progression of Education and Training

In order for the hospitality industry to function, a wide array of people with a variety of educational backgrounds and experience must be available. Many occupations within this industry require higher education degrees; however, most of the occupations only require a high school diploma or equivalent. Most education and training for these occupations are provided by the employer as needed.

- High School Diploma or Commonwealth Secondary School Diploma/GED
- National Career Readiness Certificate/WorkKeys®
- Postsecondary Vocational Training
- Nationally Recognized Certificates
- Associate Degree
- Bachelor of Science Degree

Certifications

Employees in this industry are not always required to have the ServSafe certification to be hired; however, employees handling food will have to attain their certification within 90 days of being hired. The ServSafe certification requires renewal every five years.

Support Services

The following organizations may provide educational opportunities, career counseling, academic support, financial aid, and case management services to support job attainment and career advancement.

- Adult Education Programs
- Career and Technical Centers
- Community Action Agency
- Community Colleges, Higher Education, and Private Schools
- Health and Human Services
- PA CareerLink®

Career Pathway Maps

The *Three Rivers WIA Hospitality—Food & Beverage Career Pathway Map* (Hardy, 2011b) provides a broad overview of the hospitality industry's food and beverage sector within the Three Rivers WIA. Actual jobs and organization will vary by employer.

Hospitality - Food & Beverage
Three Rivers WIA

Information contained in this career pathways map is specific to this Workforce Investment Area (WIA). Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction

Postsecondary Education available through:
-A. W. Beattie Career Center
-Bidwell Training Center Inc.
-Bradford School
-Community College of Allegheny County
-Forbes Road Career and Technology Center
-Penn State Greater Allegheny
-Pittsburgh Technical Institute

Sources of Information:
-ACT®, Inc. (2011). WorkKeys Scores Needed by Jobs. http://www.act.org/workkeys/skillsearch.html
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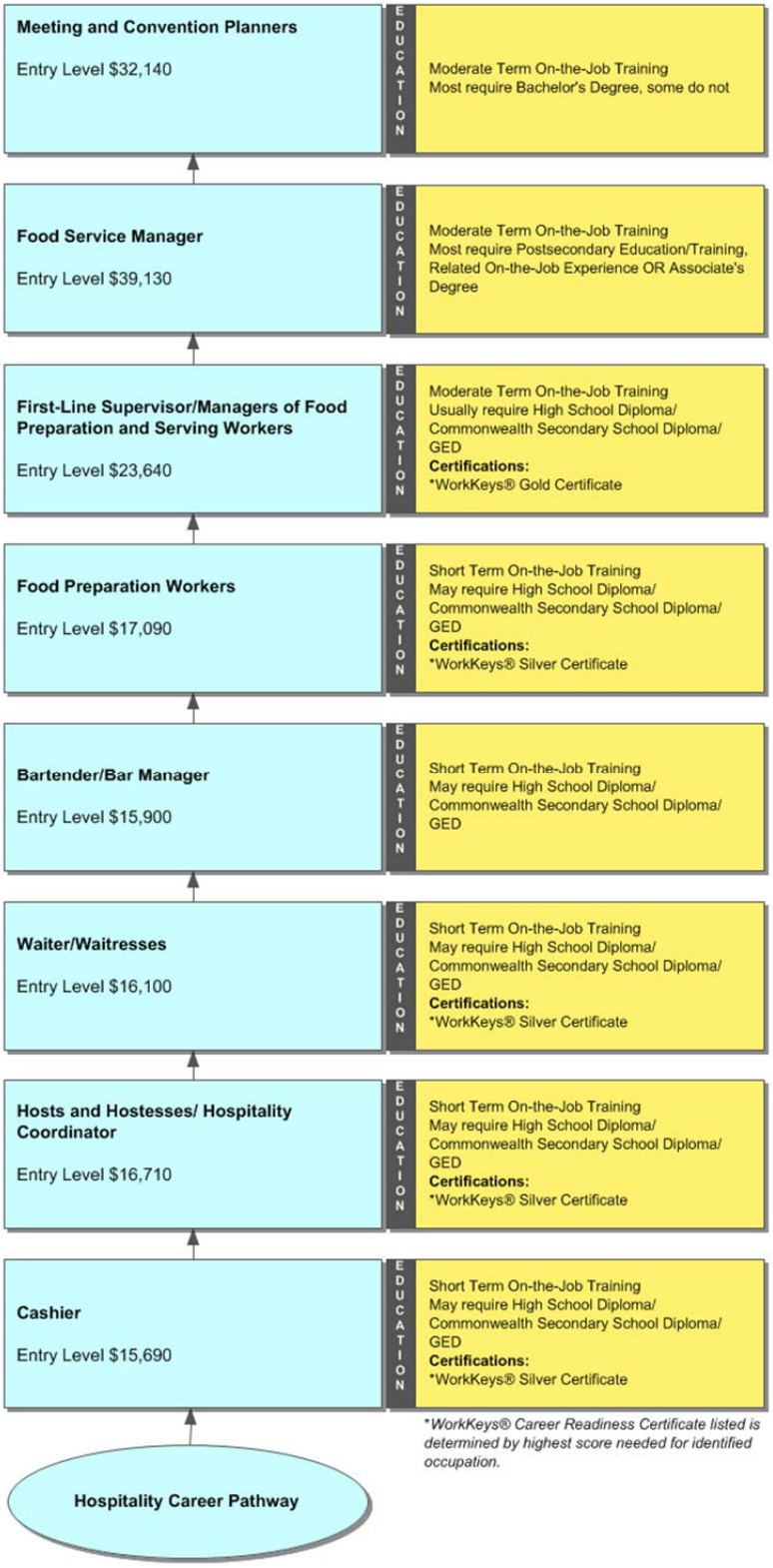


**WorkKeys® Career Readiness Certificate listed is determined by highest score needed for identified occupation.*

Section 6: Retail Industry

Overview of the Retail Industry

The retail industry sells goods or merchandise to individuals, companies, and organizations. It is one of the largest sectors of the economy. While most retail sales and jobs take place in a store, Internet retail sales and jobs are growing. Retail businesses vary in size, range of products, and ownership (chain or independent).

Retail jobs include cashiers and sales associates. Other retail job areas include receiving, loss prevention, management, marketing, and customer service. Entry-level positions often may be hourly, while management positions often are based on salary. In general, assistant managers and managerial trainees are promoted from within. However, higher level managerial and corporate positions often require postsecondary credentials.

Pennsylvania Partnerships

- Regional Logistics and Transportation Industry Partnerships (related but not focused on retail career pathways)
- Regional Career and Education Partnerships

Progression of Education and Training

Most entry-level retail positions offer on-the-job training. Some employers may require a high school diploma or Commonwealth Secondary School Diploma/GED. Co-workers may provide training. Larger retail outlets may use trainers and more formal training programs for staff. Although management positions often require postsecondary education degrees, some companies will promote highly qualified staff to administrative or supervisory positions without requiring further formal education.

- High School Diploma or Commonwealth Secondary School Diploma/GED
- National Career Readiness Certificate/WorkKeys®
- Postsecondary Vocational Training
- Nationally Recognized Certificates
- Associate Degree
- Bachelor of Science Degree

Certifications

Most entry-level positions do not require certifications; however, they may be helpful in securing a job. Higher-level management positions and corporate positions often require postsecondary degrees. However, the level and type of degree depends on the occupation and focus area (ex. accounting, information technology, marketing). National certifications include:

- National Professional Certification in Customer Service issued by the National Retail Federation (NRF) Foundation
- National Professional Certification in Sales issued by the NRF Foundation
- National Professional Certification in Retail Management issued by the NRF Foundation

Support Services

The following organizations may provide educational opportunities, career counseling, academic support, financial aid, and case management services to support job attainment and career advancement.

- Adult Education Programs
- Career and Technical Centers
- Community Action Agency
- Community Colleges, Higher Education, and Private Schools
- Health and Human Service Agencies
- PA CareerLink®

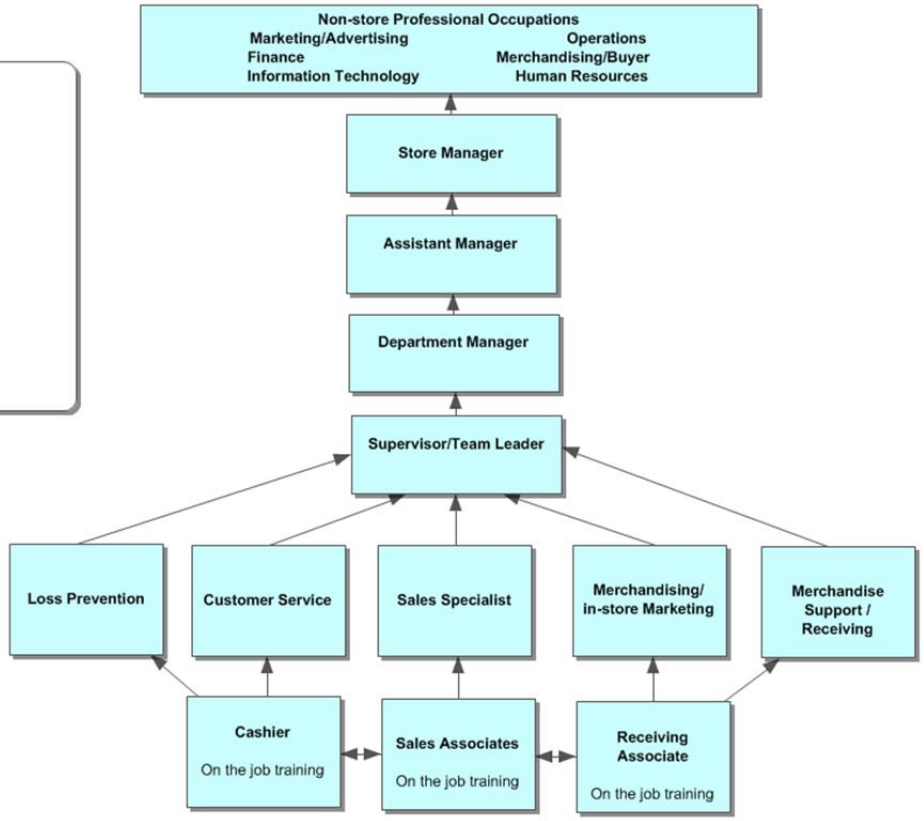
Career Pathway Maps

The *Retail Pennsylvania Career Pathway Map* (Hardy & Long, 2011d) provides a general overview of retail occupations; however, actual jobs and organization will be specific to the retail business. Related career areas include warehousing, supply chain management, and transportation.

Retail
Pennsylvania

Information contained in this career pathways map provides a general overview of career pathways available in retail. Actual career pathways may look different depending on the individual and the local area job market.

Career Pathways programs provide:
-workplace skills instruction
-GED® Tests preparation
-academic skills specific to the industry
-entrance exam preparation
-postsecondary transition preparation
-English language skills instruction
-goal setting/case management support
-provide employability/soft skills instruction



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