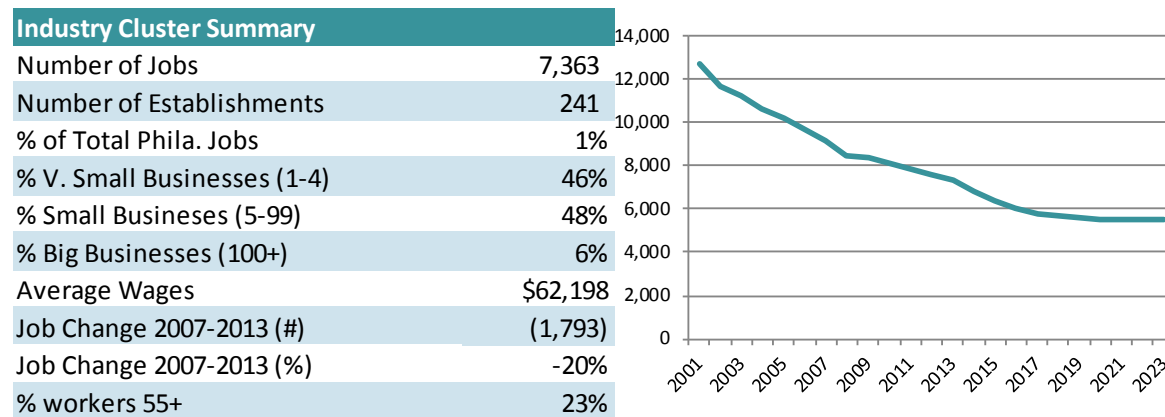


## Industry Profiles – Wood, Wood Products & Publishing

**The Wood, Wood Products & Publishing** cluster incorporates a supply line from raw material to finished product. It includes logging and lumber production, through the production of paper, to the publishing of magazines and newspapers. Industries found within the cluster include sawmills, truss manufacturing, stationery product manufacturing, printing machinery and equipment manufacturing, book stores and greeting card publishers<sup>1</sup>. Philadelphia industries are mostly represented by printing and publishing and book stores.

This report presents an overview of employment trends. We examine how Wood, Wood Products & Publishing has changed since 2007, the year before the Great Recession had an impact. Then, we examine the composition of the industry cluster by size of businesses and highlight clusters with the largest share of smaller businesses. The section on workers demographics shows the composition of industry clusters by gender, age, and education. Finally, we look at the major occupations that support industry clusters.

### SUMMARY OF WOOD, WOOD PRODUCTS & PUBLISHING INDUSTRY CLUSTER IN PHILADELPHIA



<sup>1</sup> Descriptions of industry clusters are borrowed directly from the State report. The full report can be found here: <http://www.portal.state.pa.us/portal/server.pt/community/products/19738>

### % CHANGE IN EMPLOYMENT IN WOOD, WOOD PRODUCTS & PUBLISHING IN PHILADELPHIA VS. PA AND U.S. AND VS. ALL INDUSTRIES



Source: Philadelphia Works analysis of the QCEW Employees & Non-QCEW Employees - EMSI 2013.4 Class of Worker data

### Industry Highlights

- Employment in Wood, Wood Products & Publishing has been declining. Since 2007, the industry cluster has lost 20 percent of jobs.
- Among top industries, Commercial Screen Printing and Book Stores have added jobs since 2007.

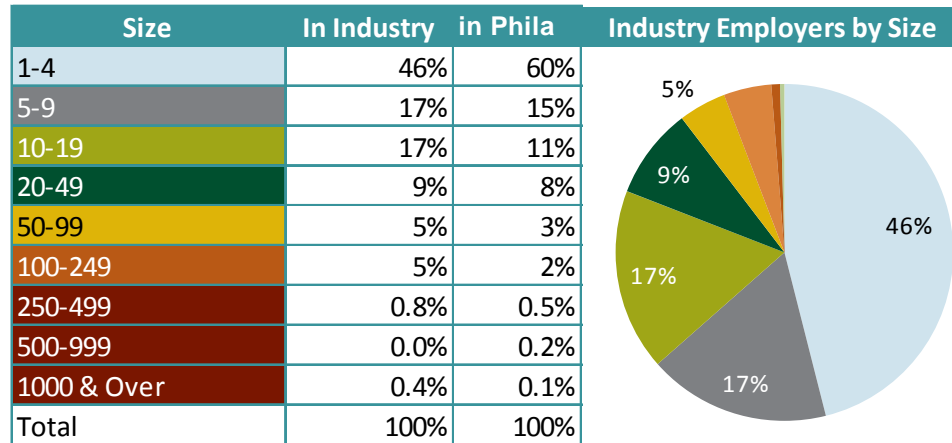
### TOP INDUSTRIES IN WOOD, WOOD PRODUCTS & PUBLISHING IN PHILADELPHIA

Industry	Jobs 2013	% Change 2007-2013	Change	Expected Change	Competitive Effect	Wages
Newspaper Publishers	1,290	▼ -30%	(558)	(698)	139	\$50,938
Periodical Publishers	1,014	▼ -19%	(236)	(326)	90	\$84,441
Commercial Lithographic Printing	759	▼ -44%	(607)	(439)	(168)	\$55,480
Book Publishers	582	▼ -11%	(75)	(112)	36	\$100,629
Industrial and Personal Service Paper Merchant Wholesalers	530	▼ -25%	(179)	(78)	(101)	\$70,904
Corrugated and Solid Fiber Box Manufacturing	401	▼ -8%	(34)	(80)	46	\$71,131
Book Stores	399	▲ 13%	45	(141)	186	\$17,797
Commercial Screen Printing	343	▲ 277%	252	(7)	259	\$50,870
Other Commercial Printing	197	▬ -2%	(3)	(56)	53	\$55,480

Source: Philadelphia Works analysis of the QCEW Employees & Non-QCEW Employees - EMSI 2013.4 Class of Worker data

## Employers in Wood, Wood Products & Publishing

### EMPLOYERS IN WOOD, WOOD PRODUCTS & PUBLISHING BY SIZE (PERCENT OF TOTAL EMPLOYERS)



Source: PA Employer Database 2013

- Over 240 businesses make up Wood, Wood Products & Publishing industry cluster. 48 percent of businesses in the cluster are “small businesses” employing 5 to 99 workers – 11 percent above the share of small businesses across all industries (37 percent).

### TOP EMPLOYERS IN WOOD, WOOD PRODUCTS & PUBLISHING

PHILA MEDIA NETWORK NEWSPAPERS LLC	TAYLOR & FRANCIS GROUP LLC
ELSEVIER SCIENCE INC	WOLTERS KLUWER HEALTH INC
THOMSON REUTERS SCIENTIFIC INC	BARNES & NOBLE COLLEGE BOOKSELLERS
CASE PAPER CO INC	BUNZL DISTRIBUTION MIDATLANTIC INC
DAVID WEBER COMPANY INC	METROCORP
F A DAVIS CO	ROCK TENN SERVICES INC
MENASHA PACKAGING COMPANY LLC	S WALTER PACKAGING CORPORATION
NEWMAN & CO INC	SOUTHERN GRAPHIC SYSTEMS INC
NORTH AMERICAN PUBLISHING CO	THE PHILADELPHIA TRIBUNE
PAPERWORKS INDUSTRIES INC	BARNES & NOBLE BOOKSELLERS USA
PENN JERSEY PAPER COMPANY	PHILADELPHIA SKY NEWS
PERFECSEAL INC	THE NATIONAL LAW JOURNAL

Source: PA Employer Database 2013

## Worker Demographics

Workforce demographics are examined by gender, age, and Wood, Wood Products & Publishing of workers.

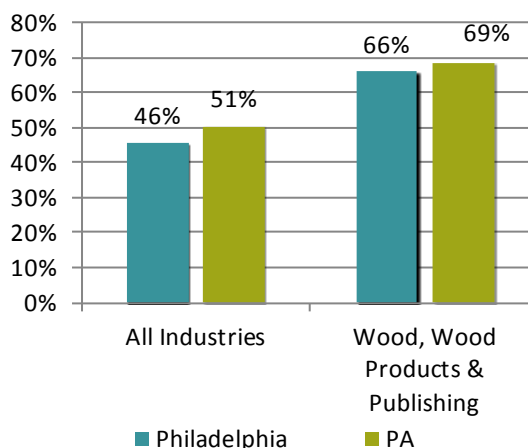
### Gender of Workers in Wood, Wood Products & Publishing

#### GENDER OF WORKERS IN 2013Q1+3 PREVIOUS QUARTERS

##### % MEN EMPLOYED IN WOOD, WOOD PRODUCTS & PUBLISHING IN PHILADELPHIA

	% men
Other Wood Prod. Mfg	92%
Pulp, Paper, & Paperboard Mills	91%
Converted Paper Prod. Mfg	81%
Printing & Related Support Act.	73%
Paper/Paper Prod. Merch. Whls.	67%
Wood, Wood Products & Publishing	66%
Book, Periodical, & Music Stores	63%
Newsp., Book, & Directory Pub.	56%
All Industries	46%

##### % MEN EMPLOYED BY CLUSTER GEOGRAPHY



Source: Philadelphia Works Analysis of Quarterly Workforce Indicators data.

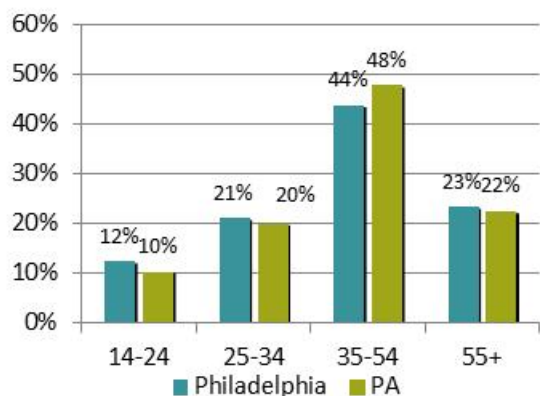
- More men than women were employed in Wood, Wood Products & Publishing. Men represented nearly 8 in 10 workers in paper manufacturing and printing industries.

### Age of Workers in Wood, Wood Products & Publishing

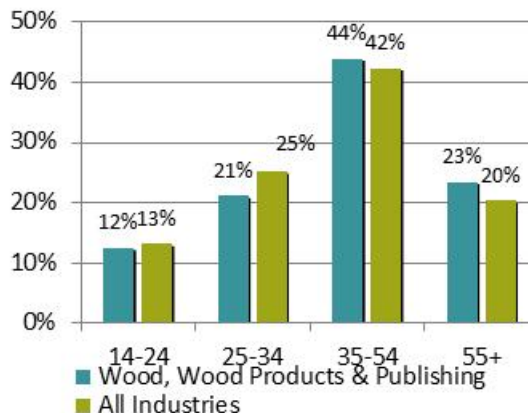
- The majority of workers in Wood, Wood Products & Publishing are middle age –from 35 to 54.
- Book, Periodical, and Music stores employ a larger share of younger workers (35 percent). Paper manufacturing industries employ a larger share of workers 55 and over compared to all other industries in Philadelphia.

### AGE OF WORKERS IN 2013Q1+3 PREVIOUS QUARTERS:

#### EMPLOYED IN WOOD, WOOD PRODUCTS PUBLISHING IN PHILADELPHIA VS. PA



#### EMPLOYED IN WOOD, WOOD PRODUCTS & PUBLISHING VS. ALL INDUSTRIES IN PHILA.



Source: Philadelphia Works Analysis of Quarterly Workforce Indicators data.

### TOP INDUSTRIES IN WOOD, WOOD PRODUCTS & PUBLISHING IN PHILADELPHIA BY AGE OF WORKERS IN 2013Q1+3 PREVIOUS QUARTERS

Industry/Age	14-24	25-54	55+	Total	# Employed
Newsp., Book, & Directory Pub.	4.4%	66.5%	29.1%	100%	3,014
Book, Periodical, & Music Stores	34.7%	57.7%	7.6%	100%	2,311
Printing & Related Support Act.	6.2%	66.7%	27.1%	100%	1,776
Converted Paper Prod. Mfg	3.3%	66.5%	30.1%	100%	889
Paper/Paper Prod. Merch. Whls.	4.2%	66.0%	29.8%	100%	680
Pulp, Paper, & Paperboard Mills	2.9%	69.5%	27.6%	100%	328
Other Wood Prod. Mfg	5.0%	75.4%	19.6%	100%	175
<b>Wood, Wood Products &amp; Publishing</b>	<b>12%</b>	<b>65%</b>	<b>23%</b>	<b>100%</b>	<b>9,172</b>
<b>All Industries</b>	<b>13%</b>	<b>67%</b>	<b>20%</b>	<b>100%</b>	<b>558,394</b>

Source: Philadelphia Works Analysis of Quarterly Workforce Indicators data.

### Education of Workers in Wood, Wood Products & Publishing

- The majority of workers in Wood, Wood Products & Publishing have either a Bachelor’s degree or more education. Newspaper, Book, and Directory Publishers employed the most educated workers.

**EDUCATION OF WORKERS IN 2013Q1+3 PREVIOUS QUARTERS:**

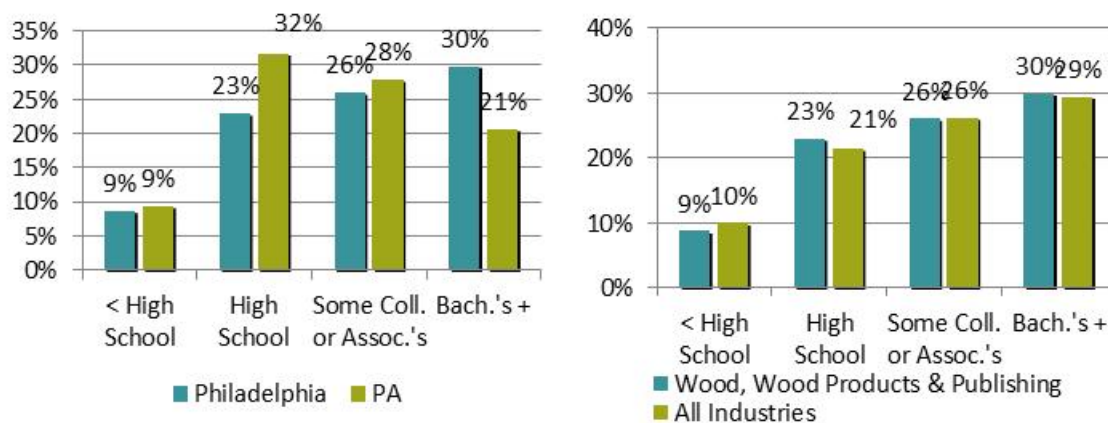
**EMPLOYED IN WOOD, WOOD PRODUCTS & PUBLISHING IN PHILADELPHIA VS. PA**

**EMPLOYED IN WOOD, WOOD PRODUCTS & PUBLISHING VS. ALL INDUSTRIES IN PHILA.**

Industry/Education	< High School	High School	Some College or Assoc.'s	Bach.'s +	Unknown	Total	# Employed
Newsp., Book, & Directory Pub.	5.0%	16.7%	24.9%	49.0%	4.4%	100%	3,014
Book, Periodical, & Music Stores	9.1%	18.5%	20.1%	17.6%	34.7%	100%	2,311
Printing & Related Support Act.	9.8%	29.7%	30.8%	23.4%	6.3%	100%	1,776
Converted Paper Prod. Mfg	14.4%	32.6%	29.9%	19.1%	4.0%	100%	889
Paper/Paper Prod. Merch. Whls.	10.6%	28.8%	30.7%	25.7%	4.3%	100%	680
Pulp, Paper, & Paperboard Mills	11.8%	32.0%	30.5%	22.8%	2.9%	100%	328
Other Wood Prod. Mfg	15.3%	31.9%	30.8%	16.5%	5.5%	100%	175
<b>Wood, Wood Products &amp; Publishing</b>	<b>8.7%</b>	<b>23.0%</b>	<b>26.0%</b>	<b>30.0%</b>	<b>12.3%</b>	<b>100%</b>	<b>9,172</b>
<b>All Industries</b>	<b>10.0%</b>	<b>21.4%</b>	<b>26.2%</b>	<b>29.5%</b>	<b>12.9%</b>	<b>100%</b>	<b>558,394</b>

Source: Philadelphia Works Analysis of Quarterly Workforce Indicators data. Wood, Wood Products & Publishing attainment is not available for workers under 25 – this category is not shown.

**TOP INDUSTRIES IN WOOD, WOOD PRODUCTS & PUBLISHING IN PHILADELPHIA BY EDUCATION OF WORKERS IN 2013Q1+3 PREVIOUS QUARTERS**



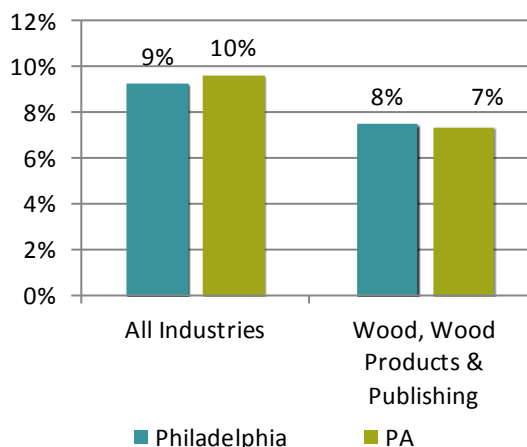
Source: Philadelphia Works Analysis of Quarterly Workforce Indicators data.

**Turnover in Wood, Wood Products & Publishing**

- Turnover rates help us evaluate the churning in the labor force – average number of separations and hires for the industry group. The rate shows what percentage of the labor force is new. Turnover rates in Wood, Wood Products & Publishing in Philadelphia (8 percent) were similar to turnover across all industries in Philadelphia. Book, Periodical, and Music stores had the highest turnover, at 15 percent.

### TURNOVER RATES IN WOOD, WOOD PRODUCTS & PUBLISHING PHILADELPHIA IN 2012Q3 (FOUR QUARTER MOVING AVERAGE)

Industry/Turnover Rate	Turnover
Book, Periodical, & Music Stores	15%
All Industries	9%
Wood, Wood Products & Publishing	8%
Printing & Related Support Act.	7%
Other Wood Prod. Mfg	6%
Converted Paper Prod. Mfg	5%
Newsp., Book, & Directory Pub.	5%
Paper/Paper Prod. Merch. Whls.	4%
Pulp, Paper, & Paperboard Mills	3%



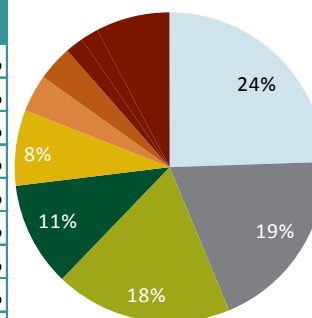
Source: Philadelphia Works Analysis of Quarterly Workforce Indicators data.

### Occupation Highlights

- Staffing patterns analysis was used to identify occupations that are needed in the industry. The Wood, Wood Products & Publishing industry cluster mostly relied on workers in Production; Sales and Related; Office and Administrative Support, and Arts, Design, Entertainment, Sports, and Media Occupations. The majority of the occupations in the cluster required a short-term on-the-job training (33 percent) or a bachelor’s degree.

### TOP OCCUPATIONAL FAMILIES IN WOOD, WOOD PRODUCTS & PUBLISHING INDUSTRY CLUSTER

Occupational Family	Jobs 2007	Jobs 2013	Change %	% of 2013 Jobs
Production	2,300	1,802	-22%	24%
Sales and related	1,627	1,418	-13%	19%
Office and admin. support	1,763	1,359	-23%	18%
Arts, design, ent., sports, and media	1,069	802	-25%	11%
Transportation	728	581	-20%	8%
Management	376	287	-24%	4%
Business and financial operations	321	271	-16%	4%
Comp. and mathematical	174	137	-21%	2%
Instalation, maint., and repair	141	137	-3%	2%
Unidentified + Other	657	569	-13%	8%
Total	9,156	7,363	-20%	100%

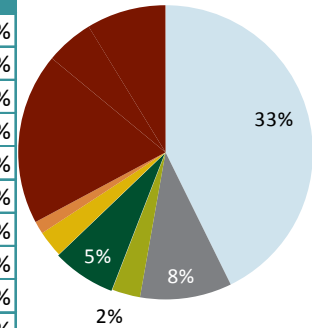


Source: Philadelphia Works analysis of the QCEW Employees & Non-QCEW Employees - EMSI 2013.4 Class of Worker data



**EDUCAITON REQUIRED OF WORKERS IN WOOD, WOOD PRODUCTS & PUBLISHING INDUSTRY CLUSTER**

Skill	Jobs 2007	Jobs 2013	Change %	% of 2013 Jobs
Short-term on-the-job training	2,992	2,446	-18%	33%
Moderate-term on-the-job training	2,750	2,213	-20%	8%
Long-term on-the-job training	196	178	-9%	2%
Work experience in a related occupation	493	398	-19%	5%
Postsecondary non-degree award	249	168	-33%	2%
Associate's degree	109	80	-27%	1%
Bachelor's degree	1,393	1,079	-23%	15%
Bachelor's or higher degree, plus work experience	391	301	-23%	4%
Unidentified	583	500	n/a	7%
Total	9,156	7,363	-20%	100%



Source: Philadelphia Works analysis of the QCEW Employees & Non-QCEW Employees - EMSI 2013.4 Class of Worker data

Top occupations in the cluster are shown in the tables below. Highlighted occupations are Philadelphia 2013 High Priority Occupations important to the Wood, Wood Products & Publishing industry cluster. Wage data are not industry specific and describe all workers in the occupation.

**TOP OCCUPATIONS IN WOOD, WOOD PRODUCTS & PUBLISHING INDUSTRY CLUSTER**

SOC	Occupation	Jobs 2013	% Change from 2007	Entry-Level Earnings	Median Hourly Earnings	% of the Total Jobs in Cluster
<b>Limited Skills Required</b>						
41-2031	Retail Salespersons	273	8%	\$7.59	\$10.43	3.7%
43-4051	Customer Service Representatives	266	(23%)	\$11.28	\$17.30	3.6%
51-5113	Print Binding and Finishing Workers	198	(31%)	\$9.89	\$17.67	2.7%
43-9061	Office Clerks, General	175	(22%)	\$8.72	\$14.76	2.4%
53-7062	Laborers and Freight, Stock, and Material Movers, Hand	172	(15%)	\$8.31	\$12.60	2.3%
51-9198	Helpers/Production Workers	147	(18%)	\$8.09	\$11.11	2.0%
41-2011	Cashiers	121	8%	\$8.17	\$9.72	1.6%
43-5071	Shipping, Receiving, and Traffic Clerks	105	(23%)	\$9.34	\$14.52	1.4%
43-6014	Secretaries and Administrative Assistants, Except Legal, Medical, and Executive	102	(24%)	\$10.32	\$16.61	1.4%
53-7064	Packers and Packagers, Hand	86	(23%)	\$7.26	\$9.76	1.2%
43-9051	Mail Clerks and Mail Machine Operators, Except Postal Service	85	(21%)	\$10.17	\$14.75	1.2%
43-5081	Stock Clerks and Order Fillers	84	(19%)	\$7.70	\$10.10	1.1%
53-3033	Light Truck or Delivery Services Drivers	72	(26%)	\$8.76	\$15.06	1.0%
51-9032	Cutting and Slicing Machine Setters, Operators, and Tenders	71	(10%)	\$12.98	\$16.91	1.0%
53-7063	Machine Feeders and Offbearers	68	(28%)	\$8.15	\$12.90	0.9%



**TOP OCCUPATIONS IN WOOD, WOOD PRODUCTS & PUBLISHING INDUSTRY CLUSTER , CONTINUED**

SOC	Occupation	Jobs 2013	% Change from 2007	Entry-Level Earnings	Median Hourly Earnings	% of the Total Jobs in Cluster
<b>Some Training or Experience</b>						
51-5112	Printing Press Operators	554	(29%)	\$12.31	\$19.73	7.5%
41-4012	Sales Representatives, Wholesale and Manufacturing, Except Technical and Scientific Products	497	(19%)	\$14.20	\$25.51	6.7%
41-3011	Advertising Sales Agents	330	(20%)	\$13.16	\$24.79	4.5%
51-9196	Paper Goods Machine Setters, Operators, and Tenders	255	0%	\$13.02	\$19.88	3.5%
51-1011	First-Line Supervisors of Production and Operating Workers	137	(20%)	\$16.83	\$28.11	1.9%
43-3031	Bookkeeping, Accounting, and Auditing Clerks	108	(23%)	\$12.41	\$19.49	1.5%
43-1011	First-Line Supervisors of Office and Administrative Support Workers	76	(22%)	\$16.73	\$27.43	1.0%
51-2092	Team Assemblers	69	(8%)	\$8.82	\$13.13	0.9%
43-5061	Production, Planning, and Expediting Clerks	68	(20%)	\$11.52	\$21.90	0.9%
49-9041	Industrial Machinery Mechanics	61	9%	\$14.77	\$20.74	0.8%
49-9071	Maintenance and Repair Workers, General	60	(12%)	\$11.66	\$17.56	0.8%
41-1012	First-Line Supervisors of Non-Retail Sales Workers	56	(20%)	\$25.70	\$49.81	0.8%
51-9111	Packaging and Filling Machine Operators and Tenders	50	(19%)	\$8.20	\$13.40	0.7%
41-1011	First-Line Supervisors of Retail Sales Workers	43	0%	\$13.22	\$20.70	0.6%
51-9061	Inspectors, Testers, Sorters, Samplers, and Weighers	40	(15%)	\$11.97	\$18.38	0.5%
51-7011	Cabinetmakers and Bench Carpenters	39	(22%)	\$11.86	\$17.25	0.5%
13-1023	Purchasing Agents, Except Wholesale, Retail, and Farm Products	33	(13%)	\$19.47	\$29.89	0.5%
43-9081	Proofreaders and Copy Markers	31	(24%)	\$13.37	\$18.60	0.4%
<b>Some College or Associate's</b>						
51-5111	Prepress Technicians and Workers	168	(33%)	\$15.99	\$19.92	2.3%
43-9031	Desktop Publishers	51	(29%)	\$14.13	\$19.27	0.7%
<b>Bachelor's or Higher</b>						
27-3041	Editors	309	(25%)	\$16.22	\$28.57	4.2%
27-1024	Graphic Designers	254	(22%)	\$15.81	\$23.29	3.4%
11-1021	General and Operations Managers	111	(27%)	\$28.37	\$56.04	1.5%
27-3022	Reporters and Correspondents	111	(35%)	\$11.26	\$18.20	1.5%
13-1161	Market Research Analysts and Marketing Specialists	77	(7%)	\$16.58	\$30.14	1.1%
13-2011	Accountants and Auditors	66	(19%)	\$21.15	\$34.46	0.9%
27-3043	Writers and Authors	47	(23%)	\$18.68	\$29.73	0.6%
11-2022	Sales Managers	38	(21%)	\$31.45	\$58.48	0.5%
11-3051	Industrial Production Managers	38	(14%)	\$29.26	\$44.84	0.5%

Source: Philadelphia Works analysis of the QCEW Employees & Non-QCEW Employees - EMSI 2013.4 Class of Worker data

## Notes on Data

We followed industry cluster definitions proposed by the Center for Workforce Information & Analysis. Some industries that have a low number of jobs in Philadelphia County were excluded from the analysis and PA industry clusters were formed in the same way to make comparisons possible.

All the wage, employment, and staffing patterns data in this report come from the EMSI 2013.4 Class of Worker Data. EMSI industry data have various sources including the QCEW (Quarterly Census of Employment and Wages), with supplemental estimates from County Business Patterns and Current Employment Statistics. Non-QCEW employee data are based on a number of sources including QCEW, Current Employment Statistics, County Business Patterns, BEA State and Local Personal Income reports, the National Industry-Occupation Employment Matrix (NIOEM), the American Community Survey, and Railroad Retirement Board statistics.

Philadelphia Works worked with the Quarterly Workforce Indicators data available through the U.S. Census and defined the industry clusters at the four-digit NAICS code level. An industry group was assigned to a cluster if most of the employment fell in that cluster. Because the data are cyclical, the quarterly data were smoothed using a simple moving average. This report shows the data for the third quarter of 2012 plus three previous quarters.

The PA Employer Database available through the Center for Workforce Information & Analysis was used to report on the employers by size.