

A Look at the 2018 Labor Market Experiences of Allegheny County Department of Human Services Clients



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EXECUTIVE SUMMARY

This report examines the labor market experiences of a sample of working-age people age 18 to 64 who were involved with the Allegheny County Department of Human Services (DHS) in 2018. The analysis is based on state Unemployment Insurance (UI) earnings records, which capture most forms of employment in Pennsylvania.¹ By investigating our clients' employment experiences, DHS and its partners can gain insight into the economic challenges of our clients and tailor our services, including education and job-related supports, to better meet clients' needs.²

Primary findings include:

- Over half (52%) of the client sample was disconnected from the labor force in 2018, meaning that they did not work in a UI-eligible job or receive UI payments in the year. Only 24% of the sample worked in all four quarters in 2018.
- White DHS clients were six percentage points more likely than Black clients to be disconnected from the labor force in 2018, and males were four percentage points more likely to be disconnected than females.
- Among DHS clients who worked in all four quarters in 2018, 38% had earnings that fell below the federal poverty line for a single individual. Nine percent had earnings that exceeded the Allegheny County median, which indicates a bright spot of steady, gainful employment in the sample.
- DHS clients who worked in the Utilities industry had the highest median earnings in 2018 (\$46,255) out of all industries, while those who worked in the Agriculture, Forestry, Fishing and Hunting industry had the lowest median earnings (\$5,958). Clients' earnings fell below the 2018 Allegheny County median in every industry.
- DHS clients appear to be working in lower-paying positions than the average Allegheny County worker, even when holding constant their occupation and industry. In 2018, DHS clients most commonly worked at retail stores, fast-food restaurants and temporary staffing agencies.
- The findings show that DHS clients are having difficulty both sustaining their participation in the labor market and earning wages comparable to the rest of Allegheny County.

¹ See the **Data and Limitations** section for more information on jobs that are not UI-eligible.

² Allegheny County offers several programs that support employment among vulnerable populations. For more information, please visit <https://www.alleghenycounty.us/Human-Services/Programs-Services/Basic-Needs/Employment.aspx>

BACKGROUND

DHS serves many clients whose lives are economically unstable. One important dimension of a person's economic stability is their ability to earn income through employment. This report describes the labor market experiences of a sample of clients who received DHS services in 2018. The report focuses on three particular DHS client groups that reflect different employment situations:

1. Clients who worked in all four quarters in 2018
2. Clients who worked at some point in 2018, but not in all four quarters
3. Clients who did not work and did not receive any UI payments in 2018

This report provides a strictly descriptive analysis of the patterns of work, earnings and places of employment among these three client groups. This analysis is not meant to advance policy recommendations, but rather to motivate further research by offering a preliminary glimpse into the labor market challenges that DHS clients face.

METHODOLOGY

Data and limitations

The data used in this report comes from Pennsylvania (PA) UI records. Nearly all employers in PA are required to report the pre-tax earnings of their employees to the state government on a quarterly basis. The state government uses these reported earnings to administer payroll taxes and to compute UI payment amounts for people receiving unemployment benefits. DHS obtains the UI records through a data sharing agreement with the PA Department of Labor and Industry (DLI).

One limitation of the UI data is that the earnings amounts are not broken down into an hourly wage and number of hours worked for workers who are paid hourly. This makes it unclear whether a worker's low earnings are more attributable to having a low wage or to working few hours. A second limitation of the UI data is that there may be cases where a client was absent in the data but did actually work in a UI-eligible job in that quarter. There are two reasons why this could occur:

1. DHS might have provided DLI with an incorrect Social Security number for the client, which prevented the client from matching with the UI records.
2. The client's employer might have failed to report the client's UI-eligible employment to DLI. This reporting is required by law, so instances of non-reporting should be rare in principle. However, past research has found that this form of tax evasion does sometimes occur.³

Additionally, a client's absence in the UI records does not necessarily mean that they had no work of any kind in that quarter. This is because PA UI records do not capture certain types of employment, including: military and federal government jobs; self-employment; paid employment between family members; work for agricultural businesses that employ fewer than 10 employees for any part of a day in at least 20 weeks out of the year or that pay less than \$20,000 in total wages in the year; domestic work for private households; local college clubs, fraternities or sororities that pay less than \$1,000 in quarterly wages for four consecutive quarters; informal work; and any employment that takes place outside of PA.⁴

These types of non-UI-eligible jobs comprise an estimated 9% to 14% of all jobs in the U.S.⁵ However, lower-income individuals such as those studied in this report may be disproportionately likely to work in a non-UI-eligible job. One recent study of employment among lower-income workers found that up to one-third of their work would probably not be captured in state UI records.⁶ For these reasons, the UI records used in this report do not fully describe the labor market experiences of DHS clients. Nevertheless, this data provides preliminary evidence on the working lives of DHS clients that can inform further research using other sources of information.

Study sample

The analytic sample in this report consists of the DHS clients⁷ in 2018 for whom DHS was able to obtain UI data for calendar year 2018. The sample is limited to clients ages 18 to 64, because this is the typical age range in which people are employed. The resulting study sample likely provides a representative subset of all working-age DHS clients in 2018.⁸

There are 64,627 individuals in the sample. DHS served far more total clients than this in 2018, but this is the subset of clients that met the above criteria for being included in the sample. **Table 1** breaks down the sample by demographics and by receipt of certain public benefits.

³ Arthur E. Blakemore, Paul L. Burgess, Stuart A. Low, and Robert D. St Louis. "Employer Tax Evasion in the Unemployment Insurance Program," *Journal of Labor Economics*, Vol. 14, No. 2, pp. 210-230, 1996.

⁴ PA OUC, 2018, <https://www.uc.pa.gov/employers-uc-services-uc-tax/covered/Pages/Exclusions.aspx>

⁵ V. Joseph Hotz & John Karl Scholz. "Measuring Employment and Income Outcomes for Low-Income Populations with Administrative

and Survey Data." In Michelle Ver Ploeg, Robert A. Moffitt, and Constance F. Citro (Eds.), *Studies of Welfare Populations: Data Collection and Research Issues* (pp. 275-315). Washington, D.C.: The National Academies Press, 2002.

⁶ Annalisa Matri, Dana Rotz, and Elías S. Hanno. *Comparing Job Training Impact Estimates Using Survey and Administrative Data*. Washington, D.C.: Mathematica Policy Research, 2018.

⁷ DHS provides a wide range of services, including: mental health services; drug and alcohol services; child protective services; at-risk child development and education; housing for the homeless; non-emergency medical transportation; and referrals for supports coordination for individuals with a diagnosis of intellectual disability.

⁸ See the **Appendix** for further explanation of how DHS obtains the UI data, and why the sample is likely representative of all working-age DHS clients in 2018.

Slightly more than half of the sample is female (51%), and the majority of the sample is White (58%). Clients ages 25 to 34 form the largest age group in the sample. Over half of the sample received Supplemental Nutrition Assistance Program (SNAP)⁹ benefits at some point in 2018, and 87% received Medicaid. SNAP and Medicaid are means-tested programs that assist people who have low incomes. The rates of SNAP and Medicaid receipt in **Table 1** indicate that DHS clients often have low incomes. This is not surprising, because many DHS programs are meant to address life challenges that can be related to having low income. In fact, some DHS programs explicitly require the client to have income below a certain level in order to qualify. This should be kept in mind when interpreting the employment and earnings numbers presented below.

TABLE 1: DHS clients in 2018, age 18–64, who were in 2018 UI data

STUDY SAMPLE (N=64,627)		% OF SAMPLE
RACE	White	58%
	Black	35%
	Other	2%
	Missing	5%
GENDER	Female	51%
	Male	49%
AGE GROUP	18 to 24	15%
	25 to 34	26%
	35 to 44	21%
	45 to 54	18%
	55 to 64	19%
	Average age (years)	40
PUBLIC BENEFIT RECEIPT IN 2018	Medicaid	87%
	SNAP	59%
	TANF	7%
	Housing subsidies	12%

Notes: Housing subsidies include public housing, project-based Section 8 and voucher-based Section 8.

Source: Calculations are based on data from UI query file.

EMPLOYMENT AND EARNINGS AMONG THE FULL SAMPLE

The majority of the study sample was disconnected from the labor force in 2018:

- Fifty-two percent (n=33,735) of the study sample did not work in a UI-eligible job or receive UI payments in 2018. For comparison, only 24% of Pennsylvania workers ages 18 to 64 were not in the labor force in 2018.¹⁰
- Less than 1% (n=201) of the sample received UI payments in 2018 without working in a UI-eligible job in the year. A person who is receiving UI payments can be considered attached to the labor force, because they are required to engage in job search and must be willing to accept a job offer.¹¹

⁹ SNAP provides benefits to eligible low-income households for food purchases at grocery stores and supermarkets.

¹⁰ U.S. Census Bureau, 2019, “Current Population Survey table creator.” Retrieved from <https://www.census.gov/cps/data/cpstablecreator.html>

¹¹ The UI earnings data do not allow for the calculation of a labor force participation rate using the official federal definition, because this requires knowing which clients who do not have jobs are actively seeking work. Data from the Current Population Survey since the mid-1990s shows that “typically fewer than one in 10 people not in the labor force

reported that they want a job” (Bureau of Labor Statistics, 2015). This implies that most of the sample clients who did not work in a UI-eligible job in 2018 were not looking for work, meaning that they were not participating in the labor force.

- Twenty-four percent (n=15,477) of the study sample worked in at least one quarter in 2018 but not in all four quarters.
- Twenty-four percent (n=15,214) worked in all four quarters in 2018.

Table 2 compares the race, gender and age composition of three different sample groups: 1) those who worked in all four quarters in 2018; 2) those who worked in at least one quarter in 2018 but not in all four quarters; and 3) those who did not work at all or receive UI payments in 2018. The full-year workers in the sample were more likely to be women than men. This differs from the nationwide trend of women having a lower labor force participation rate than men.¹² The group that did not work or receive UI payments in 2018 was older and more likely to be White than the full study sample.

TABLE 2: Demographic composition of study sample by 2018 labor force status

		WORKED IN ALL FOUR QUARTERS (N=15,214)	WORKED IN AT LEAST ONE BUT LESS THAN FOUR QUARTERS (N=15,477)	DID NOT WORK AT ALL AND RECEIVED NO UI PAYMENTS (N=33,735)
RACE	White	56%	54%	61%
	Black	35%	39%	33%
	Other	3%	2%	2%
	Missing	6%	6%	5%
GENDER	Female	56%	50%	49%
	Male	44%	50%	51%
AGE GROUP	18 to 24	18%	22%	9%
	25 to 34	34%	34%	19%
	35 to 44	23%	22%	20%
	45 to 54	15%	13%	22%
	55 to 64	9%	8%	29%
	Average age (years)	35	34	44

Source: Calculations are based on data from PA UI records.

The DHS clients who worked in a UI-eligible job in 2018 generally earned little money from their work. The median 2018 earnings among workers in the sample was \$7,647. This falls well below the federal poverty line for a single individual, which was \$12,140 in 2018.¹³ In contrast, Allegheny County workers as a whole had median earnings of \$41,060 in 2018.¹⁴ **Figure 1** displays the distribution of the 2018 earnings of the study sample, among clients who had UI-eligible employment at some point in the year.

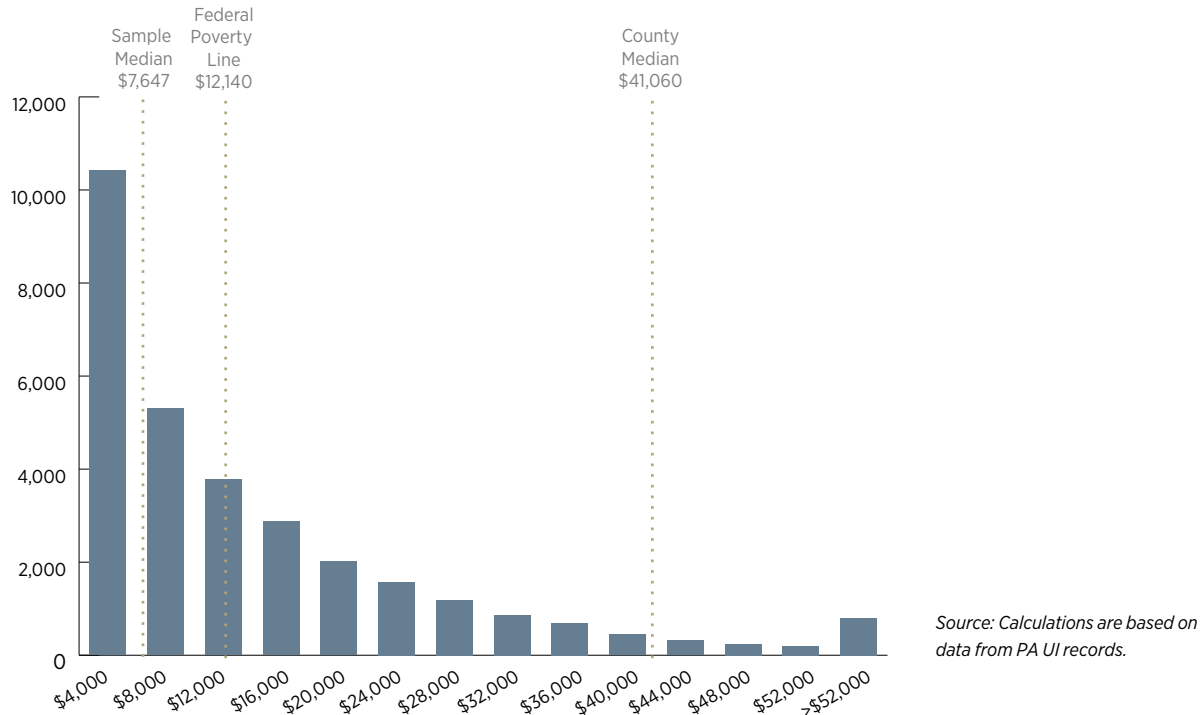
¹² U.S. Department of Labor, Bureau of Labor Statistics, 2019, "Labor Force Statistics from the Current Population Survey, CPS Annual Averages Table 3." Retrieved from <https://www.bls.gov/cps/tables.htm#empstat>

¹³ U.S. Department of Health and Human Services, Office of the Assistant Secretary for Planning and Evaluation (ASPE), 2018, "2018 Poverty Guidelines." Retrieved from <https://aspe.hhs.gov/2018-poverty-guidelines>

¹⁴ Pennsylvania Department of Labor and Industry (DLI), 2018, "Pennsylvania Occupational Wages, Allegheny County Labor Market Area." Retrieved from https://www.workstats.dli.pa.gov/Documents/Occupational%20Wages/County/Alleghco_ow.pdf

The distribution of earnings among sample workers is skewed toward the lowest earnings levels, with a smaller number of middle- and high-income earners. The distribution of earnings is similar between men and women, and between White and Black workers. Over 64% of workers in the sample earned less than the federal poverty line for a single individual in 2018.

FIGURE 1: Distribution of UI-eligible earnings in 2018, among DHS client sample members with nonzero UI-eligible earnings in the year



CLIENTS WHO WORKED IN ALL FOUR QUARTERS IN 2018

Not all DHS clients had trouble maintaining employment in 2018. Almost one quarter of the study sample worked in a UI-eligible job in all four quarters in 2018. Even though these clients were attached to the labor force for the entire year, they still had generally low earnings, as shown in **Figure 2**.

The distribution of earnings among the full-year workers in the sample is again skewed toward lower earnings levels, with a small number of middle- and high-income earners. Approximately 38% of full-year workers in the sample earned less than \$12,140 in 2018, which was the federal poverty line for a single individual in that year.

FIGURE 2: Distribution of UI-eligible earnings in 2018, among DHS client sample members with UI-eligible earnings in all four quarters

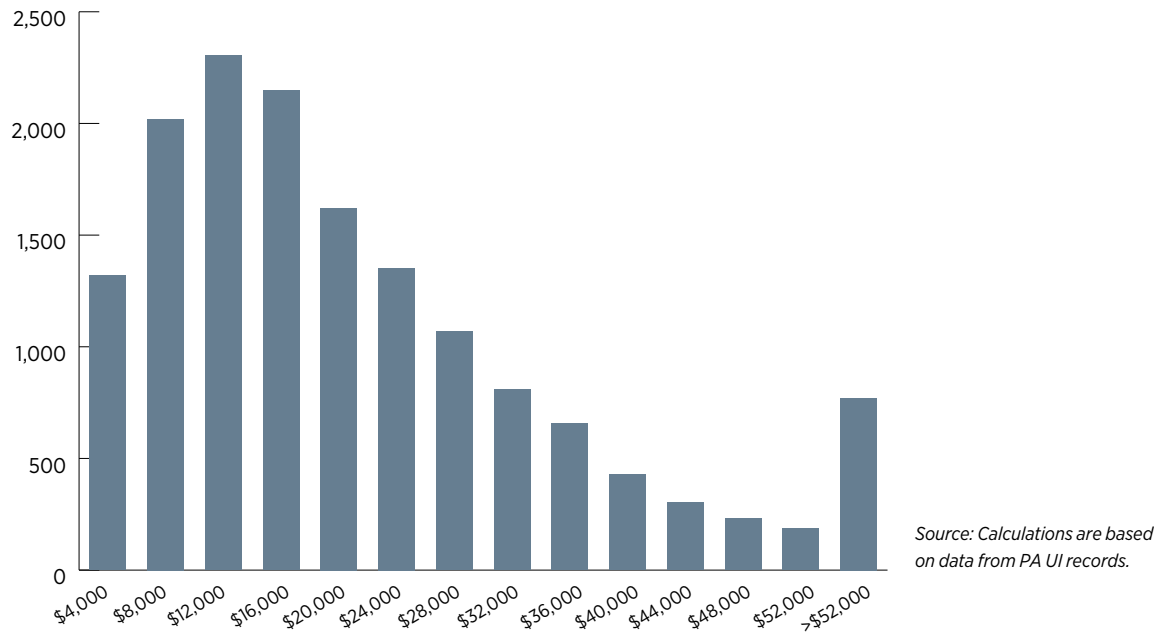


Table 3 breaks down the median 2018 earnings of the full-year workers in the sample by demographic group. Among DHS clients who worked steadily in 2018, Black clients had slightly higher median earnings than White clients. Men had higher median earnings than women, and clients in the 35–44 age group had the highest median earnings among age groups. Overall, the clients in **Table 3** earned little money in 2018 for having worked steadily throughout the year.¹⁵

Interestingly, the client earnings disparities shown in **Table 3** differ from the disparities in the statewide population. Among all Pennsylvania workers in 2017 (the most recent available year of data), White workers had median earnings that were 13% higher than those of Black workers, whereas their earnings in the DHS sample were 1% lower than those of Black workers. Male workers across Pennsylvania had median earnings that were 43% higher than those of females, whereas their earnings in the DHS sample were only 7% higher than those of females.¹⁶

¹⁵ It is possible that some clients had lapses in employment in 2018 that lasted less than a calendar quarter, since the UI records only report earnings at the quarterly level.

¹⁶ U.S. Census Bureau, 2019, “Current Population Survey Table Creator.” Retrieved from <https://www.census.gov/cps/data/cpstablecreator.html>

TABLE 3: Median 2018 UI-eligible earnings among DHS client sample members with UI-eligible earnings in all four quarters

	DHS CLIENTS IN SAMPLE WHO WORKED IN ALL FOUR QUARTERS 2018 (N=15,214)	MEDIAN 2018 EARNINGS
RACE	White	\$15,242
	Black	\$15,487
	Other	\$24,810
GENDER	Female	\$15,194
	White/Black	\$14,659/\$15,671
	Male	\$16,292
AGE GROUP	White/Black	\$16,267/\$15,143
	18 to 24	\$10,506
	25 to 34	\$16,714
	35 to 44	\$19,560
	45 to 54	\$17,114
	55 to 64	\$14,345

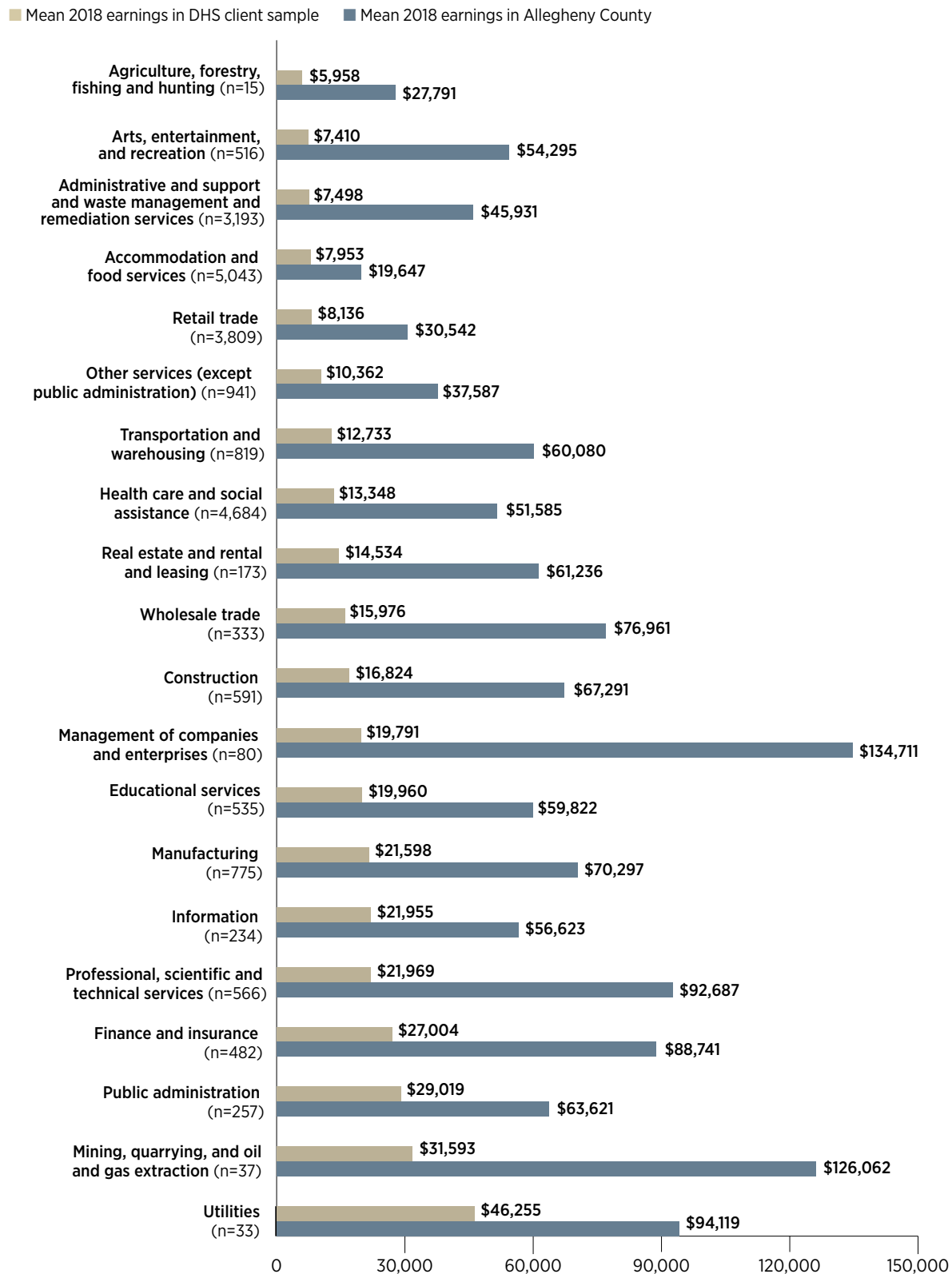
Source: Calculations based on data from PA UI records

Figure 3 breaks down by industry the earnings of DHS clients who worked steadily throughout 2018. The table also compares their earnings with those of all Allegheny County workers. The DHS clients who worked steadily in 2018 had varying levels of earnings, depending on the industry in which they worked. Sample members who worked in the *Utilities* industry had the highest mean 2018 earnings (\$46,255). This industry had the second-highest share of full-year workers (71%) in the sample out of all industries, behind only the *Public Administration* industry (73%). The North American Industry Classification System (NAICS) handbook describes jobs in the *Utilities* industry as those that “provide electric power, natural gas, steam supply, water supply, and sewage removal” (Office of Management and Budget, 2017, p. 119). Workers in the *Agriculture, Forestry, Fishing and Hunting* industry had the lowest mean 2018 earnings (\$5,958). Jobs in this industry are often short-term and seasonal, which can limit their earnings potential. This industry had the second-lowest share of full-year workers in the sample (44%) out of all industries, ahead of only the *Construction* industry (43%).

Not shown in **Figure 3** is the fact that DHS clients’ highest and lowest-earning industries varied according to race and gender. When grouped by industry, men earned the most money in the *Utilities* industry (\$57,369) and the least money in the *Agriculture, Forestry, Fishing and Hunting* industry (\$3,931), while women earned the most money in the *Mining, Quarrying, and Oil and Gas Extraction* industry (\$34,045) and the least money in the *Arts, Entertainment, and Recreation* industry (\$6,177). Black clients had the highest earnings in the *Public Administration* industry (\$28,627) and the lowest earnings in the *Retail Trade* industry (\$6,218), while White clients had the highest earnings in the *Utilities* industry (\$47,725) and the lowest earnings in the *Agriculture, Forestry, Fishing and Hunting* industry (\$6,188).

DHS clients in every industry had 2018 earnings that were below the Allegheny County average. The *Management of Companies and Enterprises* industry had a particularly large disparity between the earnings of DHS clients versus all county workers. In this industry, DHS clients earned more than \$100,000 less than the county average. The earnings disparities in **Figure 3** suggest that, within specific industries, DHS clients tend to work in lower-paying occupations than the typical county worker. Even when working in higher-paying industries such as finance and fossil fuel extraction, DHS clients are still earning less than the local industry average.

FIGURE 3: Mean 2018 UI-eligible earnings among DHS client sample members with UI-eligible earnings in all four quarters, by industry



Source: Calculations are based on data from PA UI records and Quarterly Census of Employment and Wages.

The UI earnings data also report the employee's occupation within a given industry, which provides more detail on a person's labor market experiences. **Table 4** lists the highest- and lowest-earning occupations among the DHS clients who worked in all four quarters in 2018 and compares these earnings with the County average.

The 10 DHS clients who worked in the occupation of *Mixed Mode Transit Systems* had the highest mean 2018 earnings (\$52,141) among all occupations with at least 10 workers in the sample. On the other hand, workers in the occupation of *Public Relations Agencies* had the lowest mean 2018 earnings in the sample (\$1,152).

DHS does not receive data on a client's position or rank within a given occupation. For example, a worker with an occupation of *Family Clothing Stores* could be an entry-level clerk or the chief executive of an entire company. However, **Table 4** sheds some light on the relative position of DHS clients by comparing their occupation-level earnings with those of the entire Allegheny County labor force. DHS clients are earning significantly less than the County average in every occupation in the table. Again, these disparities are particularly large within higher-skill occupations, such as *Computer Systems Design Services*. It appears that DHS clients are working in lower-paying roles and positions within specific occupations.

TABLE 4: Occupations with 10 highest and lowest mean 2018 UI-eligible earnings, among DHS client sample members with UI-eligible earnings in all four quarters

TOP 10			BOTTOM 10		
OCCUPATION	MEAN 2018 EARNINGS IN DHS CLIENT SAMPLE	MEAN 2018 EARNINGS IN ALLEGHENY COUNTY	OCCUPATION	MEAN 2018 EARNINGS IN DHS CLIENT SAMPLE	MEAN 2018 EARNINGS IN ALLEGHENY COUNTY
Mixed Mode Transit Systems	\$52,141	\$72,542	Public Relations Agencies	\$1,152	\$86,387
Electric Power Distribution	\$52,081	N/A	Amusement Arcades	\$1,193	\$19,613
Wired Telecommunications Carriers	\$51,849	\$80,436	Children's and Infants' Clothing Stores	\$1,816	\$11,360
Iron and Steel Mills and Ferroalloy Manufacturing	\$51,488	\$82,602	Other Support Activities for Road Transportation	\$2,429	\$71,480
Custom Computer Programming Services	\$49,645	\$94,015	Family Clothing Stores	\$2,650	\$14,400
Electromedical and Electrotherapeutic Apparatus Manufacturing	\$47,679	\$82,258	Marketing Research and Public Opinion Polling	\$2,652	\$63,593
Computer Systems Design Services	\$44,525	\$98,836	Photography Studios, Portrait	\$2,684	\$29,311
Engineering Services	\$40,322	\$90,667	All Other Business Support Services	\$2,747	\$38,312
Specialty Canning	\$40,027	N/A	Political Organizations	\$2,867	\$47,545
Clay Building Material and Refractories Manufacturing	\$39,885	\$60,313	Fire Protection	\$2,960	\$13,581

Source: Calculations are based on data from PA UI records and Quarterly Census of Employment and Wages.

Note: Analysis is limited to occupations with at least 10 workers in the sample. N/A indicates that the data is not disclosable at the County level in the Quarterly Census of Employment and Wages.

One bright spot within the study sample is the group of clients who worked in all four quarters in 2018 and whose earnings exceeded the Allegheny County median earnings of \$41,060.¹⁷ This group of clients comprises 2% of the total study sample and 9% of the full-year workers in the sample. **Table 5** compares the demographics of the full-year workers who earned above the 2018 County median with the demographics of the full-year workers who earned below the County median. The full-year workers whose earnings exceeded the County median were more likely to be White and male, compared with the full-year workers whose earnings fell below the County median.

TABLE 5: Demographic comparison of DHS client sample members who had UI-eligible earnings in all four quarters, by level of earnings

	DHS CLIENTS IN SAMPLE WHO WORKED IN ALL FOUR QUARTERS 2018 (N=15,214)	EARNINGS ABOVE COUNTY MEDIAN (N=1,394)	EARNINGS BELOW COUNTY MEDIAN (N=13,820)
RACE	White	57%	56%
	Black	26%	36%
	Other	6%	2%
GENDER	Female	42%	58%
	Male	58%	42%
AGE GROUP	18 to 24	3%	20%
	25 to 34	28%	34%
	35 to 44	33%	23%
	45 to 54	22%	14%
	55 to 64	14%	9%
	Average age (years)	41	35

Source: Calculations based on data from PA UI records

Those who earned above the County median in 2018 also tended to work in different types of industries than the below-median earners, as shown in **Table 6**. This table lists the percentage of full-year workers in the sample who worked in each industry in 2018, broken out by whether their earnings were above or below the countywide median. The full-year workers in the sample who had 2018 earnings below the countywide median were more likely to work in lower-paying industries than the clients whose earnings exceeded the countywide median. In fact, the most common industry among the below-median workers was *Accommodation and Food Services*, which was the lowest-paying industry across Allegheny County in 2018. The above-median group had larger percentages of clients working in higher-paying industries such as *Manufacturing* and *Finance and Insurance*.

¹⁷ Pennsylvania Department of Labor and Industry (DLI), 2018, "Pennsylvania Occupational Wages, Allegheny County Labor Market Area." Retrieved from <https://www.workstats.dli.pa.gov/Documents/Occupational%20Wages/County/AlleghenyCounty.pdf>

TABLE 6: Comparison of 10 most common industries among DHS client sample members who had UI-eligible earnings in all four quarters, by level of earnings

INDUSTRY	COUNTYWIDE 2018 EARNINGS RANK	% OF SAMPLE MEMBERS WITH EARNINGS ABOVE THE COUNTY MEDIAN WHO WORKED IN INDUSTRY	% OF SAMPLE MEMBERS WITH EARNINGS BELOW THE COUNTY MEDIAN WHO WORKED IN INDUSTRY
Management of companies and enterprises	1	1%	<1%
Mining, quarrying, and oil and gas extraction	2	1%	<1%
Utilities	3	1%	<1%
Professional, scientific and technical services	4	6%	2%
Finance and insurance	5	6%	2%
Wholesale trade	6	2%	1%
Manufacturing	7	9%	3%
Construction	8	7%	2%
Public administration	9	5%	1%
Real estate and rental and leasing	10	1%	1%
Transportation and warehousing	11	6%	3%
Educational services	12	5%	2%
Information	13	3%	1%
Arts, entertainment and recreation	14	2%	2%
Health care and social assistance	15	21%	20%
Administrative and support, and waste management and remediation services	16	7%	14%
Other services (except public administration)	17	3%	4%
Retail trade	18	8%	17%
Agriculture, forestry, fishing and hunting	19	0%	<1%
Accommodation and food services	20	6%	23%

Source: Calculations are based on data from PA UI records.

CLIENTS WHO WORKED AT SOME POINT IN 2018, BUT NOT IN ALL FOUR QUARTERS

Approximately 24% of the DHS clients in the study sample had UI-eligible employment at some point in 2018 but did not work in all four quarters. These clients may face different types of employment challenges than those of the clients who worked steadily throughout the year. **Table 7** presents the mean 2018 earnings and UI payments among the intermittent workers in the sample.

TABLE 7: Mean 2018 UI-eligible earnings and UI payments among DHS client sample members who worked intermittently in 2018

	DHS CLIENTS IN SAMPLE WHO WORKED INTERMITTENTLY IN 2018 (N=15,477)	MEAN 2018 EARNINGS (\$)	MEAN 2018 UI PAYMENTS (\$)
RACE	White	\$5,323	\$417
	Black	\$4,572	\$332
	Other	\$5,624	\$277
GENDER	Female	\$4,767	\$363
	White/Black	\$4,662/\$4,649	\$380/\$344
	Male	\$5,435	\$398
	White/Black	\$5,945/\$4,493	\$451/\$321
AGE GROUP	18 to 24	\$3,490	\$64
	25 to 34	\$5,334	\$378
	35 to 44	\$5,946	\$526
	45 to 54	\$5,798	\$541
	55 to 64	\$5,145	\$617
	Total	\$5,104	\$381

Source: Calculations are based on data from PA UI records and DHS service records.

DHS clients who worked only intermittently in 2018 tended to earn very little money. These clients had mean 2018 earnings (\$5,104) that fell well below the federal poverty line. The clients in this group also received an average of only \$381 in UI payments in 2018. A worker may qualify for UI payments in PA if they have lost their job through no fault of their own, are willing to accept a new job, and earned a certain minimum amount of money in the five calendar quarters before filing a UI claim.¹⁸ There are several potential reasons why the intermittent workers in the study sample received small amounts of UI payments in 2018. Some of the workers may have left their jobs voluntarily rather than involuntarily. Others may have had insufficient earnings to qualify for UI payments. **Table 7** also reveals that Black intermittent workers in the sample earned 86% of White earnings but received only 80% of White UI payments. This may indicate disparities in the likelihoods of Black and White workers to apply for UI after losing their job.

Apart from having bouts of unemployment, the DHS clients who worked only intermittently in 2018 may also be facing labor market disadvantages during periods when they are employed. To investigate this, **Table 8** compares the average quarterly earnings of the intermittent workers with those of the full-year workers, not counting quarters of unemployment among the intermittent workers.

¹⁸ More information about PA Unemployment Insurance policy can be found at www.uc.pa.gov

TABLE 8: Mean UI-eligible earnings during quarters of work in 2018, by sample group

	MEAN EARNINGS DURING QUARTERS OF WORK IN 2018		
	DHS CLIENT SAMPLE (N=64,627)	WORKED ALL FOUR QUARTERS	WORKED ONLY INTERMITTENTLY
RACE	Black	\$4,746	\$2,256
	White	\$5,114	\$2,650
	Other	\$7,584	\$2,710
GENDER	Female	\$4,779	\$2,327
	Male	\$5,573	\$2,731
AGE GROUP	18 to 24	\$3,187	\$1,684
	25 to 34	\$5,086	\$2,627
	35 to 44	\$6,003	\$2,965
	45 to 54	\$5,994	\$2,948
	55 to 64	\$5,506	\$2,642
	Total	\$5,127	\$2,528

Source: Calculations are based on data from PA UI records.

Even when excluding their quarters of unemployment, the DHS clients who worked intermittently in 2018 earned less money per quarter than the clients who worked in all four quarters. This suggests a relationship between inconsistent employment and low earnings during employment. Workers who have trouble maintaining employment may have deficits in skills or education that lead to low wages. Shorter employment spells may give employees less of a chance to advance in their position and grow their earnings. Alternatively, workers may be discouraged from sticking with a job for multiple quarters if the pay is low. The intermittent workers in the sample may also be working at organizations that pay relatively lower wages and have higher employee turnover rates. **Table 9** presents the 10 most common places of employment among the study sample in 2018, comparing the intermittent workers with the full-year workers.

TABLE 9: Ten most common employers among DHS client sample

INTERMITTENT WORKERS		FULL-YEAR WORKERS	
EMPLOYER	NUMBER OF EMPLOYEES	EMPLOYER	NUMBER OF EMPLOYEES
Giant Eagle	399	Giant Eagle	598
PeopleReady (temporary staffing agency)	305	Walmart	356
Primary Aim (Wendy's franchise)	292	UPMC Presbyterian Shadyside	346
Express Services Inc. (temporary staffing agency)	227	Eat'n Park	328
Eat'n Park	221	Primary Aim (Wendy's franchise)	286
Walmart	210	PeopleReady (temporary staffing agency)	211
Commercial Employees (temporary staffing agency)	178	West Penn Allegheny Health	192
Lewandowski Limited Partnership (McDonald's franchise)	169	Achieva Support	169
UPS	160	Alorica	159
McDonald's	151	Express Services Inc. (temporary staffing agency)	152

Source: Calculations are based on data from PA UI records.

Three of the top 10 employers of the intermittent workers are temporary staffing agencies, which partly explains the sporadic work among this group. While staffing agencies sometimes place workers into higher-wage jobs, the sample members who worked for these three agencies had median 2018 earnings of just \$5,394. This suggests that their temporary job placements likely paid low wages. Many of the employers in **Table 9** are retail firms that tend to have higher rates of turnover and pay lower wages. Three of the employers in the table — Giant Eagle, UPMC Presbyterian Shadyside and West Penn Allegheny Health—fall within Allegheny County’s 10 largest employers, while Walmart and Eat’n Park fall within the county’s top 50.¹⁹ Together, the organizations in **Table 9** employed 8% of all workers in the study sample.

CLIENTS WITH NO EARNINGS OR UI PAYMENTS IN 2018

A third noteworthy group of DHS clients are those who had no UI-eligible earnings in 2018 and received no UI payments. These individuals may be facing the highest barriers to employment among all DHS clients, since they were disconnected from the labor force for at least an entire calendar year. **Table 10** presents the rates of disconnection from the labor force in 2018 among the study sample. White DHS clients had a higher rate of disconnection from the labor force in 2018 than Black clients, and men had a higher rate of disconnection than women. Clients ages 55 to 64 had the highest rate of disconnection (79%) among all age groups.

TABLE 10: Percentage of DHS client sample that had no UI-eligible earnings or UI payments in 2018

	DHS CLIENTS IN SAMPLE WHO HAD NO UI-ELIGIBLE EARNINGS OR UI PAYMENTS IN 2018 (N=33,735)	% OF SAMPLE
RACE	White	55%
	Black	49%
	Other	48%
GENDER	Female	50%
	White/Black	54%/46%
	Male	54%
AGE GROUP	White/Black	56%/53%
	18 to 24	33%
	25 to 34	38%
	35 to 44	49%
	45 to 54	63%
55 to 64	79%	

Source: Calculations based on data from PA UI records

¹⁹ Pennsylvania Department of Labor and Industry (DLI), 2019, “Allegheny County Top 50 Employers, 1st Quarter 2019.” Retrieved from https://www.workstats.dli.pa.gov/Documents/Top%2050/Allegheny_County_Top_50.pdf

DISCUSSION

Working-age DHS clients appear to be facing several challenges in the labor market. The clients who worked in all four quarters in 2018 tended to have earnings that were much lower than the Allegheny County average, even within specific industries or occupations. DHS clients thus represent a more disadvantaged segment of the county labor force. Despite their steady employment, these clients often had annual earnings that barely exceeded the federal poverty line for an individual. This group of DHS clients may require additional education, training, and other supportive services to increase their wages or the number of hours that they are able to work.

A second group of DHS clients worked only intermittently in 2018. These clients earned very little money in 2018, with median earnings of just \$3,006. They most commonly worked at retail stores, fast food restaurants, or temporary staffing agencies. These types of employers often pay relatively low wages and have higher rates of employee turnover. Even when disregarding quarters of unemployment, the intermittent workers in the sample had lower earnings per quarter than the full-year workers. These findings suggest that the intermittent workers are facing two types of labor market challenges: they are having trouble maintaining consistent employment, and they are struggling to earn enough money during periods of employment.

Over half of the DHS client sample had no UI-eligible earnings and received no UI payments in 2018. These individuals may be facing the most severe labor market challenges of all DHS clients, since they were disconnected from the labor force for at least an entire year. Rates of disconnection in the sample increased in step with the age of the client, and a full 87% of the oldest clients in the sample (age 64) were disconnected in 2018. Older workers are more likely to face age discrimination in hiring, and they may be more likely to leave the labor force altogether when facing unemployment.²⁰ For the disconnected DHS clients who are able to work and wish to be employed, more substantial supports and services may be required to address their barriers to entering the labor market.

The low earnings and rates of employment among DHS clients should not necessarily be surprising because DHS tends to serve disadvantaged populations by virtue of the services that it provides. Some DHS programs explicitly require clients to have low incomes in order to qualify, which partly explains the low earnings observed in this report. Nonetheless, the findings in this report illustrate the close relationship between labor market difficulties and the receipt of human services. One positive exception to this relationship is the group of DHS clients who worked steadily throughout 2018 and had earnings above the countywide median. The circumstances of these clients warrant further study, as they may contain insights into how social services can best promote gainful employment.

²⁰ David Neumark, Ian Burn, and Patrick Button. "Is It Harder for Older Workers to Find Jobs? New and Improved Evidence from a Field Experiment." *Journal of Political Economy*, Vol. 12, No. 2, pp. 922–970, 2019.

²¹ Annalisa Mastri, Dana Rotz, and Elías S. Hanno. *Comparing Job Training Impact Estimates Using Survey and Administrative Data*. Washington, D.C.: Mathematica Policy Research, 2018.

Finally, the limitations of UI earnings data must be kept in mind when interpreting the above findings. UI records do not include certain types of jobs, such as self-employment and other informal work arrangements. There is some evidence that these types of jobs are particularly common among lower-income populations.²¹ This means that the findings may not be capturing a substantial portion of the earnings that help DHS clients make ends meet. While this report provides an initial glimpse into the working lives of DHS clients, more work remains to better understand and address the employment challenges faced by Allegheny County's vulnerable populations.

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²¹ Annalisa Mastri, Dana Rotz, and Elías S. Hanno. *Comparing Job Training Impact Estimates Using Survey and Administrative Data*. Washington, D.C.: Mathematica Policy Research, 2018.

APPENDIX**APPENDIX****Choice of study sample**

The study sample used in this report is the subset of 2018 DHS clients for whom DHS was able to obtain UI data for calendar year 2018. DHS was not able to obtain UI data for every single 2018 client for two reasons. First, DHS was able to request 2018 UI data only for people who received DHS services in one specific calendar quarter. This meant that DHS could not obtain 2018 UI data for a full year's worth of clients. This left the author to choose the quarterly DHS client cohort for which to examine the 2018 earnings; I chose to examine the 2018 earnings of clients who received DHS services in the fourth quarter of 2018.

The second reason that DHS was not able to obtain UI data for every single 2018 client is because some DHS clients do not have a valid Social Security number (SSN) on file. DLI requires this information to locate individuals in the UI records.

The group of clients yielded by this sampling approach can most likely be considered a representative subset of all 2018 DHS clients. Among all 2018 DHS clients, there is no apparent reason why those who received a DHS service in the fourth quarter of the year would have systematically different labor market experiences than those who received services in other parts of the year. There is also no apparent reason why a client's likelihood of having an invalid SSN on file would correlate with their labor market experiences. Thus, the study sample can most likely be used to make unbiased inferences about the employment and earnings of all working-age DHS clients in 2018.

Variation in employment and earnings across DHS service groups

It is important to note that DHS client earnings vary depending on what services the client has received.

Table 11 presents the number and percentage of all DHS clients in 2018 who appear in the study sample, broken out by 2018 DHS service involvement.

APPENDIX

TABLE 11: Study sample coverage of DHS clients in 2018, by DHS service

DHS SERVICE	DESCRIPTION OF SERVICE	CLIENTS IN THE STUDY SAMPLE		
		TOTAL CLIENTS SERVED IN 2018	NUMBER	% OF ALL 2018 DHS CLIENTS
Aging	The Area Agency on Aging (AAA) helps older Allegheny County residents to live safe, healthy and independent lives. Services include senior centers, transportation, adult foster care, in-home services and caregiver support.	27,371	2,493	9%
Children with child welfare system involvement	Children ages 18 or younger who are associated with a child welfare allegation, investigation or case.	8,578	613	7%
Parents of children with child welfare system involvement	Parents of children associated with a child welfare allegation, investigation or case.	8,637	7,367	85%
Substance use disorder	Substance use disorder services that are paid for by Allegheny County or Medicaid. Includes clinical services, such as individual and group therapy, as well as non-clinical services, such as case management and peer recovery support.	15,206	14,275	94%
Family support centers	Neighborhood-based centers that serve children and parents through support groups, activities, mentoring and in-home services.	8,806	3,078	35%
Home visiting	Provide pregnant women, as well as parents and caregivers of children ages 0-5, with services to promote child development and positive parenting techniques.	7,238	2,520	35%
Homelessness prevention	Services for households experiencing a housing crisis. Services include housing assistance, case management, prevention and outreach.	8,737	5,174	59%
Independent living	Youth ages 14 to 24 who have had at least 30 days of child welfare placement services on or after their 14th birthday and are receiving services designed to prepare them for living independently as adults.	1,816	1,210	67%
Intellectual disabilities	Institutional and community-based services for people with intellectual disabilities.	6,449	5,013	78%
Medical Assistance transportation program	Provides shared transportation, bus passes and gas reimbursement for Allegheny County Medicaid recipients. Transportation must be for non-emergency medical services, such as physical health (doctor, dentist, pharmacist, psychologist) or behavioral health (mental health and drug and alcohol counseling and treatment) services.	18,123	13,833	76%
Mental health	Mental health services that are paid for by Allegheny County or Medicaid. Includes both clinical services, such as individual and group therapy, and non-clinical services, such as case management.	61,905	40,300	65%

APPENDIX

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DHS SERVICE	DESCRIPTION OF SERVICE	CLIENTS IN THE STUDY SAMPLE		
		TOTAL CLIENTS SERVED IN 2018	NUMBER	% OF ALL 2018 DHS CLIENTS
Peer mentoring	Youth Support Partners (YSP) are young adult professionals who have personal experience in some area of the human services or juvenile probation system. They share their insights with youth currently in the system, advocate for them and mentor them.	657	238	36%
Self-sufficiency	Services for low-income heads of households to help improve self-sufficiency, such as case management, job training and modern office systems training.	142	129	91%
Total		127,210	64,627	51%

Source: Calculations based on data from UI query file.

Note: The total row does not equal the sum of the service rows because some clients received more than one service in 2018.

The DHS services with lower rates of representation in the study sample tend to serve larger proportions of children or senior citizens, since the sample is limited to clients ages 18 to 64. This explains why only 9% of Aging clients and 7% of children with child welfare involvement appear in the study sample. Clients receiving substance use disorder services have the highest rate of representation in the study sample (94%). Some of the variation in sample coverage across services is a result of the service groups having different rates of valid SSNs in DHS records, since the study sample is limited to clients with valid SSNs.

Table 12 presents the median earnings, employment rates and receipt of public benefits among the study sample in 2018, broken out by 2018 DHS service involvement.

APPENDIX

TABLE 12: Earnings, work status and receipt of public benefits among study sample in 2018, by DHS service

DHS PROGRAM	MEAN 2018 EARNINGS (\$)	WORKED IN ALL FOUR QUARTERS 2018 (%)	WORKED ONE TO THREE QUARTERS IN 2018 (%)	DID NOT WORK OR RECEIVE UI PAYMENTS IN 2018 (%)	TANF IN 2018 (%)	SNAP IN 2018 (%)	MEDICAID IN 2018 (%)	HOUSING SUBSIDIES IN 2018 (%)
Aging	\$3,612	9%	5%	85%	1%	50%	74%	13%
Children with child welfare system involvement	\$3,844	27%	44%	30%	10%	84%	99%	21%
Parents of children with child welfare system involvement	\$8,670	26%	28%	45%	17%	49%	95%	20%
Substance use disorder	\$5,054	17%	34%	48%	15%	56%	75%	12%
Family support centers	\$13,088	42%	26%	32%	7%	68%	96%	7%
Home visiting	\$12,399	40%	28%	32%	16%	57%	91%	18%
Homelessness prevention	\$4,724	20%	30%	49%	16%	81%	90%	14%
Independent living	\$4,793	31%	45%	24%	1%	36%	92%	4%
Intellectual disabilities	\$2,012	29%	10%	61%	5%	61%	90%	11%
Medical Assistance transportation program	\$2,781	12%	21%	66%	21%	60%	84%	25%
Mental health	\$5,298	21%	25%	54%	25%	64%	86%	25%
Peer mentoring	\$2,587	23%	41%	36%	17%	45%	99%	18%
Self sufficiency	\$6,885	31%	34%	31%	19%	80%	96%	20%
All Programs	\$6,050	24%	24%	52%	6%	59%	87%	12%

Note: Housing subsidies include public housing, project-based Section 8, and voucher-based Section 8.

Source: Calculations are based on data from PA UI records and DHS service records.

Clients who received Intellectual Disabilities services in 2018 had the lowest mean earnings in the year (\$2,012) out of all DHS service groups, while Family Support Center clients had the highest mean earnings (\$13,088). Family Support Center clients also had the highest rate of working in all four quarters (42%). Aging clients were most likely not to have worked or received UI payments in 2018 (85%).

The high rates of public benefit receipt among the study sample, particularly SNAP and Medicaid benefits, provide further evidence that DHS clients tend to be economically disadvantaged. At the same time, the differences in earnings and public benefit receipt across the service groups suggest that some DHS programs tend to serve more disadvantaged clients than others. This is partly because the various DHS services have differing eligibility criteria. Some of the services are explicitly means-tested, while others are not. Differences in earnings across service groups may also indicate that some DHS services are more closely related to having barriers to work than others. Further research is needed to more fully explain the differences in earnings across DHS service groups.