

The Status of Infants and Toddlers in Philadelphia

David Murphey, Dale Epstein,
Sara Shaw, Tyler McDaniel, and
Kathryn Steber

June 2018

Child **TRENDS**

Table of Contents

Executive Summary	1
Introduction	4
Methodology.....	5
Infants and Toddlers and Their Families	7
Demographics	7
Family and community context	7
Fertility and birth rates.....	7
Family structure.....	8
Births to unmarried women; births to teens.....	10
Parental employment.....	10
Immigrant status	11
Home language.....	13
Reach Indicators.....	15
Public support systems	15
Home visiting.....	15
Developmental screening and early intervention services	15
Early care and education	16
Child care.....	16
Child care shortage	16
Early Head Start	20
Health insurance coverage	20
Supplemental Nutrition Assistance Program	21
Risk Indicators	22
Income/poverty	22
Concentrated poverty.....	25
Child health and well-being	26
Prenatal care.....	26
Smoking during pregnancy.....	27
Preterm births	27

Low birthweight..... 28

Breastfeeding 29

Asthma 29

Infant mortality 30

Lead poisoning 31

Immunizations 32

Family circumstances..... 34

 Child maltreatment..... 34

 Foster care 35

 Housing instability/homelessness..... 36

Conclusion 37

References 39

Appendix A: Data Tables for Figures 46

Appendix B: Map of Philadelphia with Zip Codes 49

Appendix C: Zip Code Tables for Maps..... 50



Executive Summary

Improving the well-being of young children is one of the most important investments a community can make. Infancy and toddlerhood are periods of rapid physical, cognitive, social, and emotional development. During these years, children need nurturing care and appropriate stimulation from their family and friends, as well as community-, state-, and national-level programs and services to ensure positive present and future outcomes. Conversely, we know that negative early experiences (such as poverty), insufficient nurturing and stimulation, poor access to health care, and a lack of other important family supports can have lasting harmful impacts.

Philadelphia has taken bold steps that acknowledge the importance of children’s earliest years to ensure a positive future for the city. New initiatives, led by both municipal government and the private, nonprofit sector, are elevating Philadelphia’s profile as a leader in lifting young children to the top of the civic agenda. Through these initiatives, leaders are working to foster cross-sector collaboration to improve the long-term outcomes for young children.

At the same time, the city and its residents continue to face stiff challenges. This is a time of transition for Philadelphia in many respects, as the city is experiencing changes in demographics, economic growth, housing patterns, and access to education. Philadelphia is simultaneously becoming a richer and poorer city. While poverty and deep poverty continue unabated, Philadelphia is experiencing residential growth (The Pew Charitable Trusts, 2017a).

The sixth-largest city in the United States, Philadelphia is a diverse, multi-racial, multi-ethnic city, and a reflection of the nation’s current demographic transformation. By 2044, the majority of the U.S. population will be people of color (Colby & Ortman, 2014). Philadelphia is home to about 66,000 children under age three (i.e., infants and toddlers), and already, most among these youngest children (69.8 percent as of 2016) are children of color.^a While the city has in place numerous programs and services to support its youngest residents, disparities in well-being that follow geographic, racial, and ethnic lines are still evident—a reflection of a long

^a In this report, “white” refers to white, non-Hispanic; “black” to black, non-Hispanic; “Asian” to Asian, non-Hispanic; and Hispanics, who may be of any race.

legacy of discrimination and disenfranchisement. Despite many bright spots of hope, extremes of poverty and wealth continue to cast a shadow on the city's future—including that of its youngest residents.

This report provides a portrait of the well-being of Philadelphia's youngest children. It includes a range of indicators (objective measures) intended to highlight how this group is faring, and how its well-being compares with national data. While indicators cannot tell us the underlying reasons why the data appear as they do, they can help identify disparities in well-being, or in the availability or receipt of services. Indicators in this report focus on child- and family-level risk factors for early development, such as poverty, health and safety, and family and community characteristics. The report also highlights the reach of public support systems, including early care and education programs, that can mitigate developmental risks, and promote positive development and resilience.

While this report draws upon publicly available data (e.g., from national surveys) and administrative data provided by the city of Philadelphia and state of Pennsylvania, it does not include all relevant indicators of infant/toddler well-being. Some desired indicators data are missing here, either because they are not routinely collected or were not available for this report. Examples include data on routine/preventive medical care, as well as community-level assets and the strengths of families and young children themselves—like secure parent-child attachment—which we know can promote positive development and mitigate some of the risks noted in the report (Ranson & Urichuk, 2008).

Further, there is a need for more data that can be reported at sub-city geographic levels. While some data are available at the level of zip codes,^b most indicators can be reported only on a citywide basis. This lack of capacity limits our understanding of neighborhood-level variability, both in terms of outcomes and in the effectiveness of interventions. Despite these limitations, the data we can include here highlight areas where Philadelphia's infants and toddlers are faring better, worse, or about the same as their peers nationally, and compared to some other cities with similar demographic characteristics, including size and poverty rates. Perhaps most importantly, the report provides baseline data that can serve as a reference point by which to assess the effectiveness of efforts—both those already underway and those yet to be undertaken—to improve prospects for all the city's infants and toddlers.

Key findings

- **More than 7 in 10 parents (71.7 percent) of Philadelphia's infants and toddlers are in the labor force. Although that rate is lower than the national rate (74.1 percent), it is higher than for comparable cities.^c** For example, Chicago's rate is lower (70.4 percent), and labor force participation in Philadelphia is nearly 10 percentage points higher than New York's (61.8 percent).
- **To promote early learning and meet the needs of working parents, the number of affordable, high-quality early care and education programs in Philadelphia has increased over the last several years. However, since 2014, the focus has largely been on increasing available resources for preschool-aged children; infants and toddlers have more limited options.** For example, in July 2017, slightly fewer than 2,800 infants and toddlers receiving child care subsidies were being served in Keystone STARS 3- and 4-star rated programs, which are considered high-quality child care programs.^{d,e} Moreover, Early Head Start, also considered

^b Philadelphia has 49 zip code areas (or partial zip code areas) within its boundaries.

^c Data from Philadelphia are compared to data from four cities of similar size, and comparable poverty rates.

^d This is a point-in-time estimate, not a cumulative total.

^e Keystone STARS is Pennsylvania's Quality Rating and Improvement System.

high-quality by the state, has a limited reach: Less than 3 percent of infants and toddlers who are eligible are receiving those services, which is less than half the corresponding nationwide percentage (eight percent).

- **Despite their parents' work efforts, nearly one-third (32 percent) of Philadelphia's infants and toddlers still live in poverty—perhaps the single greatest risk to children's development.** Comparing Philadelphia to other cities, New York has a lower share of infants and toddlers in poverty (25.4 percent), while Detroit's share is much higher (62.3 percent), nearly double Philadelphia's.
- **Nearly two-thirds (65 percent) of infants and toddlers live in neighborhoods of concentrated poverty.**^f In fact, Philadelphia's infants and toddlers are twice as likely to live in neighborhoods with concentrated poverty than the national average. Philadelphia's Hispanic infants and toddlers are disproportionately likely to live in concentrated poverty, compared to their non-Hispanic peers.
- **Some health measures for Philadelphia's infants and toddlers compare poorly to national averages.** Rates of infant mortality, low birthweight, and late or no prenatal care are higher than national averages, and the percentage of new mothers who breastfeed in Philadelphia is lower than the national percentage. However, among Philadelphia's black mothers, the rate of breastfeeding is higher than among their U.S. peers.
- **At the same time, several indicators of risk for infants and toddlers are notably better in Philadelphia than the United States as a whole.** For example, the rate of smoking during pregnancy is lower in Philadelphia than the national rate. Additionally, more young children are up-to-date on immunizations in Philadelphia (77.0 percent) than the national average (70.7 percent).
- **Compared to the national average, Philadelphia has a higher percentage of births to women who are unmarried; this can be associated with disadvantage because economic insecurity is so prevalent in this group.** In 2016, 56 percent of Philadelphia women were unmarried when they gave birth, compared to just under 40 percent nationally.

Our report aims to deepen state and city level stakeholders' understanding of how Philadelphia's youngest residents are faring, and where there are opportunities for improvement. This information can be used as a reference point as the city's leaders continue to evaluate how young children (and their families) are doing, and to inform decision making and monitor progress to better support young children.

^f Concentrated poverty is defined as census tracts where the poverty rate of households is 20 percent or higher.



Introduction

The first years in a child's life are a period of rapid development and growth. During infancy, in the context of family and other significant relationships, children begin learning many of the skills they will need to be successful in life (National Scientific Council on the Developing Child, 2004). During these early years, children form their first relationships with caregivers, learn how to walk and talk, and lay the foundation for more sophisticated cognitive, social, emotional, and motor skills. In fact, during the first years of life, a young child's brain is growing rapidly and making more than one million new neural connections every second (Harvard University Center on the Developing Child, 2009). However, these years (from birth to a child's third birthday) are also marked by the highest risk for experiencing poverty, homelessness, maltreatment, and entry into foster care, all of which can compromise children's later school success, health, and well-being (Child Trends DataBank, 2016a; Perlman & Fantuzzo, 2010; Child Trends DataBank, 2016b; Kids Count Data Center, 2015).

Philadelphia is home to more than 24,000 infants (under age one) and approximately 66,000 children under age three (U.S. Census Bureau, 2016). Like all infants and toddlers, Philadelphia's youngest children are influenced by their relationships with those who care for them and the communities in which they live. Sensitive, nurturing care; a supportive community of neighbors; and family-friendly services and policies can greatly benefit young children.

Along with an impressive array of initiatives focused on improving economic and educational opportunities, public safety, and workforce diversity for its residents (City of Philadelphia, Office of the Mayor, n.d.), Philadelphia has made the well-being of young children a top priority. Recognizing the importance of school readiness, the mayor introduced *PHL Pre-K*, a commitment to expanding access to high-quality pre-K, in 2016. Complementing this program are two public-private initiatives that focus on improving outcomes for young children citywide. *A Running Start-Early Learning* (Shared Prosperity Philadelphia, n.d.) aims to improve access to high-quality early learning by strengthening the systems that support children from birth to age five.

A Running Start-Health (City of Philadelphia, n.d.) focuses on preventive health among the same age group. Both initiatives include a strong emphasis on infants and toddlers. In addition, both reflect the interconnectedness of young children’s cognitive, physical, and social-emotional development. They also foster cross-sector collaboration around the work of improving long-term outcomes for Philadelphia’s youngest residents.

Philadelphia’s population reflects the nation’s increasing racial and ethnic diversity. The majority of city residents are people of color, which, by 2044, will be true for the United States as a whole (Colby & Ortman, 2014). Philadelphia (like many parts of our nation) struggles with extreme inequalities of income and wealth, including chronic poverty. For the last 10 years, more than one in four (25.8 percent) Philadelphia residents have lived below the poverty line, and more than one in eight (12.2 percent) lived below 50 percent of the federal poverty line (The Pew Charitable Trusts, 2017b). Of the ten most populous U.S. cities, Philadelphia is the poorest, with 25.7 percent of residents living below the poverty line in 2016, followed by Houston (21 percent) and Phoenix (20 percent).

Philadelphia is becoming simultaneously a richer and poorer city. Although more than one-quarter of the population lives in poverty, increasing numbers of wealthy Philadelphia residents are driving (unequal) economic growth, widening disparity between those who are wealthy and those living in poverty. While Philadelphia’s poverty and deep poverty remain unabated, the city continues to grow. For example, in 2014 Philadelphia almost doubled the number of residential building permits issued since 2006 (The Pew Charitable Trusts, 2017a). Consequences of this imbalance include a critical shortage of affordable housing, increasing concern about the displacement of vulnerable residents, and a widening cultural gulf between rich and poor Philadelphians.

This report highlights the well-being of Philadelphia’s infants and toddlers, from birth through age three. Reflecting where the most reliable data lie, the indicators in this report focus on the risks to early development, such as poverty, health and safety, and family and community characteristics. However, the report also highlights the reach of public support systems, including early care and education programs, that can mitigate developmental risks and promote resilience. The data provide a starting point for stakeholders invested in supporting infants and toddlers—to learn how Philadelphia’s youngest children are faring and to determine where additional supports may be needed.

Methodology

This report aims to provide a snapshot of the status of Philadelphia’s infants and toddlers by examining valid indicators of well-being. To determine what data to include in this report, the Child Trends team generated an initial list of indicators based on our knowledge of public-use data sources, and indicators used in similar infant-and-toddler reports (e.g. Murphey, Cooper, & Forry, 2013). Next, the proposed indicators were reviewed by key Philadelphia stakeholders. The stakeholders worked with Child Trends to identify further indicators considered important for decision-makers and for which adequate data were available. The final selection of indicators included here draws from a wide range of data sources, including national surveys (e.g., from the U.S. Census Bureau) and aggregate state- and city-level agency data. While the data presented here refer to young children in aggregate, we know that behind every data point are unique individuals who are precious to their families and communities. There are a few important points to note about the data presented here:

1. **For many indicators, data on children’s or parents’ race and ethnicity are limited, depending on the data source.** In addition to offering several predetermined options for reporting race/ethnicity, some data sources include an “other” category and some report how many parents

prefer not to report this information. To maintain consistency in reporting, we primarily adopt four such categories: white (white, non-Hispanic); black (black, non-Hispanic); Hispanic; and Asian. In some cases, we deviate from these categories because of how the data were originally collected; those differences are noted in the report tables.

- 2. The report includes national estimates, when available, along with Philadelphia-specific data, to provide some context.**
- 3. For additional context, comparable data from four other cities are provided for selected indicators.** Four cities—Chicago, Cleveland, Detroit, and New York—were chosen as close peers of Philadelphia, based on similar population size and demographics. Unfortunately, for these inter-city comparisons, sample sizes were sufficient only for the total number of infants and toddlers (or their families) and did not allow for more fine-grained analyses.
- 4. For nationally available data, this report largely relies on the use of one-year estimates.** This approach allowed us to draw comparisons between local and national data during the same time period. However, the one-year estimates of the national surveys are not as reliable as the five-year estimates because of their smaller sample sizes.

While we focus on selected indicators of child well-being, we could not include data for all factors that affect early development. Specifically, national data are sparse on the strengths of young children and their families (e.g., secure parent-child attachment), and regarding the assets of the communities where they reside (e.g., neighborhood safety, access to safe places to play and community resources)—both of which impact child well-being. While vitally important, there are significant challenges to collecting these data in ways that are unbiased and culturally sensitive. Nonetheless, we recommend that further development of positive indicators be part of the city's agenda for future information-gathering.

The report first examines the demographic makeup of Philadelphia's infants and toddlers. Next, it examines the number of children and families who are, or could be, served through the reach of numerous programs and services that support early health, care and education, and family support. We include programs and services such as home visiting, child care subsidy, developmental screenings, and Early Head Start. Third, the report examines indicators of risk to young children and their families. These include poverty, health problems, pre- and post-natal care, and circumstances of special vulnerability, such as foster care, immigrant status, and housing instability. Whenever possible, we use national data and data from select cities to serve as comparisons to the Philadelphia data.

A note on sub-geographic analysis

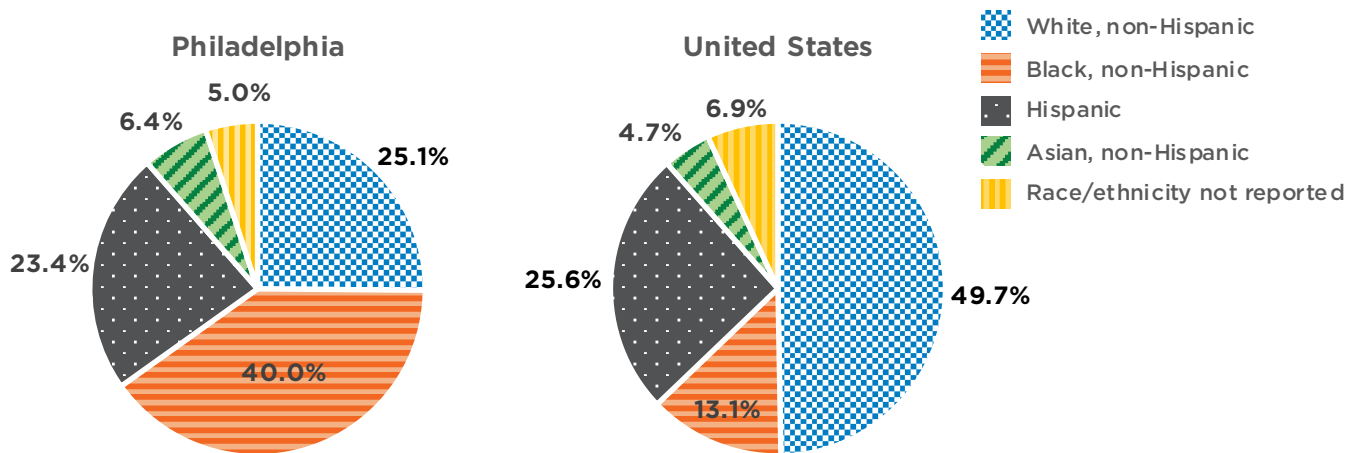
For many early childhood initiatives, it is important to understand the geographic dispersion or concentration of risk and promotive factors (e.g. home visiting, early childhood education) at a scale appropriate to guide interventions, while maintaining reasonable reliability. Child Trends consulted with key local stakeholders with expertise in analyzing city-level data to identify the most appropriate sub-city level for analysis. For many indicators, data at the sub-city level were not available. However, where the appropriate data were available, we broke them out by sub-city regions (typically zip codes). When possible, we also incorporated geographic analyses done by other organizations in the city, such as the Reinvestment Fund's ChildCareMap.org. A list of agencies that provided data for this report is available in the Acknowledgements section at the end of this report.

Infants and Toddlers and Their Families

Demographics

In 2016, there were 66,388 children (birth to age three) in Philadelphia, which represented 4.2 percent of the total population. Of this age group, 24,101 were infants (younger than one year). When examining the demographic composition of infants and toddlers (ages 0-2) in Philadelphia, 40.0 percent of these children were black, 25.1 percent white, 23.4 percent Hispanic, and 6.4 percent Asian; 5.0 percent had no race or ethnicity reported (see Figure 1). This demographic composition differs at the national level, where 49.7 percent of infants and toddlers were white, 25.6 percent Hispanic, 13.1 percent black, 4.7 percent Asian, and 6.9 percent with no race or ethnicity reported (see Figure 1). Data tables for all graphs and figures in the report can be found in Appendix A.

Figure 1. Children Ages 0-2, by Race/Hispanic Origin



Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data.

Note: Within each age category, categories do not add up to 100 percent because the race/ethnicity of some infants/toddlers is not represented (approximately 7 percent nationally and 5 percent in Philadelphia identify as other races/ethnicities).

Family and community context

The families and communities in which children grow up influence their development in profound ways. Parents and others with whom a child interacts can both foster and hinder his or her development. Safe, nurturing caregivers and communities that allow young children ample opportunity to explore and engage with their surroundings offer the best potential for optimal growth and development.

Fertility and birth rates

Birth rates refer to the number of births per 1,000 women. Sustained high birth rates may mean that a community will experience rapid population growth that it is unprepared to accommodate. Conversely, low birth rates can result in having a smaller proportion of younger workers responsible for caring for and supporting a growing elderly population. Recent years have seen a decline in nationwide birth rates, particularly in younger women (Martin et al., 2017). The highest fertility rates nationally are among women ages 25-29 (Child Trends DataBank, 2016h).

Philadelphia’s birth rates are slightly higher than rates nationwide. Philadelphia had 13.7 births per 1,000 women in 2016, compared to 12.4 nationally. Rates were highest among Philadelphia’s Hispanic women (17.9), followed by Asian (14.0), black (13.6), and white women (10.4) (see Table 1).

Table 1. Birth Rate (births per 1,000 population), by Race/Hispanic Origin, 2015–2016

	Philadelphia	United States
Overall	13.7	12.4
White	10.4	10.7
Black	13.6	14.2
Hispanic	17.9	16.3
Asian/Pacific Islander	14	14

Sources: Philadelphia data from Philadelphia Department of Public Health Vital Statistics (2016, preliminary); U.S. data from CDC, National Vital Statistics Report, Births: Final Data, 2015. Tables 1 & 5.

Family structure

Parents play the most influential role in the development of their children. Children’s well-being and health are closely linked to the presence of parents, and to the quality of the relationship between parents. Nationally, more than two-thirds of all infants and toddlers (67.8 percent) live in a household with two married adults. However, young children today—more than at any other time in recent U.S. history—are not being raised in families with two parents in their first marriage. Instead, they are increasingly raised in single-parent households, by cohabitating parents, or by parents who are remarried (Pew Research Center, 2015). Patterns of family structure are conditioned by culture and history.

In Philadelphia, family structure varies more by race or Hispanic origin than it does nationally. Asian infants and toddlers are the most likely to live with two married adults (88.7 percent), followed by white children (68.2 percent), Hispanic children (37.4 percent), and black children (22.1 percent). The percentage of infants and toddlers living in households headed by a single male⁹ is somewhat higher in Philadelphia compared to national data (13.7 and 8.3 percent, respectively). More than 40 percent of Philadelphia’s youngest children live in a household with a single female head, which is nearly double the national percentage (23.4 percent). Among Philadelphia’s black infants and toddlers, more than two-thirds (67.1 percent) live in a household headed by a single female; among Hispanic, white, and Asian young children the proportions are 41.3, 15.3, and 6.5 percent, respectively (see Table 2). A small percentage (2.3 percent) of Philadelphia’s infants and toddlers live in a grandparent-headed household, but this is more than double the comparable percentage of children nationally (0.9 percent) (see Table 3). Compared to similar cities (see Table 4), Philadelphia’s percentages of dual-parent households (44.3 percent) and single female-headed households (41.9 percent) fall in the middle, but its proportion of infants and toddlers living in a single-male-headed household (13.7 percent) is higher than that of other cities.

⁹ Female-and male-headed households could include either single parents or cohabitating couples.

Table 2. Percentage of Infants and Toddlers Living in Various Household Types, by Race/Hispanic Origin, 2016

	Philadelphia	United States
Married couple household	44.3%	67.8%
White	68.2%	79.1%
Black	22.1%	35.6%
Hispanic	37.4%	60.2%
Asian	88.7%	88.3%
Female-headed household	41.9%	23.4%
White	15.3%	13.6%
Black	67.1%	54.4%
Hispanic	41.3%	28.1%
Asian	6.5%	7.4%
Male-headed household	13.7%	8.3%
White	16.5%	6.8%
Black	10.7%	9.4%
Hispanic	21.3%	11.1%
Asian	4.8%	4.0%

Source: U.S. Census Bureau, 2016 American Community Survey, 2016 PUMS data.

Table 3. Percentage of Infants and Toddlers in Grandparent-headed Households, by Race/Hispanic Origin, 2016

	Philadelphia	United States
Overall	2.3%	0.9%
White	3.3%	0.8%
Black	2.4%	1.5%
Hispanic	2.3%	0.7%
Asian	0.0%	0.2%

Source: Child Trends Analysis of U.S. Census Bureau, 2016 and 2011–2015 American Community Survey, PUMS data

Table 4. Percentage of Infants and Toddlers Living in Various Household Types: Select Cities, 2016

	Philadelphia	New York	Chicago	Detroit	Cleveland
Married couple household	44.3%	64.8%	62.6%	33.1%	35.2%
Female-headed household	41.9%	26.9%	30.1%	57.0%	56.5%
Male-headed household	13.7%	8.3%	6.8%	8.3%	8.3%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data.

Births to unmarried women; births to teens

Since 1960, the proportion of births to unmarried women has risen from 5 to 40 percent nationally. The majority of these births involve cohabiting parents (two unmarried adults living together). Young women (ages 15–19) are more likely to have a birth outside of marriage than older women. However, overall, women who give birth outside of marriage tend to be more economically disadvantaged than their married peers. Children born to unmarried women are more likely to grow up in a single-parent household, experience instability in their living arrangements, have social and/or emotional concerns, and live in poverty (Child Trends DataBank, 2015e; Thomas & Sawhill, 2005; Haveman, Wolfe, & Pence, 2001; Demo & Cox, 2000; McLanahan & Sandefur, 1994). Children born to unmarried women are also at a greater risk for low educational attainment, engaging in sex at a younger age, and having a birth outside of marriage themselves (Child Trends DataBank, 2015e; Carlson & Corcoran, 2001).

More than half (56.2 percent) of all babies in Philadelphia are born to unmarried women, compared to 39.7 percent of births nationally. In 2016, Philadelphia’s black women had the highest percentage of nonmarital births (79.9 percent), followed by Hispanic, white, and Asian women (67.2, 29.7, and 18.8 percent, respectively). Rates of nonmarital births were higher for Philadelphia’s Hispanic, black, and Asian women than among their national counterparts (see Table 5).

Teens (especially younger teens) often lack the emotional maturity and the social and material resources to become successful parents. In fact, most teen births are unintended. When teens become parents, prospects for these young parents and their children can be compromised (Child Trends DataBank, 2016c). In 2016, Philadelphia’s teen birth rate was 26 per 1,000 females (ages 15–19), a marked decline over the past 10 years (from 59.8 per 1,000 births in 2006) (Department of Public Health, City of Philadelphia, 2016). This mirrors a national trend, with teen births decreasing across the country (Child Trends DataBank, 2016c).

Table 5. Births to Unmarried Women (percentage of all births), by Race/Hispanic Origin

	Philadelphia	United States
Overall	56.2%	39.7%
White	29.7%	28.4%
Black	79.9%	69.7%
Hispanic	67.2%	52.5%
Asian	18.8%	12.0%

Sources: Philadelphia data from Philadelphia Department of Public Health Vital Statistics (2016, preliminary); U.S. data from CDC, National Vital Statistics System, Births: Provisional Data for 2016, Table 3

Parental employment

For nearly all families with young children, parental employment is a necessity for meeting basic needs. Parental employment is associated with higher family income and greater access to private health insurance (Child Trends DataBank, 2015f). Higher family income has positive impacts on children, including improved health and academic achievement (Child Trends DataBank, 2015f; Brooks-Gunn & Duncan, 1997; Dahl & Lochner, 2008). However, even families with a working parent (or parents) can be living in poverty (Child Trends DataBank, 2015f; Cauthen, 2002).

The labor force participation rate is a measure of the proportion of the population who are working or actively seeking employment. Philadelphia’s labor force participation rate for parents with infants and toddlers is higher (at 71.7 percent) than in comparable cities, and higher than the U.S. average (64.6 percent) (see Tables 6 and 7). For example, labor force participation among this population was 70.4 percent in Chicago and just 61.8 percent in New York (nearly 10 percent lower than in Philadelphia).

In 2016, 70.6 percent of Philadelphia’s infants and toddlers had at least one parent with secure employment, defined as having worked at least 35 hours per week for 50 or more weeks during the previous year (see Table 8).

Table 6. Infants and Toddlers with All Available Parents Participating in the Labor Force, 2016

	Philadelphia	United States
Overall	71.7%	64.6%
White	76.9%	64.9%
Black	77.0%	75.8%
Hispanic	57.0%	60.2%
Asian/Pacific Islander	73.2%	53.4%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

Table 7. Infants and Toddlers with All Available Parents Participating in the Labor Force: Select Cities, 2016

	Philadelphia	New York	Chicago	Detroit	Cleveland
Overall	71.7%	61.8%	70.4%	69.1%	64.4%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

Table 8. Infants and Toddlers with at least One Parent Holding Secure Employment, 2016

	Philadelphia	United States
Overall	70.6%	74.1%
White	81.6%	81.1%
Black	53.1%	57.0%
Hispanic	69.4%	68.9%
Asian/Pacific Islander	85.9%	80.7%

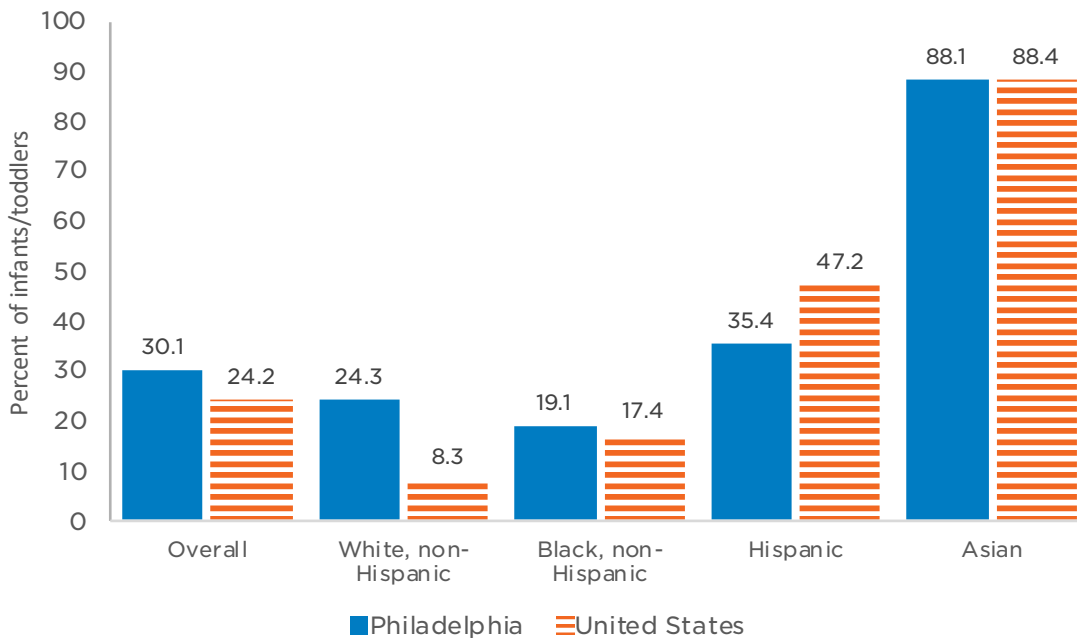
Source: Child Trends Analysis of IPUMS USA 2016 data

Immigrant status

In 2015, 5.8 million children ages 0–5 in the United States had at least one immigrant parent (Migration Policy Institute, 2016). In fact, children living in immigrant families are the fastest-growing group of American children (Hernandez, Denton, & Macartney, 2008). Immigrant children, including those with one or two immigrant parents, face several unique health challenges and risks. They are almost twice as likely to be uninsured, relative to children living in nonimmigrant families (American Academy of Pediatrics, 2013). Children in immigrant families often have less access to regular medical care and are less likely to have access to specialty care. Additionally, children in immigrant families are more likely than their peers in nonimmigrant families to live in poverty (American Academy of Pediatrics, 2013).

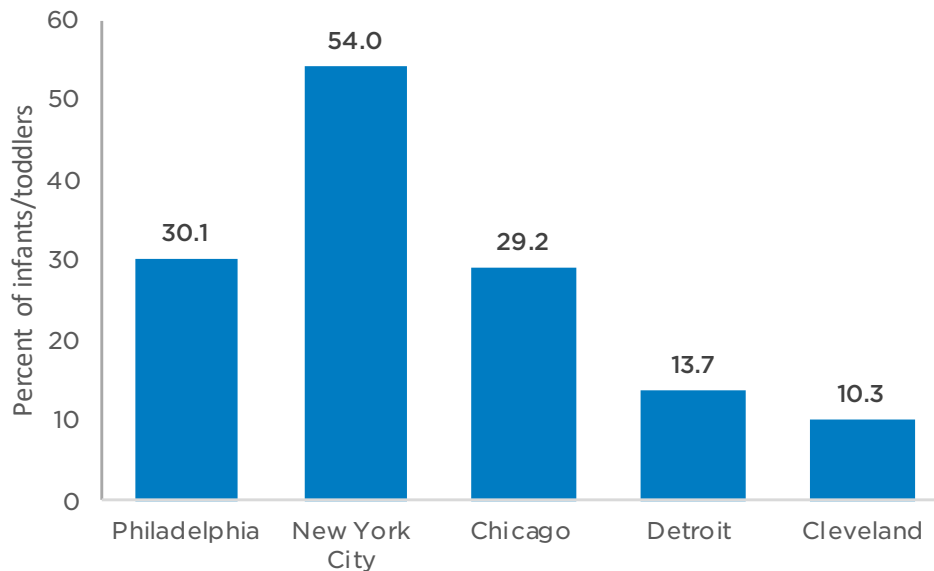
As of 2016, close to one-third (30.1 percent) of Philadelphia’s infants and toddlers had at least one parent born outside of the United States, compared to about one-quarter (24.2 percent) of children nationwide. One in four (24.3 percent) young white children in Philadelphia had at least one parent born outside of the United States, nearly three times higher than the national estimate for this group (8.3 percent). In contrast, more than one-third (35.4 percent) of Philadelphia’s young Hispanic children have at least one parent who was born outside of the United States, which is significantly lower than the corresponding national estimate (47.2 percent) (see Figure 2). Comparing Philadelphia to some similar cities (see Figure 3), New York has the highest percentage of infants and toddlers living with at least one parent born outside of the United States (54.0 percent), and Cleveland has the lowest (10.3 percent). Philadelphia’s overall percentage is comparable to that of Chicago (30.1 percent and 29.2 percent, respectively).

Figure 2. Percentage of Infants and Toddlers Living with at least One Non-U.S.-born Parent, by Race/Hispanic Origin, 2016



Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

Figure 3. Percentage of All Infants and Toddlers Living with at least One Non-U.S.-born Parent: Select Cities, 2016



Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

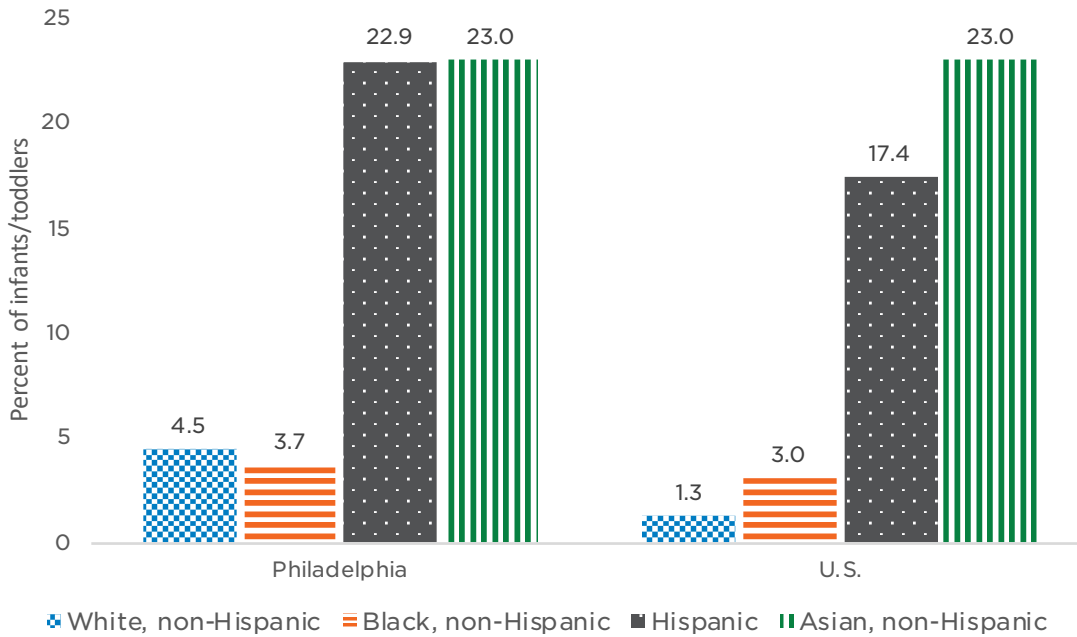
Home language

In 2016, 10.4 percent of Philadelphia’s infants and toddlers lived in a household where limited English was spoken, compared to 6.7 percent nationally.^h Many of these children are dual-language learners. That is, they are learning two languages at once: typically, English in a child care setting, and another language at home (Child Trends DataBank, 2014a; McCabe et al., 2013). With the right supports, dual-language learning can have great benefits for children, including improved cognitive flexibility (Child Trends DataBank, 2014a; Castro, Garcia, & Markos, 2013; McCabe et al., 2013; Halle et al., 2014) and enhanced social-emotional skills (Child Trends DataBank, 2014a; Halle et al., 2014). However, there are some possible disadvantages for children who grow up in families with limited English proficiency (Child Trends DataBank, 2014a; Skinner et al., 2010). For example, when compared to their monolingual peers, dual-language learners start school with lower English literacy skills (Child Trends DataBank, 2014a; Castro, Garcia, & Markos, 2013).

In Philadelphia, nearly one-quarter of Asian (23.0 percent) and Hispanic (22.9 percent) infants and toddlers lived in a household with limited English, compared to 3.7 percent of black and 4.5 percent of white infants and toddlers. These rates closely parallel national percentages, although Philadelphia’s are slightly higher among white, black, and Hispanic (but not Asian) young children (see Figure 4). Comparing Philadelphia to similar cities (see Figure 5), limited English is most prevalent among New York’s infants and toddlers (17.3 percent), followed by Philadelphia’s (10.4 percent). Philadelphia’s rate, however, was twice as high as Cleveland’s (4.9 percent).

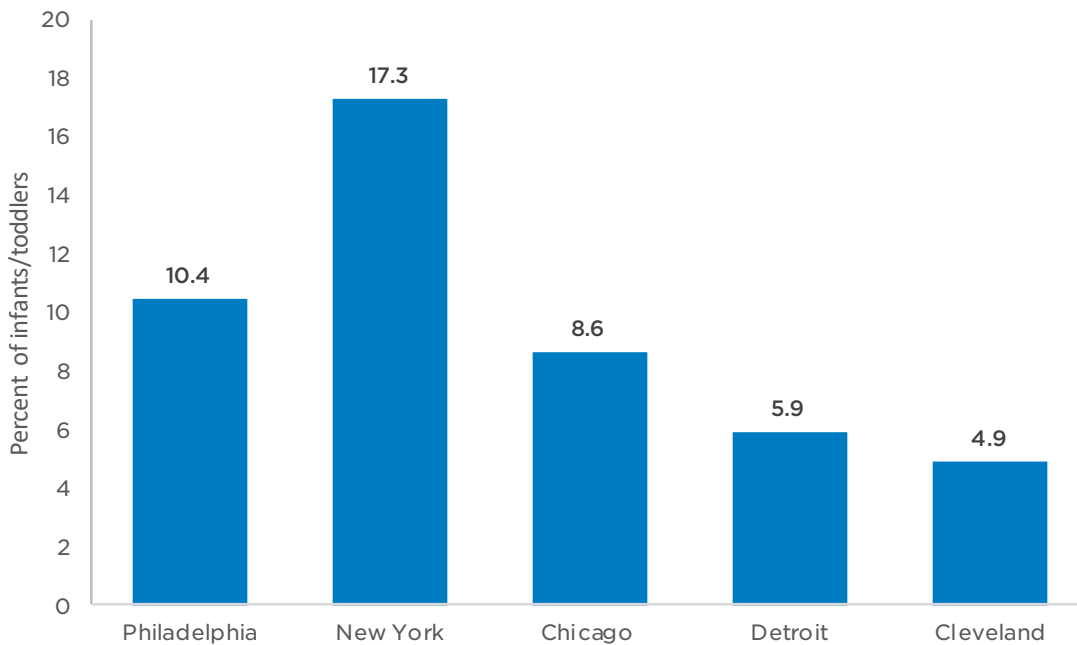
^h The American Community Survey defines a limited English household as one where “no one in the household 14 and over speaks English only or speaks English ‘very well.’”

Figure 4. Home language: Infants and Toddlers Living in Households where Limited English Is Spoken, by Race/Hispanic Origin: 2016



Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

Figure 5. Infants and Toddlers Living in Households where Limited English Is Spoken: Select Cities, 2016



Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

Reach Indicators

Public support systems

Social services and other forms of assistance support the most vulnerable families by mitigating some of the risks associated with poverty and other adverse conditions. In Philadelphia, there are multiple systems that provide support to families throughout the city. Included below are programs and services where data were available on young children and their families.

Home visiting

Philadelphia was an early adopter of the home visiting model. Home visits are completed by a trained volunteer or professional, and can help families overcome some of the negative effects associated with adversities during early childhood, and lead to more positive outcomes. For example, home visiting programs in the United States have been shown to reduce rates of low birthweight and the incidence of child maltreatment (Peacock et al., 2013). Such programs have also been shown to increase families' access to health care, improve parenting practices, and improve children's learning and behavior (Kahn & Moore, 2010).

A recent report, *Snapshot of the Home Visiting System in the Greater Philadelphia area*, examined home visiting for children ages 0-5 (Lin, Cook, & Supplee, 2018) and estimated that **3,098 individuals and familiesⁱ in Philadelphia County received home visiting services in 2016.**^j Additionally, from January through March 2017, during which data for the *Snapshot* report were collected, there were 875 slots available in Philadelphia County across home visiting programs.

Developmental screening and early intervention services

Developmental screenings are a cost-effective measure for identifying potential problems in a child's development or physical or behavioral health. These screenings can be completed in a variety of settings and by a variety of respondents (e.g., parent, teacher, doctor). Screenings using parental report have been demonstrated effective: Children whose parents report one or more developmental concerns are eight times more likely to be at risk for a developmental disability; children whose parents report two or more concerns are 20 times more likely to be at risk.

When developmental screening suggests a delay in one or more domains, a child is referred for evaluation by a team of specialists. If the team determines that delays are significant enough to warrant therapeutic services, the child is referred for early intervention and, if eligible, receives an Individualized Family Services Plan (IFSP) that outlines the course of action.

Philadelphia's Department of Behavioral Health and Intellectual disability Services (DBHIDS) reports that 7,736^k referrals were made for early intervention services in 2016. Additionally, DBHIDS data indicate that 9.3% (6,145) of children ages 0 to 3 had an active Individualized Family Services Plan (IFSP).^l

ⁱ Home visiting programs included in this report do not use a uniform method of counting individuals and families served; some count the number of individuals and some the number of families. These estimates do not necessarily include data from all home visiting programs in Philadelphia, because some programs did not respond to the data collection requests during this inventory.

^j This report included data from both evidence-based (i.e., programs shown to be effective through research studies) and non-evidence-based programs if they fit the following definition: "a program that uses home visiting services as its primary service delivery strategy that serves at-risk pregnant women or families with children birth to age five."

^k According to DBHIDS, there is some duplication in the referral numbers since referrals are closed after multiple unsuccessful attempts to reach a family, but families and professionals are encouraged to make the referral again if they have concerns about the child's development.

^l An IFSP is a service plan for young children with developmental concerns.

Early care and education

The years of infancy and toddlerhood, characterized by sensitivity to all kinds of inputs to development, are arguably when children face both the greatest risks and greatest opportunities. Experts increasingly call attention to the cost-effectiveness of investing in high-quality early care and education (ECE), especially for economically disadvantaged families and children with delays and disabilities. Evidence is strong for the benefits of ECE for children's readiness for school, their academic attainment, and their future economic success (Burger, 2010; Reynolds, Magnuson, & Ou, 2010). However, for families with young children, finding access to safe, affordable, high-quality child care can be a challenge. On the heels of groundbreaking progress in expanding the availability of pre-K education services, Philadelphia is poised to extend that work to the population of infants and toddlers.

Child care

Since 2014, Philadelphia has made substantial improvements in the supply of high-quality ECE slots (Reinvestment Fund, 2017). While there are child care slots available across the city, there are far fewer high-quality child care facilities—those with a 3- or 4-star rating in Keystone STARS^m (Reinvestment Fund, 2017). In 2016, 80 child care sites across the city raised their quality rating in Keystone STARS to a 3- or 4-star level, while 30 high-quality programs increased their enrollment (Reinvestment Fund, 2017). Additionally, options are even more limited for families with infants and toddlers. **For instance, according to data from Pennsylvania's Enterprise to Link Information for Children Across Networks (PELICAN), the state's integrated longitudinal data system, during the month of July 2017, 2,765 infants and toddlers were enrolled in a high-quality program.ⁿ**

In addition to the publicly funded ECE programs (Head Start, Early Head Start, Pre-K Counts, PHL Pre-K), families may also obtain financial support for care through the child care subsidy program (funded through the Child Care Development Fund). Subsidies help offset the high cost of child care for low-income families. **October 2017 data from the Pennsylvania Office of Child Development and Early Learning indicate that 9,429 (14.2 percent^o) infants and toddlers in Philadelphia received a child care subsidy.**

Child care shortage

To assess the overall child care shortage for children from birth to age 5 in Philadelphia, the Reinvestment Fund analyzed data from 2017 on child care supply and demand (Reinvestment Fund, 2018). As of 2017, there were roughly 115,734 children from birth to age 5 in need of child care^p in Philadelphia, and a total supply of 96,757 child care slots^q (see Figures 6, 7, and 8 for child care supply by neighborhood). This indicates that over 16 percent of demand was unmet in 2017 for an overall shortage of 18,977 child care slots (see Figure 7 for overall shortage by neighborhood).

For high-quality child care slots, the shortage is even greater. As of 2017, there was a total supply of 23,325 high-quality slots. This means that approximately 80 percent of demand is unmet

^m [Keystone STARS](#) is Pennsylvania's voluntary Quality Rating and Improvement System for early care and education programs. There are four star levels in Keystone STARS; 3- and 4-star programs are considered high-quality.

ⁿ This number represents a point-in-time count, not an annual total. The number of children is based on child level demographic data entered into PELICAN ELN.

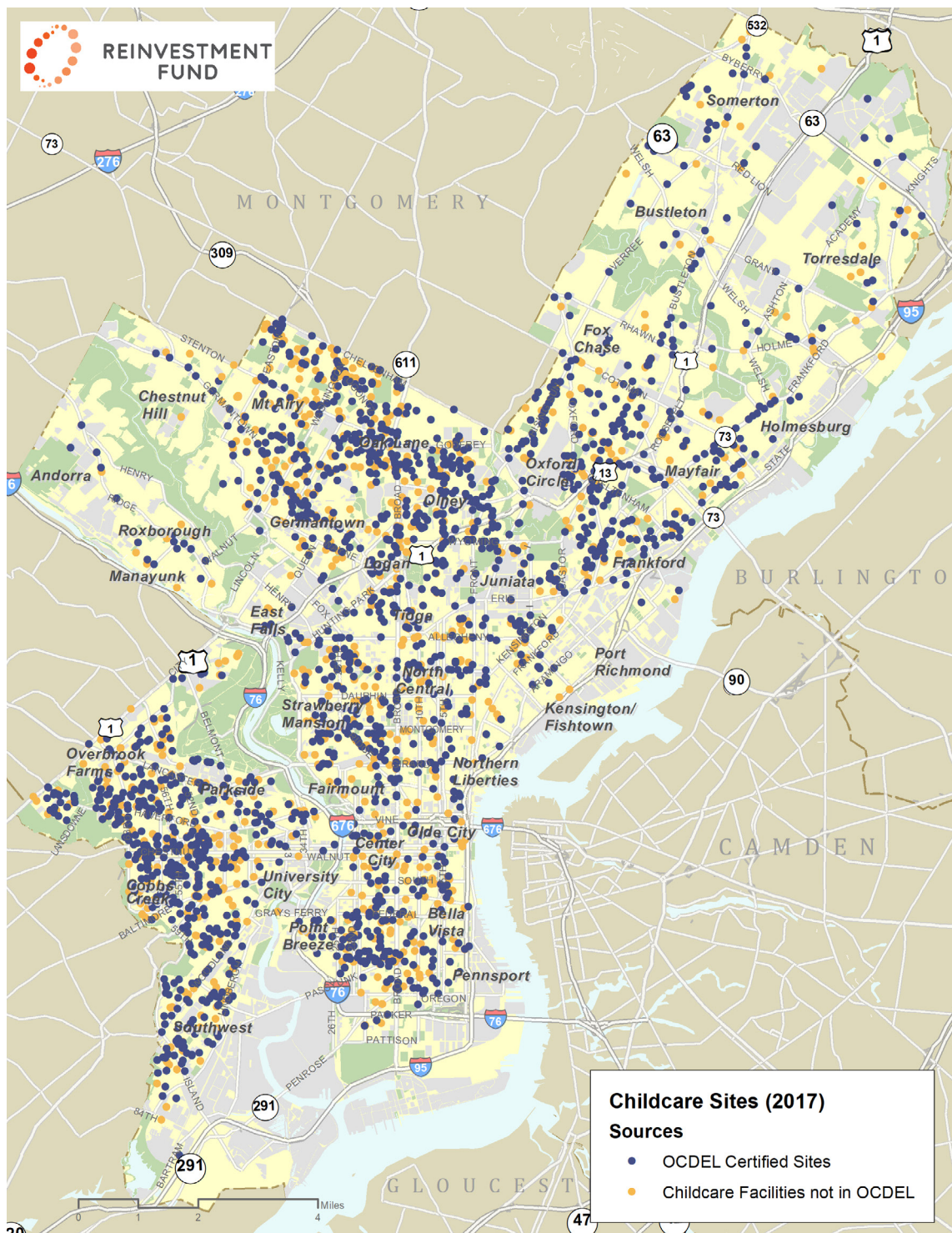
^o This number represents a point-in-time count, not an annual total. The percentage is calculated using both OCDEL data from October 2017 and PUMS (2016) data.

^p The estimate for the number of children in need of care is based off children ages 0–5 in Philadelphia, adjusted to reflect the likelihood that some families will choose care outside of the city regardless of where they reside, and that some families who live outside of the city will choose care inside of the city.

^q This estimate includes both 75,113 certified child care programs and 21,644 uncertified programs.

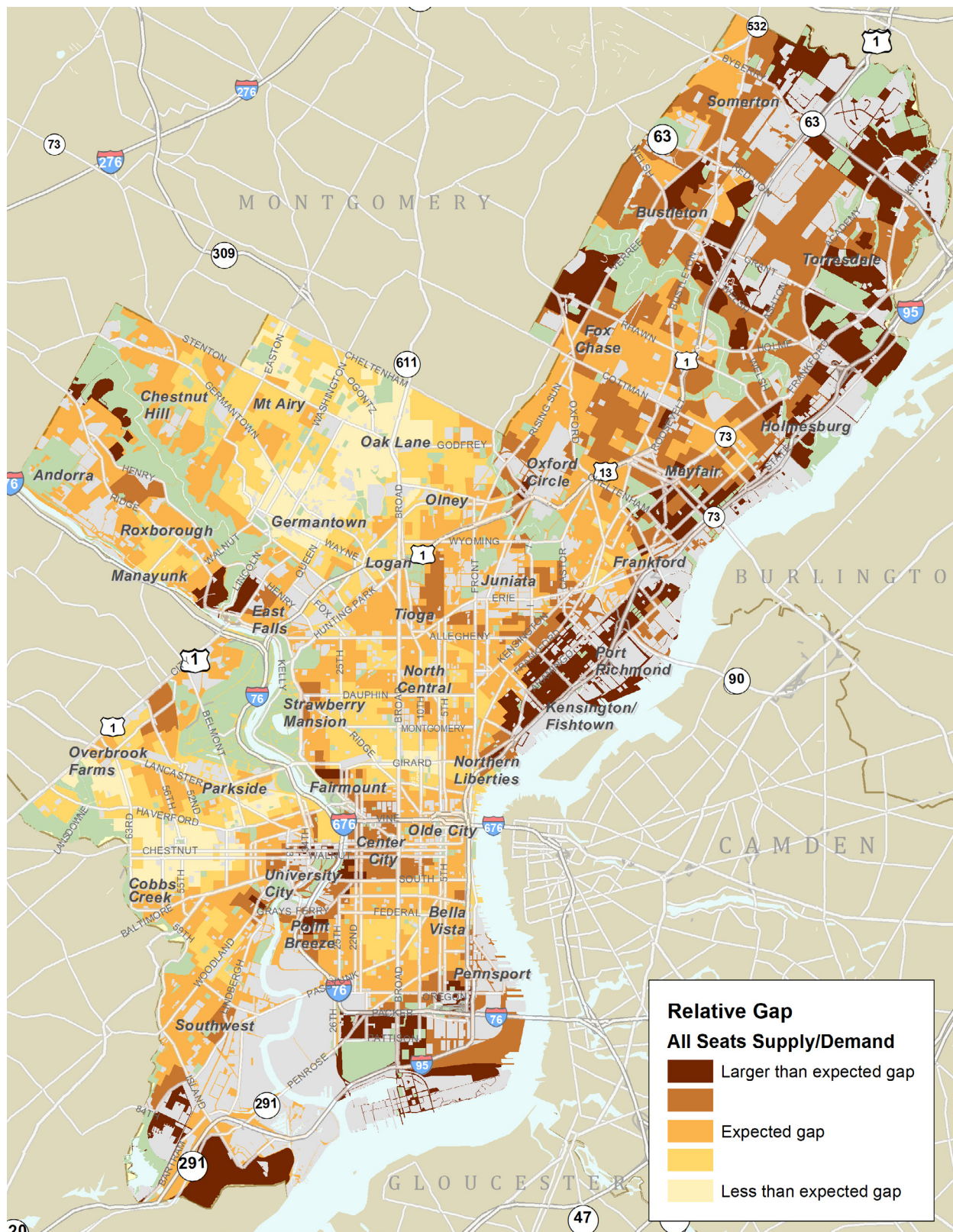
by high-quality care for an overall shortage of 92,400 slots (see Figure 8 for overall high-quality shortage by neighborhood). While these estimates are inclusive of the entire birth to age 5 population, a forthcoming report from the Reinvestment Fund will examine the child care shortage specifically for infants and toddlers in Philadelphia.

Figure 6. Certified (OCDEL) and Uncertified Childcare Sites (2017)



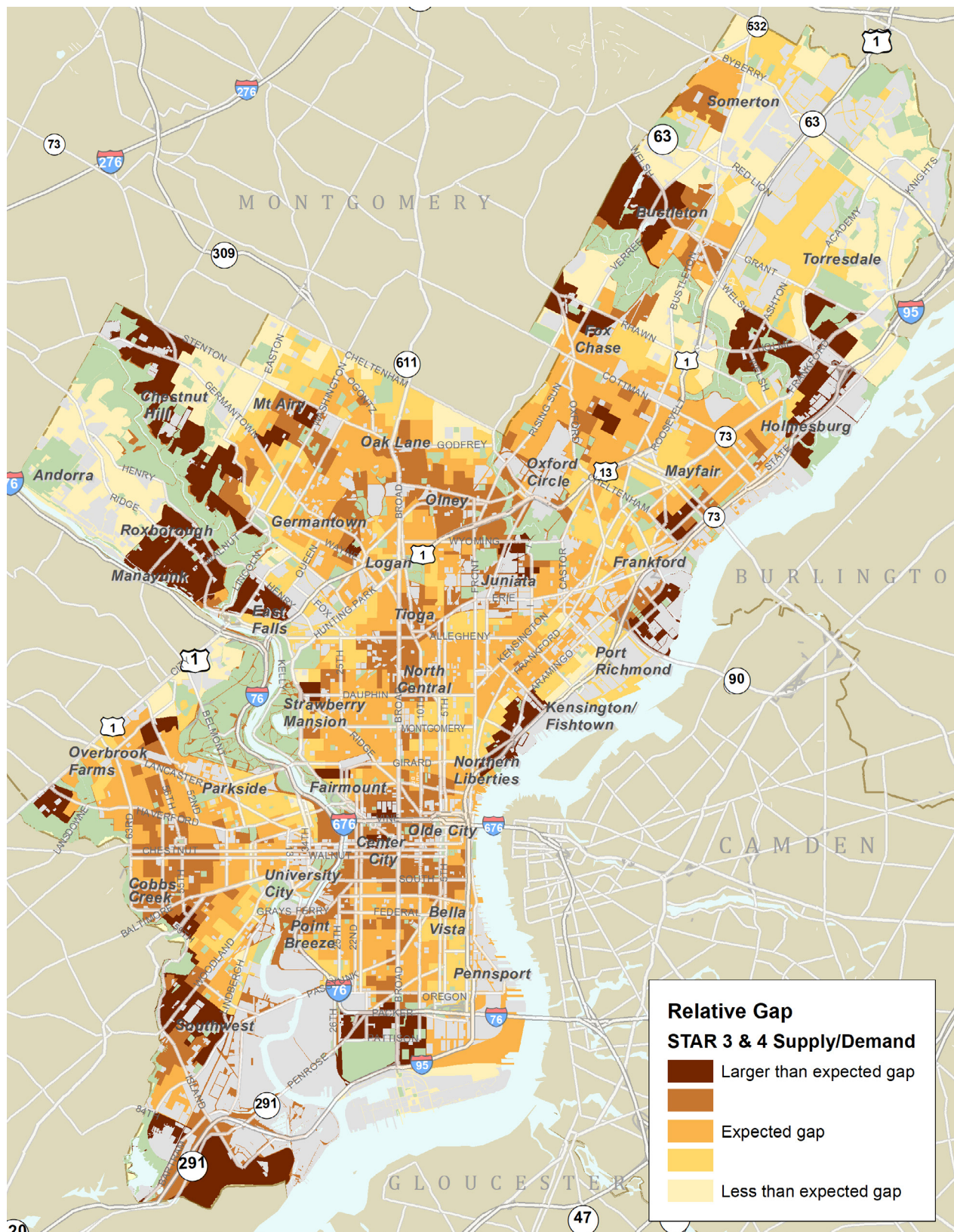
Note: Reprinted with permission from *Estimating changes in the supply of and demand for child care in Philadelphia*, Reinvestment Fund 2018 (page 8)

Figure 7. Relative Shortage- Total Childcare Supply (2017)



Note: Reprinted with permission from *Estimating changes in the supply of and demand for child care in Philadelphia*, Reinvestment Fund 2018 (page 9)

Figure 8. Relative Shortage- High-Quality Childcare Supply (2017)



Note: Reprinted with permission from *Estimating changes in the supply of and demand for child care in Philadelphia*, Reinvestment Fund 2018 (page 13)

Early Head Start

Early Head Start (EHS) is a federally funded, family-centered program, including both full-day center-based care and home-based care (e.g., home visiting) specifically designed to improve outcomes for infants and toddlers and their families by promoting positive development and family self-sufficiency. EHS programs foster the development of infants and toddlers while also supporting parents and caregivers as teachers of their young children. The EHS model has shown positive impacts on children’s cognitive and language development. EHS is also associated with benefits for families, including reduced parental stress levels, more positive parent-child relationships, higher levels of employment, and more active pursuit of education. EHS services may be delivered in centers, family child care homes, or through a home visiting model. EHS programs must allocate at least 10 percent of their enrollment slots to children with disabilities who are eligible for early intervention services under the Individuals with Disabilities Education Act (Early Head Start National Resource Center, n.d.).

In Philadelphia, only an estimated 2.6 percent (545) of eligible infants and toddlers receive EHS Services from the three Philadelphia-based EHS grantees^r—a proportion less than half the corresponding percentage nationwide (see Table 9). Nationally, 59.0 percent of EHS-enrolled children are in a center-based program, 39.5 percent are in a home-based program, and 1.5 percent are in a hybrid program. In Philadelphia, 26.5 percent are enrolled in a center-based program with 73.5 percent in a home-based program.^{s,t}

Table 9. Estimated Percentage of Eligible Infants and Toddlers Enrolled in Early Head Start, 2016–2017

	Philadelphia	United States
Early Head Start enrollment among income-eligible infants and toddlers	2.6%	8.0%

Source: Office of Head Start, Program Information Report (2016–2017)

Note: National data include children ages 0–5, but 96.3 percent of the Early Head Start population are children ages 0–2 or pregnant women. At the city level, 94.4 percent of the population served are ages 0–2 or pregnant women. For these data, poverty was used as a proxy for Early Head Start eligibility, so percentages in the table were calculated using Early Head Start enrollment divided by the number of infants and toddlers living in poverty.

Health insurance coverage

Health insurance coverage positively impacts the health and development of young children. Research shows that children with coverage are more likely than their uninsured peers to receive early care for a health concern, and have a lower risk of hospitalization (Murphey, 2017; Garfield et al., 2016). Additionally, research suggests positive associations between children’s health insurance coverage and their academic outcomes (Murphey, 2017). However, families and young children face many barriers to accessing health care, and health insurance coverage does not guarantee a young child will have access to timely care (Murphey, 2017).

^r In Philadelphia, there are three EHS grantees who operate and serve children and families only in Philadelphia county. Another three EHS grantees serve children both in Philadelphia and in other counties and states, and data were not available for those grantees on the number of children in Philadelphia county alone. Therefore, data in this report are only representative of three EHS grantees operating and serving children in Philadelphia only.

^s Table 16 reports the actual number of children and pregnant women served throughout the program year, including children who left during the program year and the children who filled those empty slots. As a result, more children and families may receive Early Head Start services cumulatively throughout the program year than indicated by the funded enrollment numbers. When breaking down EHS enrollment by program type, these percentages reflect the number of available slots rather than cumulative enrollment.

^t While EHS also offers programming in partner family child care centers, in 2017 no children in Philadelphia received EHS services in a family child care center.

In Philadelphia, nearly all infants and toddlers (98.1 percent) have health insurance coverage, slightly more than the national percentage (96.5 percent). Coverage among the city’s Asian and black infants and toddlers is even higher (100 percent) (see Table 10).

Table 10. Infants and Toddlers with Health Insurance Coverage, 2016

	Philadelphia	United States
Overall	98.1%	96.5%
White	99.0%	96.8%
Black	100.0%	97.1%
Hispanic	94.2%	95.3%
Asian	100.0%	97.6%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

Supplemental Nutrition Assistance Program

The Supplemental Nutrition Assistance Program (SNAP) is the country’s largest nutrition assistance program, providing millions of low-income families with nutrition assistance (U.S. Department of Agriculture, Food and Nutrition Service, 2018). SNAP improves families’ access to nutrition by increasing the amount of money they can spend on food (Child Trends DataBank, 2016i; Fox, Hamilton, & Lin, 2004). Additionally, SNAP benefits are associated with positive health outcomes for children (Child Trends DataBank, 2016i; Kreider et al., 2012) and improved birth outcomes for pregnant women (Child Trends DataBank, 2016i; Almond, Hoynes, & Schanzenbach, 2008).

In Philadelphia, more than three-quarters (77.8 percent) of children (birth through age 4) with family incomes below 125 percent of the federal poverty level receive SNAP benefits, which is higher than the overall percentage for the United States (64.1 percent). More than 80 percent of Philadelphia’s young black (83.6 percent) and Hispanic children (86.5 percent) with low family incomes receive SNAP benefits, compared to less than 20 percent (17.0 percent) of Asian/Pacific Islander children (see Table 11). In comparison with similar cities, Philadelphia’s percentage falls near the middle for SNAP receipt (see Table 12). Cleveland has the highest percentage, at 92.3 percent, and New York has the lowest, at 62.3 percent.

Table 11. Percentage of Children from Birth through Age 4, in Households Receiving SNAP Benefits, as a Percentage of Those with Family Incomes < 125 Percent of the Federal Poverty Level, 2016

	Philadelphia	United States
Overall	77.8%	64.1%
White	48.4%	58.9%
Black	83.6%	77.3%
Hispanic	86.5%	61.5%
Asian	17.0%	40.5%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

Table 12. Percentage of Children from Birth through Age 4, in Households Receiving SNAP Benefits, as a Percentage of Those with Family Incomes < 125 Percent of the Federal Poverty Level: Selected Cities, 2016

	Philadelphia	New York	Chicago	Detroit	Cleveland
Overall	77.8%	62.3%	73.1%	86.9%	92.3%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

Risk Indicators

Income/poverty

For Philadelphia’s youngest residents and their families, the effects of poverty can be profound. The stress associated with chronic poverty can impact family functioning and overall well-being. Furthermore, exposure to poverty in early childhood, specifically, can have lasting impacts: This is a period in which development, including brain development, is especially rapid and far-reaching (Bradley & Corwyn, 2002). Research indicates that poor children are more likely than adults to be exposed to neighborhood and family circumstances that can impair their health and cognitive and social-emotional development. These risks include exposure to environmental toxins, inadequate nutrition, parental depression, parental substance abuse, abuse and other trauma, violent crime, parental relationship instability, low-quality child care, and decreased cognitive stimulation (Child Trends DataBank, 2016a).

Infants born into poverty are also more likely to be born premature and at a low birthweight, and to develop poor health outcomes, including respiratory diseases such as asthma (Child Trends DataBank, 2016a). Infants and toddlers living in poverty may go on to experience diminished cognitive and academic outcomes, including lower school attendance, lower reading and math test scores, increased distractibility, and higher rates of grade failure and early high school dropout (Child Trends DataBank, 2016a).

In Philadelphia, nearly one-third (32.2 percent) of infants and toddlers live in poverty, compared to 21.5 percent nationally (see Table 13). Just under 20 percent of Philadelphia’s infants and toddlers live in deep poverty—that is, in families with incomes less than half the federal poverty level.⁴ This percentage is nearly double the corresponding national estimate (10.0 percent). In comparison with other similar cities (see Table 14), Philadelphia falls in the middle. New York has the smallest percentage of infants and toddlers living in poverty (25.4 percent), while Detroit’s is highest (62.3 percent)—nearly double Philadelphia’s (32.2 percent).

Table 13. National Comparisons of Infants and Toddlers (ages 0–3) Living in Poverty, 2016

	Philadelphia	United States
Overall	32.2%	21.5%
White	21.1%	13.4%
Black	35.3%	38.3%
Hispanic	45.5%	29.8%
Asian	14.7%	12.6%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data.

⁴ The federal poverty level is defined as an income no greater than \$24,339 for a family of four, as of 2016. Many experts believe that the current federal poverty measure provides an unrealistic estimate of what it takes for a typical family to meet basic needs; they propose that all “low-income” families (defined as those with incomes up to twice the federal poverty level) are at risk for many poverty-related outcomes.

Table 14. Percentage of Infants and Toddlers (ages 0–3) Living in Poverty: Select Cities, 2016

	Philadelphia	New York	Chicago	Detroit	Cleveland
Overall	32.2%	25.4%	27.1%	62.3%	53.9%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data.

Despite a modest economic rebound in 2010 from the Great Recession, many Philadelphia residents (including a greater number of children than even during the recession) continue to experience poverty (Public Citizens for Children and Youth, 2016).

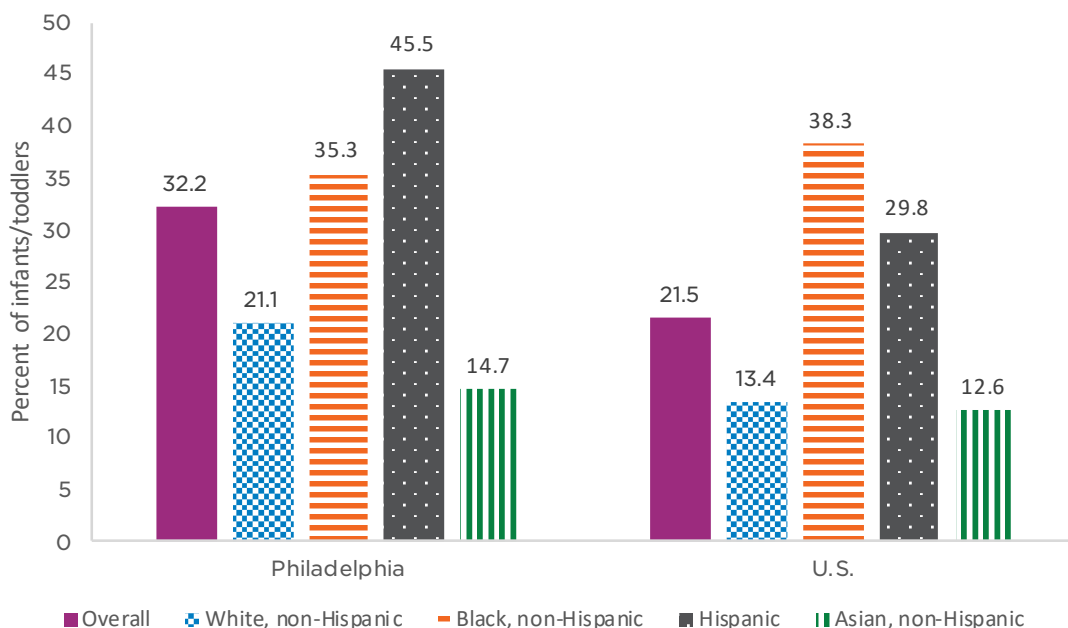
Research shows that growing up in poverty is associated with increased risk for serious problems with both physical and mental health. As they grow toward adulthood, poor children are also more likely to experience homelessness, have lower educational attainment, and have criminal records (Aron, Jacobson, & Turner, 2013).

Poverty—found in neighborhoods widely disbursed across the city and often concentrated by race and ethnicity—leads to a diminished tax base. Reduced tax revenues, in turn, can contribute to a negative spiral wherein important government-aided social services cannot keep up with need, and the ill effects of poverty are exacerbated.

Philadelphia’s Hispanic infants and toddlers have the highest rate of poverty (45.5 percent) in the city. Moreover, this rate is higher than the national rate for Hispanic infants and toddlers (29.8 percent) (see Figure 9).

Overall, 29.0 percent of Philadelphia’s Hispanic infants and toddlers live in deep poverty, compared to 13.0 percent nationally. An additional 16.5 percent live in families with incomes between 50 and 100 percent of the federal poverty level. Philadelphia’s black infants and toddlers have the next-highest rates of poverty, with 21.9 percent living in deep poverty and 13.4 percent at 50 to 100 percent of the federal poverty level (See Table 15).

Figure 9. Percentage of Infants and Toddlers (ages 0–3) Living in Poverty, by Race/Hispanic Origin: United States and Philadelphia, 2016



Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data.

Table 15. Percentage of Infants and Toddlers Living at Selected Ratios of the Poverty Threshold, by Race/Hispanic Origin: United States and Philadelphia, 2016

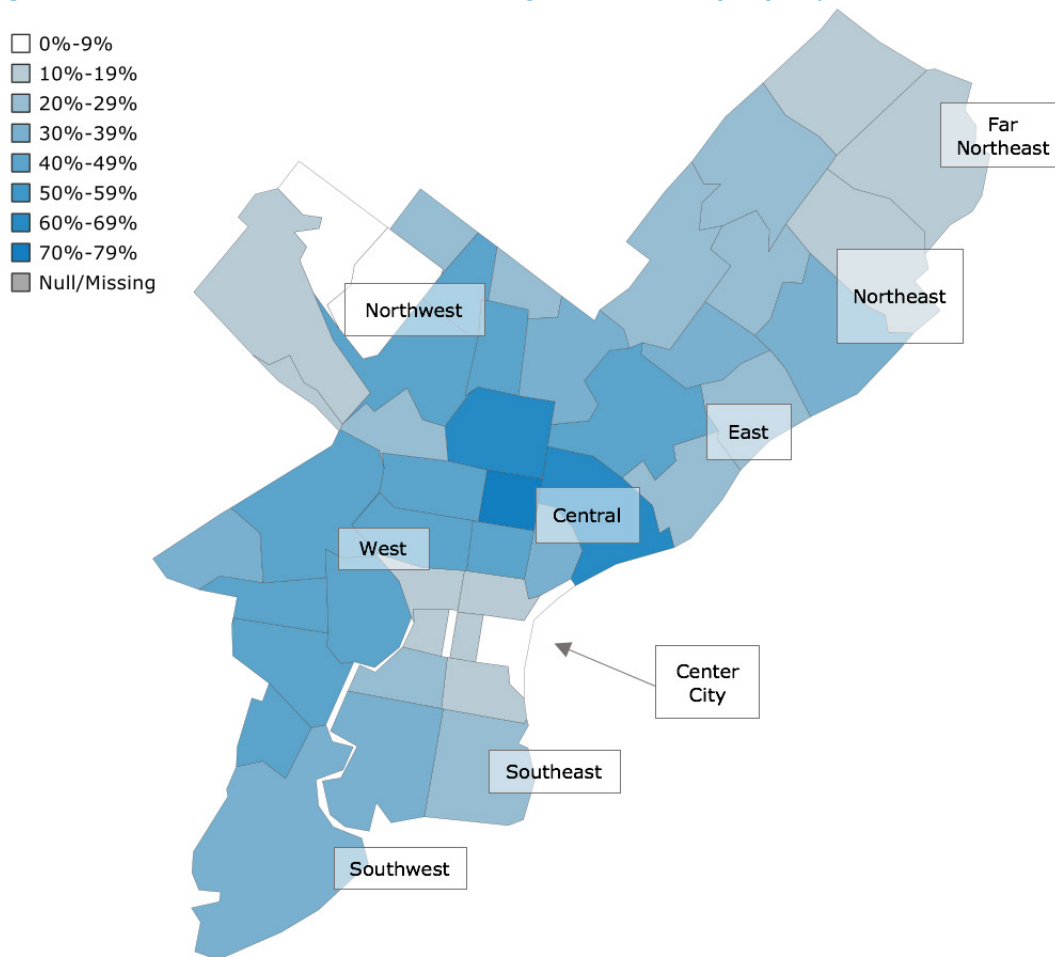
	Philadelphia	United States
0-50% Federal Poverty Level	18.9%	10.0%
White	9.7%	6.0%
Black	21.9%	19.9%
Hispanic	29.0%	13.0%
Asian	9.6%	4.9%
50-100% Federal Poverty Level	13.3%	11.5%
White	11.5%	7.4%
Black	13.4%	18.4%
Hispanic	16.5%	16.8%
Asian	5.0%	7.7%
100-200% Federal Poverty Level	24.9%	22.2%
White	11.5%	17.7%
Black	29.3%	27.0%
Hispanic	30.8%	30.2%
Asian	32.2%	15.2%
Greater than 200% Federal Poverty Level	42.9%	56.3%
White	67.4%	68.8%
Black	35.4%	34.7%
Hispanic	23.7%	40.0%
Asian	53.1%	72.2%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data.

City data at the zip code level show that neighborhoods in North and West Philadelphia have the highest rates of poverty among children under age 5^v (see Figure 10). Please see Appendix B for a map of city zip codes, and Appendix C for data tables for each of the zip code maps.

^v For the zip code analysis, sample sizes for infants and toddlers alone were too small to yield reliable estimates.

Figure 10. Percent of Children Under Age 5 in Poverty, by Zip Code, 2016



Source: Philadelphia Department of Public Health, 2016

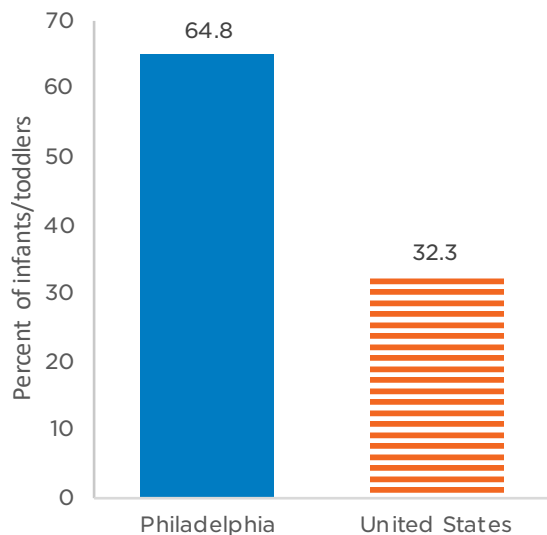
Notes: Zip codes 19109, 19112, and 19113 were removed because they are either nonresidential or have fewer than five residents younger than age 5.

Concentrated poverty

In addition to the influence of families and households, children are affected by the neighborhoods where they grow up. Living in communities where a large proportion of residents are poor is associated with detrimental impacts on children’s development. These disadvantages include adverse outcomes in physical and mental health, including asthma, diabetes, and depression; higher crime rates; and housing and school quality that are lower than what is found in more affluent communities (Bishaw, 2011).

Philadelphia’s infants and toddlers are twice as likely to live in concentrated poverty than the national average. Most of Philadelphia’s infants and toddlers (64.8 percent) live in areas of concentrated poverty, defined as census tracts where 20 percent or more of residents are in poverty (see Figure 11). The corresponding national average is 32.3 percent.

Figure 11. Percentage of Infants and Toddlers Living in Census Tracts with Concentrated Poverty, 2011–2015



Source: Child Trends’ analysis of 2001–2015 American Community Survey data: Tables B09001 & S1701

Child health and well-being

Children experience optimal health and development when they are safe, well-cared-for, and have opportunities to learn from their caregivers, neighbors, and the world around them. Several factors can potentially impede development, including the prenatal environment, exposure to poverty and other adversities, and a child’s overall health.

Prenatal care

Prenatal care protects the health of pregnant women and their babies. Care providers work with expecting parents to manage risks and promote positive birth outcomes through education on important health issues, monitoring for health-compromising behaviors, and guidance on the care of newborns (Child Trends DataBank, 2015a). Pregnant women who receive no or late (last trimester of pregnancy) prenatal care are more likely to have infants with adverse birth outcomes, such as preterm births, low birthweights, or even infant death (Cox et al., 2011). Therefore, access to early and frequent prenatal care is critical.

Pregnant women in Philadelphia have a higher risk for receiving inadequate (late or no) prenatal care, relative to national estimates. **In 2016, the proportion of women in Philadelphia who received inadequate prenatal care was more than 10 percent, compared to the national average of 6.2 percent.** Disparities associated with race and Hispanic origin are similar in Philadelphia to those found at the national level, although the prevalence of inadequate prenatal care is slightly higher in Philadelphia overall, especially for white women. Particularly concerning is the high prevalence of late or no prenatal care among black women (13.6 percent), which is more than twice as high as that for Asian women (6.5 percent (see Table 16).

Table 16. Percentage of Women Receiving Late or No Prenatal Care, by Race/Hispanic Origin, 2016

	Philadelphia	United States
Overall	10.7%	6.2%
White	7.2%	4.3%
Black	13.6%	10.0%
Hispanic	9.5%	7.7%
Asian	6.5%	5.4%

Sources: Philadelphia Department of Public Health Vital Statistics (2016, preliminary); Centers for Disease Control and Prevention, National Vital Statistics Report, Births: Provisional Data for 2016

Smoking during pregnancy

Smoking during pregnancy is harmful to mothers and their babies. It is associated with diminished fetal growth, premature birth, low birthweight, stillbirth and infant mortality, Sudden Infant Death Syndrome, asthma, and childhood obesity (Child Trends DataBank, 2016d).

Overall, fewer women in Philadelphia (5.9 percent) reported smoking during pregnancy, compared to women across the United States (7.8 percent); however, Hispanic women smoke at higher rates. Both nationally and in Philadelphia, white women have the highest rates of smoking during pregnancy: 11.4 and 7.3 percent, respectively, for the United States and Philadelphia. Black women have the next-highest rates of smoking during pregnancy, and these percentages are comparable in Philadelphia and the nation. However, the proportion of Philadelphia’s Hispanic women smoking during pregnancy (4.4 percent) is more than double the national percentage (1.9 percent). Smoking rates for Asian women are roughly the same in the city as in national estimates (see Table 17).

Table 17. Percentage of Women Reporting Smoking during Pregnancy, by Race/Hispanic Origin, 2015

	Philadelphia	United States
Overall	5.9%	7.8%
White	7.3%	11.4%
Black	6.2%	6.8%
Hispanic	4.4%	1.9%
Asian/Pacific Islander	1.2%	1.1%

Sources: Philadelphia Department of Public Health Vital Statistics (2015); U.S. Vital Statistics System (2015)
 Note: U.S. data include individuals who are Pacific Islander (PI), non-Hispanic, but Philadelphia data do not.

Preterm births

Babies born preterm, defined as less than 37 weeks gestation, have a heightened risk for a host of negative outcomes. Because these infants have not had the time necessary to fully develop in-utero, they have higher rates of health complications and lifelong disabilities, including intellectual disabilities, learning and behavioral problems, cerebral palsy, lung problems, vision and hearing loss, diabetes, high blood pressure, and heart disease (Child Trends DataBank, 2015b; March of Dimes, 2012). Preterm infants are also at an increased risk of low birthweight (March of Dimes, 2014).

Overall, preterm birth rates in Philadelphia and the nation as a whole are similar. According to data from 2016, in Philadelphia, 10.4 percent of births were preterm, compared to 9.8 percent of births nationally. In Philadelphia, black women experienced the highest rates (13.0 percent), and white and Asian/Pacific Islander women had the lowest rates (7.9 and 7.7 percent, respectively) (see Table 6). Philadelphia’s overall rate is slightly higher than the national average, but within each race/Hispanic origin category it is somewhat lower, likely reflecting differences between the demographics of Philadelphia compared with the U.S. average.

Table 6. Preterm Births, by Race/Hispanic Origin, 2016

	Philadelphia	United States
Overall	10.4%	9.8%
White	7.9%	9.0%
Black	13.0%	13.8%
Hispanic	9.3%	9.4%
Asian	7.7%	8.6%

Sources: Philadelphia Department of Public Health Vital Statistics (2016, preliminary); HHS, National Vital Statistics System, Births: Provisional Data for 2016

Low birthweight

Poor developmental outcomes, from infancy into adulthood, are associated with being underweight at birth. Low birthweight (defined as less than 5.5 pounds) is often associated with infants being delivered preterm (before the 37th week of pregnancy). However, even infants born at full term can have a low birthweight. Complications associated with low birthweight include low oxygen levels at birth, difficulty feeding, increased risk for infection, respiratory problems, and neurological concerns (March of Dimes, 2014). Research suggests that multiple births, low pre-pregnancy weight, a mother’s smoking during pregnancy, low weight gain during pregnancy, infections, violence toward the pregnant woman, and stress during pregnancy are all factors that can contribute to low birthweight (Child Trends DataBank, 2015c; Ricketts, Murray, & Schwalberg, 2005).

Babies born in Philadelphia have a slightly higher risk for low birthweight, compared to national estimates. In 2016, the low birthweight percentage was 10.8 in Philadelphia, compared to 8.2 percent nationally. However, 14 percent of black infants in Philadelphia were born with a low weight—double the percentage of their white counterparts (7.1 percent). Rates of low birthweight for all other race/Hispanic origin categories were under 10.0 percent, although 9.3 percent of Hispanic babies in Philadelphia were born with low birthweight, which is higher than the corresponding U.S. estimate (7.3 percent) (see Table 18).

Table 18. Rates of Low Birthweight, by Race/Hispanic Origin, 2016

	Philadelphia	United States
Overall	10.8%	8.2%
White	7.1%	7.0%
Black	14.1%	13.7%
Hispanic	9.3%	7.3%
Asian	8.0%	8.4%

Sources: ; Philadelphia Department of Public Health Vital Statistics (2016, preliminary); CDC Wide-ranging Online Data for Epidemiologic Research (WONDER), HHS, National Vital Statistics System, Births: Provisional Data for 2016

Breastfeeding

Breastfeeding has multiple benefits for children. Research shows that children who are breastfed have many health advantages, including reduced rates of infectious diseases, Sudden Infant Death Syndrome, Type-1 and Type-2 diabetes, lymphoma, leukemia, Hodgkin’s Disease, obesity, and being overweight (Child Trends DataBank, 2016e; Gartner & Eidelman, 2005; Woo et al., 2008). Studies also show that breastfeeding is associated with decreased rates of adverse health and developmental outcomes later in life (Child Trends DataBank, 2016e). The American Academy of Pediatrics recommends that mothers breastfeed through a baby’s first year.

In Philadelphia, 77.9 percent of new mothers reported ever breastfeeding in 2016, compared to 82.5 percent nationwide. Black women in Philadelphia have much higher rates (81.5 percent) than their peers nationally (68 percent), and rates for Asian women are slightly higher than their national peers (84.0 versus 80.7 percent, respectively). Philadelphia’s Hispanic women are less likely to report breastfeeding compared to national averages (73.0 and 84.8 percent, for the city and the nation, respectively) (see Table 19).

Table 19. Ever Breastfeeding: Reported Rates among New Mothers, by Race/Hispanic Origin: 2016

	Philadelphia	United States
Overall	77.9%	82.5%
White	75.0%	85.7%
Black	81.5%	68.0%
Hispanic	73.0%	84.8%
Asian	84.0%	80.7%

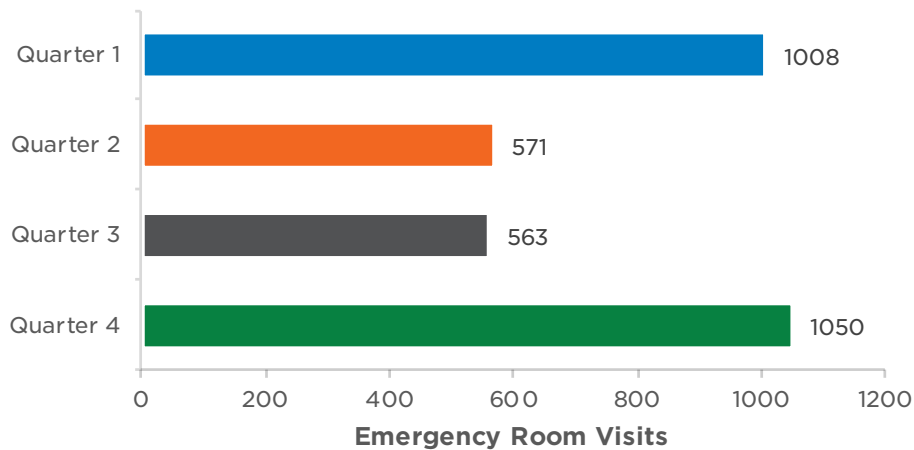
Sources: Philadelphia Department of Public Health Vital Statistics (2016, preliminary); US data from National Immunization Survey (NIS), Centers for Disease Control and Prevention, Department of Health and Human Services. Rates of Any and Exclusive Breastfeeding by Socio-demographics among Children Born in 2014

Asthma

In the United States, 4.7 percent of children ages 0–4 are diagnosed with asthma (Centers for Disease Control and Prevention, 2015a). Young children with asthma are at increased risk for hospitalization and more absences from school (Child Trends DataBank, 2016f). While the causes are still not well understood, many factors may contribute to childhood asthma. These include being born with a low birthweight, being exposed to antibiotics during the first year of life, being given acetaminophen, and being overweight in childhood (Child Trends DataBank, 2016f; Ortqvist et al., 2009; Marra et al., 2009; McBride, 2011; Saha, Riner, & Liu, 2005). Additional family and community factors—such as exposure to violence, having a parent with major depression, and maternal exposure to intimate partner violence—may also contribute to the development of asthma (Child Trends DataBank, 2016f; Wright et al., 2004; Goodwin et al., 2007; Suglia et al., 2009).

While Philadelphia data on the prevalence of diagnosed asthma are not available, infants and toddlers visited Philadelphia emergency rooms 3,192 times for asthma-related concerns in 2016. The majority of these visits occurred in the first and last quarters (roughly, winter and fall) of the year (see Figure 12). Comparable data for similar cities are not available.

Figure 12. Emergency Room Visits for Asthma, Birth to Age 3, Philadelphia, 2016



Source: Philadelphia Department of Public Health Syndromic Surveillance System (2016, preliminary).

Infant mortality

Children have the greatest risk of dying during their first year of life (Child Trends DataBank, 2016g). In addition to the emotional toll the loss of a child can have on a family and community, high rates of infant mortality can point to larger underlying problems. High rates of infant deaths may be the result of poor access to preventative and prenatal care, exposure to environmental toxins, and community violence (Child Trends DataBank, 2016g). Rates of infant and toddler death have been declining nationally since 1980. After the first year of life, the risk for death decreases every year through high school (Child Trends DataBank, 2016g). Unintentional injuries are the leading cause of child deaths, reported as the cause of 25 percent of all deaths for children younger than five (Child Trends DataBank, 2016g; Heron, 2016).

Philadelphia’s infant mortality rate (8.3 infant deaths per 1,000 live births) is higher than the overall U.S. rate (5.9). Nationwide and in Philadelphia, there are significant racial disparities in infant mortality. In Philadelphia mortality for black infants in 2015 was 12.3 per 1,000 births, which was five times higher than the rate for Asian/Pacific Islander infants (2.5), three times higher than for white infants (4.0), and about one-third higher than for Hispanic infants (7.7). These racial disparities in Philadelphia are similar to those seen in national-level data (see Table 20).

Table 20. Infant Mortality (deaths per 1000 live births), by Race/Hispanic Origin, 2015

	Philadelphia	United States
Overall	8.3	5.9
White	4.0	4.9
Black	12.3	11.3
Hispanic	7.7	5.0
Asian/Pacific Islander	2.5	4.1

Sources: Philadelphia Department of Public Health Vital Statistics (2015); U.S. Vital Statistics System (2015)

Sudden Infant Death Syndrome (SIDS), or the unexplained death of an infant under age 1, is the leading cause of death, nationally, for infants one month through one year of age (National Institute of Child Health and Human Development, Safe to Sleep Campaign, n.d.). The average rate of SIDS in Philadelphia between 2011 and 2015 was 1.6 per 1,000 live births, compared to the 2015 national rate of 0.9 (see Table 21).

Table 21. Sudden Infant Deaths per 1,000 Live Births, 2011–2015

	Philadelphia	United States
Sudden Infant Deaths, rate per 1,000 live births	1.6*	0.9

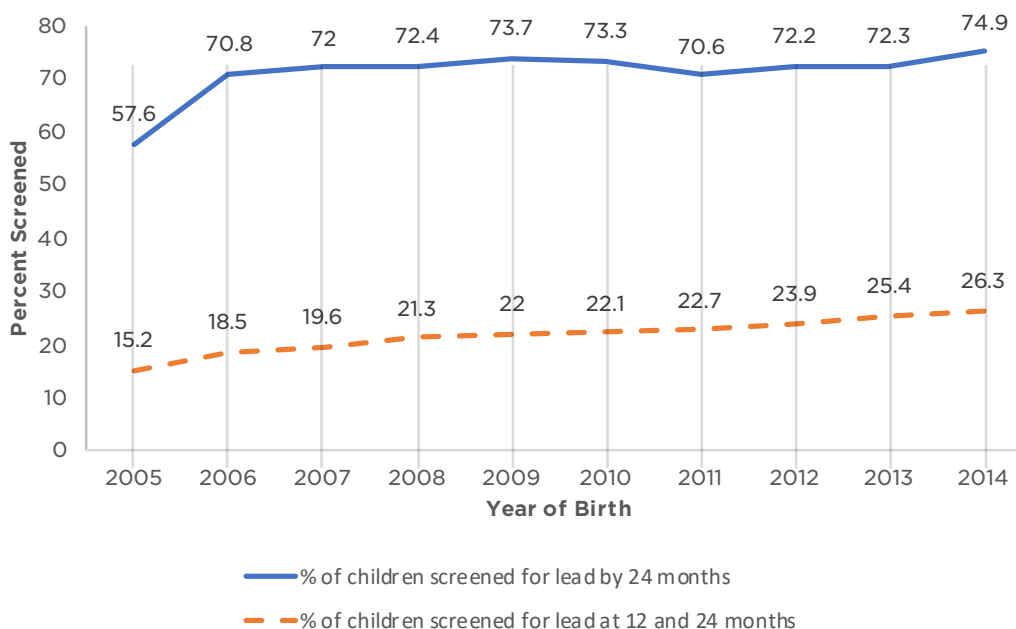
*Please note that Philadelphia data are averaged over 2011–2015 to improve reliability, while national data are for 2015 alone. Sources: Philadelphia Department of Public Health Vital Statistics (2011–2015); Center for Disease Control, Trends in Sudden Unexpected Infant Deaths by Cause (2015)

Lead poisoning

While national rates of reported lead poisoning in children have substantially declined since 1997, lead exposure and poisoning remain public health concerns, particularly in older cities like Philadelphia. Research demonstrates that there are no safe blood lead levels in children. Lower lead levels in children’s blood can result in permanent neurological damage and behavioral disorders, while high blood lead levels can lead to severe neurological problems, such as seizures, comas, and death (Child Trends DataBank, 2017; Raymond & Brown, 2015). Screening for lead is important as a surveillance tool; however, it is also important to support active remediation of known sources of lead exposure—particularly in older housing likely to contain lead-based paint.

The Philadelphia Department of Public Health (PDPH) recommends that all children receive a lead screening at 12 months and 24 months (or between 36 and 72 months if not previously screened) (Philadelphia Department of Public Health, Environmental Health Services, Lead and Healthy Homes Program, 2016). 2016 data from PDPH indicate that nearly three-quarters (74.9 percent) of children born in 2014 had been screened for lead by 24 months, and 26.3 percent had received screenings at both 12 and 24 months. The number of children receiving one or two lead screenings has increased steadily over the past 10 years (PDPH, Environmental Health Services, Lead and Healthy Homes Program, 2016; see Figure 13).

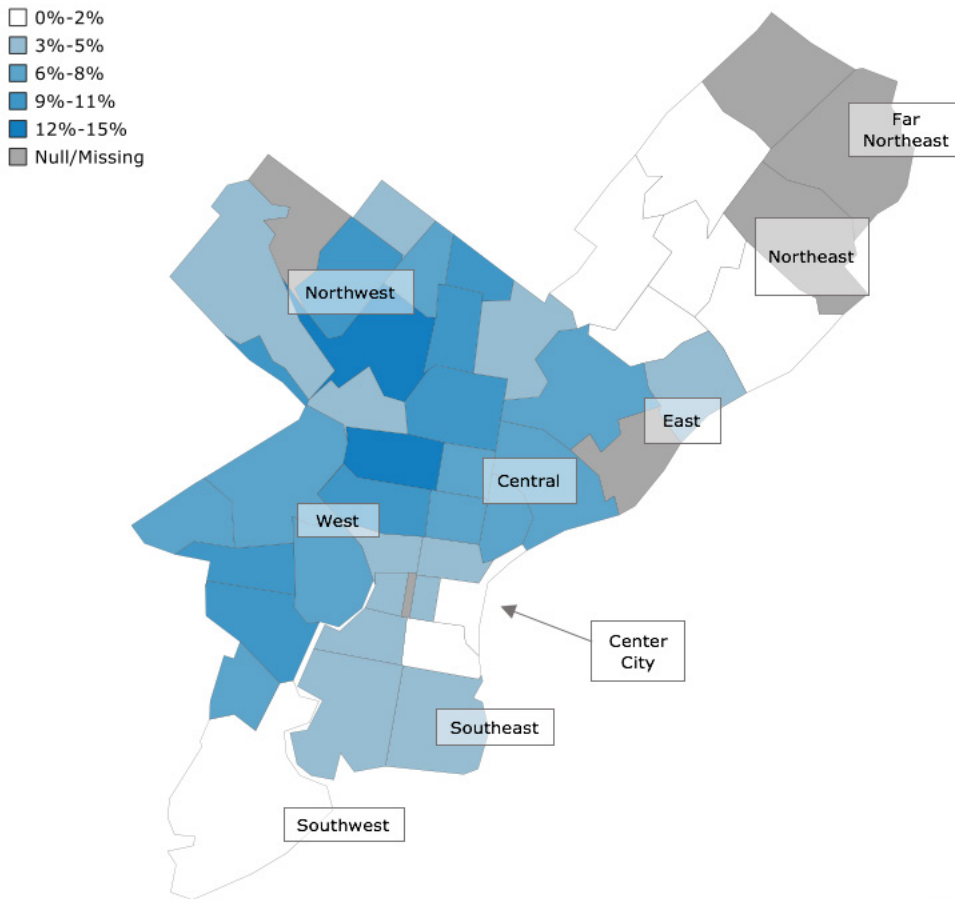
Figure 13. Percent of Children in Philadelphia Screened for Lead Exposure



Source: Philadelphia Department of Public Health, Environmental Health Services, Lead and Healthy Homes Program “Childhood Lead Poisoning Surveillance Report: 2016”

When measuring blood lead levels, the Centers for Disease Control and Prevention (CDC) recommends using a reference level of 5 micrograms per deciliter, which indicates that a child has much higher blood lead levels than most other children (Centers for Disease Control and Prevention, 2017). In 2016, PDPH reported that **more than 6 percent of screened children had blood lead levels greater than or equal to the CDC reference level of 5 micrograms per deciliter**. Zip code-level data show that screened children in West and North Philadelphia were most likely to have blood lead levels above this level (see Figure 14).

Figure 14. Percent of Lead-Screened Children Ages 0–2 with Newly Identified Blood Lead Levels Greater than or Equal to the CDC Reference Level of 5 micrograms per deciliter, by Zip Code, 2016



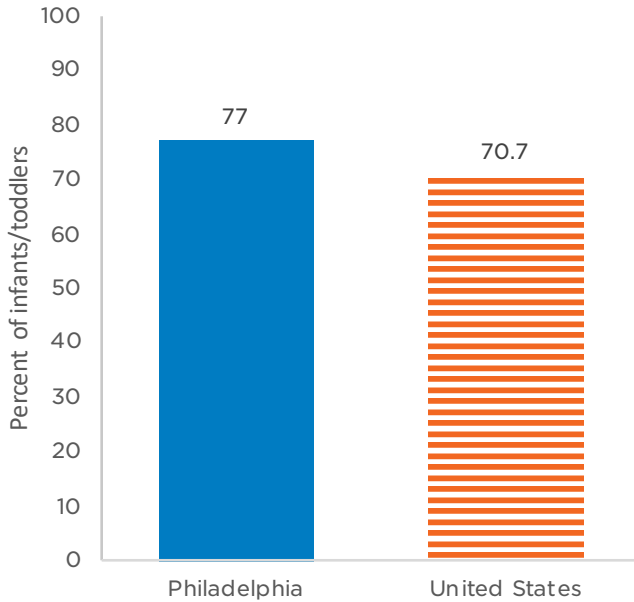
Source: Pennsylvania Department of Health NEDSS, Philadelphia Department of Public Health, 2016
 Note: Data are suppressed for zip codes 19102, 19114, 19118, 19137, and 19154 due to low sample sizes or missing data. These zip codes are displayed as light gray. Zip codes 19109, 19112, and 19113 are not included because they are either nonresidential or had fewer than five residents under age 5.

Immunizations

Vaccines protect children from many diseases that were once widespread and killed thousands. Because young children are more susceptible to infection—and particularly to the effects of diseases—vaccines are generally given early in life. Beyond health benefits, protecting children against severe illness leads to improved school attendance and reduced family stress (Child Trends DataBank, 2015d). Additionally, childhood immunization is important to protect whole communities against disease (Centers for Disease Control and Prevention, 2015b), including from people who may not be vaccinated.

In 2016, 77.0 percent of young children in Philadelphia, ages 19–35 months, were up-to-date on recommended immunizations. More young children were up-to-date on immunizations in Philadelphia than the national average, which, according to 2017 data, was 70.7 percent (see Figure 15).

Figure 15. Percent of Infants and Toddlers Who Received Recommended Vaccinations



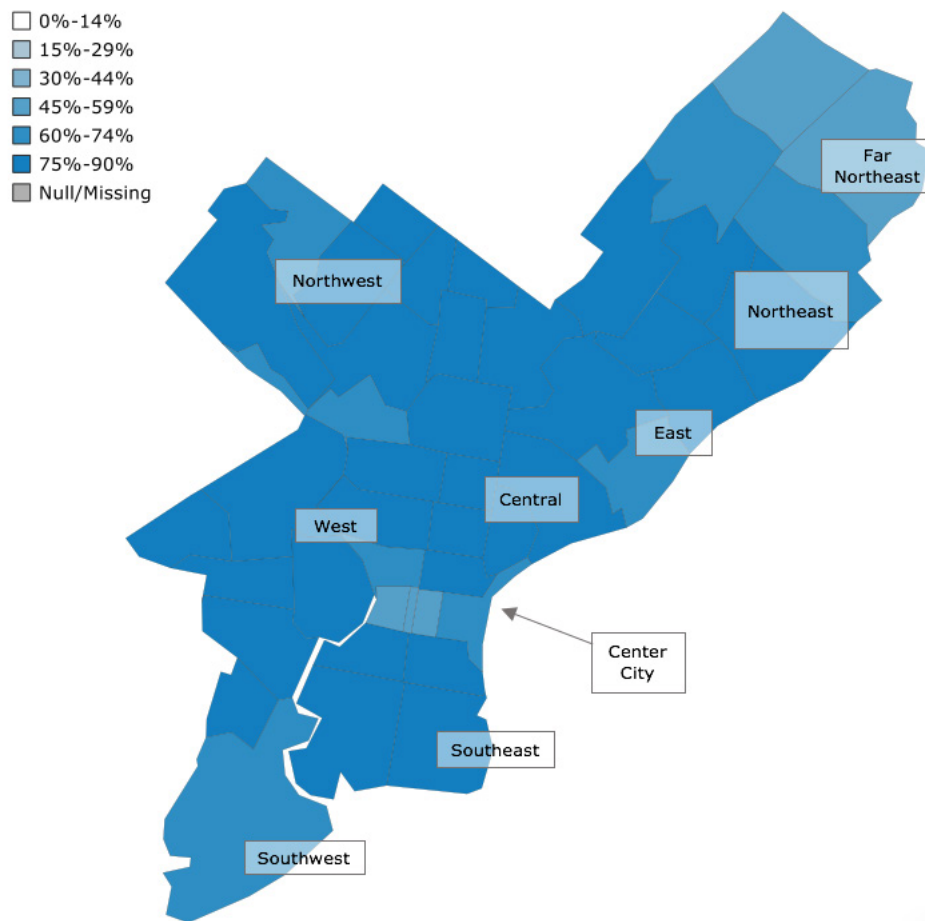
Philadelphia: Children ages 19–35 months in 2016 with up-to-date immunizations for the 4:3:1:3 series

United States: Estimated vaccination coverage among children 19–35 months, combined 7-vaccine series (4:3:1:3*:3:1:4)

Sources: Philadelphia data from KIDS Registry, Philadelphia Department of Public Health (2016); U.S. data from CDC, Morbidity and Mortality Weekly Report (2017)

Across Philadelphia, most children are up-to-date on immunizations. Data by zip code show that the rates for up-to-date immunizations (defined as the combined four vaccine series, or 4:3:1:3) are highest in the city’s northwest, northeast, south, and parts of north Philadelphia. Conversely, the lowest rates for up-to-date immunizations are in the far northeast and center city sections of Philadelphia (see Figure 16).

Figure 16. Percent of Children Ages 19–35 Months Up-To-Date on Immunizations, by Zip Code, 2016



Source: KIDS Registry, Philadelphia Department of Public Health, 2016

Note: Zip codes 19109, 19112, and 19113 were excluded because they are either nonresidential or have fewer than five residents under age 5.

Family circumstances

Child maltreatment

Child maltreatment (abuse and neglect) has both immediate and lasting effects on children’s development, including physical injuries and psychological problems; in extreme cases, it can result in death (Child Trends DataBank, 2016b; Guterman, 2001). Child maltreatment is highly prevalent among infants and toddlers. In 2014, children under age 3 represented 34 percent of all children experiencing substantiated or indicated^w abuse or neglect in the United States (Child Trends DataBank, 2016b). The rate of maltreatment among this youngest group of children was 14.8 per 1,000 children, while children ages 4–7 had a maltreatment rate of 10.6 (Child Trends DataBank, 2016b). Neglect is the most common form of maltreatment for young children (Child Trends DataBank, 2016b).

Various family factors can influence the incidence of child maltreatment, including parents’ inadequate knowledge of child development, substance abuse, domestic violence, and mental

^w Substantiated cases of child abuse or neglect include cases where an allegation of maltreatment or risk of maltreatment was supported or founded according to state law or policy. Indicated cases of child abuse or neglect include cases where an allegation of maltreatment or risk of maltreatment could not be substantiated, but there was reason to suspect maltreatment or the risk of maltreatment (Child Trends DataBank, 2016b).

illness (Child Trends DataBank, 2016b; Slack et al., 2004; National Research Council, 1993). While child maltreatment occurs across all economic levels, abuse and neglect are more common in families with lower incomes (Child Trends DataBank, 2016b; Slack et al., 2004; National Research Council, 1993).

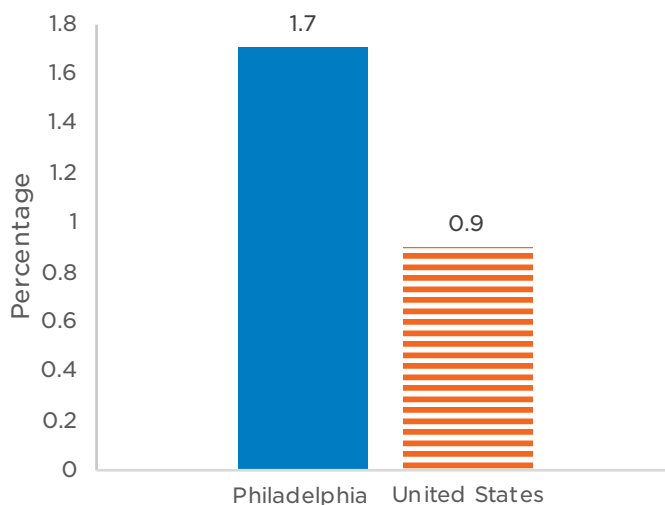
According to 2017 data from Philadelphia’s Department of Human Services, 1,745 distinct children ages 0-2 had an indicated, substantiated, founded, or valid report of child maltreatment. This represents 2.6 percent of children in this age group, which is higher than the national percentage (1.6 percent). Experts agree that reported child maltreatment numbers are an underestimate of the true prevalence of abuse and neglect. However, investigations can be influenced by changes in policy and law, and are not a comprehensive indicator of child maltreatment. For example, an increase in the number of identified maltreatment cases may reflect an increased public awareness, or changes regarding who are considered mandatory reporters. For example, in 2014, Pennsylvania state legislators passed bills that expanded the definition of mandated reporters and the circumstances that they are required to report.

Foster care

Children are placed into foster care when a social worker or court has determined that their current situation can no longer provide a safe home (Child Trends DataBank, 2015g). Therefore, placement into foster care is an indicator of serious family distress, such as maltreatment, including physical abuse and neglect. There are several risk factors for foster care placement, including prior involvement in the child welfare system, parental substance abuse/misuse, and parents with serious mental health or emotional problems (Wulczyn, Ernst, & Fisher, 2011).

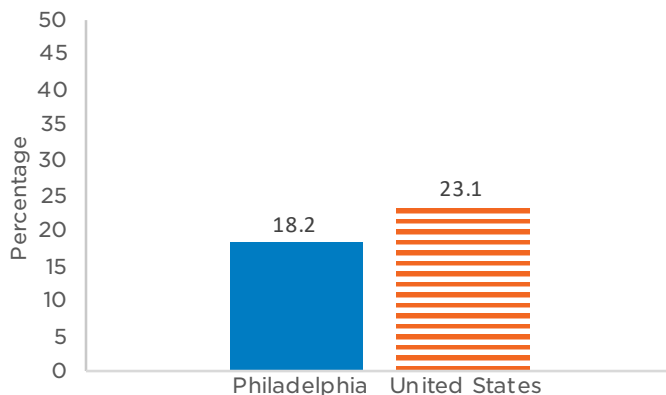
In Philadelphia, 1.7 percent of all children (ages 0-18) are in foster care, compared to less than 1 percent (0.9 percent) nationally. Close to 20 percent (18.2 percent) of children in foster care in Philadelphia are infants and toddlers, a somewhat smaller percentage than the national figure (see figures 17 and 18).

Figure 17. Percentage of All Children (ages 0-18) in Foster Care, 2016-2017



Source: Philadelphia data are calculated using both DHS (City of Philadelphia, 2017) and U.S. data from AFCARS (2016); population data from the 2016 American Community Survey, PUMS data.

Figure 18. Infants/Toddlers as a Percentage of All Children in Foster Care, 2016–2017



Sources: Philadelphia data from Department of Human Services, City of Philadelphia (2017); US data from AFCARS (2016); population data from the 2016 American Community Survey, PUMS data

Housing instability/homelessness

Having a stable home benefits young children’s development; a predictable home environment increases their emotional security and is more likely to foster positive interactions with caregivers. Children are at greatest risk for entering a homeless shelter during their first year of life (Perlman & Fantuzzo, 2010). Furthermore, half of all children experiencing homelessness are under age 6 (Solari et al., 2017). Babies born into homelessness are more likely to be born premature or with a low birthweight (Fantuzzo et al., 2013). These infants and toddlers have an increased risk for developing asthma, chronic ear infections, and other later health problems (Grant et al., 2007; Fantuzzo et al., 2013). Additionally, they are more likely to experience poorer academic and behavioral outcomes than their stably housed peers (Gewirtz et al., 2008; Perlman & Fantuzzo, 2010).

In Philadelphia, 365 infants (1.5 percent) reside in emergency or transitional housing. These programs, overseen by the Office of Homeless Services, provide temporary emergency housing, as well as other supports and services for families experiencing homelessness. Compared to their counterparts nationally, Philadelphia’s infants are at a slightly higher risk for entering emergency or transitional housing (see Table 15).^x In total, Philadelphia provided emergency and transitional housing to 966 infants and toddlers in 2016–2017.

Table 15. Percentage of Infants (birth to age 1) Receiving Homelessness Services (emergency shelter and transitional housing), 2015–2017

	Philadelphia	United States
Children birth to age 1 receiving homelessness services (emergency shelter and transitional housing)	1.5%	0.8%

Source: Philadelphia data from City of Philadelphia Office of Homeless Services, 2017; US data from Homeless Management Information System data, October 2015 to September 2016

It is important to note that this data may underestimate the number of children experiencing homelessness. In addition to families receiving emergency housing, many families experiencing

^x Emergency housing refers to a short-term accommodation for individuals facing a homelessness crisis. Transitional housing refers to those programs which serve to facilitate the movement of families experiencing homelessness into more permanent housing; transitional housing programs are typically longer in duration than emergency housing programs.

homelessness throughout Philadelphia are living doubled-up (staying with friends and families) due to loss of housing or economic hardship. In fact, a recent People’s Emergency Center report reported 2,554 children ages 0–5 experiencing homelessness in Philadelphia, while the housing system only reported 1,999 children (People’s Emergency Center, 2018). This discrepancy likely reflects the number of infants and toddlers experiencing homelessness in doubled-up living situations, as living doubled-up is considered an instance of homelessness by the Department of Education (U.S. Department of Education, n.d.).

Housing that is overcrowded (defined as more than two residents per bedroom) is also associated with negative outcomes for children. Concerns include noise levels, reduced privacy, and increased challenges controlling contagious illnesses. In comparison with similar cities (Table 22), Philadelphia has the second-lowest percentage of infants and toddlers living in overcrowded housing (15.6 percent). New York has the highest (40.8 percent), which is nearly five times higher than Cleveland’s (5.2 percent).

Table 22. Percentage of Infants and Toddlers Living in Overcrowded Housing: Select Cities, 2016

	Philadelphia	New York	Chicago	Detroit	Cleveland
Overall	15.6%	40.8%	21.9%	20.9%	5.2%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

Conclusion

The first three years of life are a critical period, filled with rapid physical, cognitive, social, and emotional development. During these years, it is important that children are provided with positive early experiences and benefit from the care of their families and friends—and from community-, state- and national-level programs and services—to ensure optimal outcomes later in life. Conversely, negative early experiences, such as living in poverty, lacking high-quality early care and education, and lacking access to adequate health care, can have a lasting harmful impact.

This report has an important goal: to document both what is known and what remains unknown about the state of infants and children in Philadelphia. The indicators highlighted in this report provide a glimpse into how they are faring. In many ways, Philadelphia is a microcosm of a larger demographic transition, playing out across the nation, toward greater racial and ethnic diversity, and a broader range of family types. These trends are prominent in our youngest residents and their families. In Philadelphia, three of every four infants and toddlers are children of color; one in four lives with at least one foreign-born parent; one in 10 lives in a household where a language other than English is spoken; and more than half live in a single-parent household.

While the indicators presented here provide some insight into how Philadelphia’s infants and toddlers are faring, there are many aspects of development for which we simply do not have reliable data for this age group. Examples include the quality of parent-child relationships, neighborhood characteristics (e.g., neighborhood safety or access to safe places to play, access to community resources), more sensitive measures of child care quality (e.g., measures of child outcomes), and exposure to trauma of various kinds (e.g., adverse childhood experiences at an individual level). These data gaps hinder efforts to assess, plan, and implement effective supports for infants and toddlers.

Key findings from this report include the following:

- **Poverty affects most deeply Philadelphia’s infants and toddlers, setting up disadvantages that can last a lifetime.** A closer examination of poverty and other indicators of risk, together with an understanding of how well family support systems are reaching the youngest Philadelphians, can broaden public awareness, build political will, and target resources.
- **Poverty in the city remains unacceptably high, and a high percentage of young children live in neighborhoods of concentrated poverty.** In fact, infants and toddlers in Philadelphia are twice as likely to live in concentrated poverty as the national average. Poverty and concentrated poverty particularly affect the city’s Hispanic infants and toddlers. Although black Philadelphians make up about half of the city’s poor, other groups—for example, Hispanics, and working-age adults (many of whom are parents of young children—also experience disproportionate, and increasing, rates of poverty (The Pew Charitable Trusts, 2017b). When comparing poverty in similar cities, Philadelphia falls in the middle on many indicators. New York has the lowest proportion of infants and toddlers living in poverty (25.4 percent), and Detroit has the highest (62.3 percent)—nearly double Philadelphia’s rate (32.2 percent). These comparisons suggest Philadelphia’s relative strength on this measure, but also what improvement may be achievable.
- **The data show substantial racial and ethnic disparities (in some cases, even greater than those seen at the national level) in the health of Philadelphia’s infants and toddlers.** Infant mortality, rates of late or no prenatal care, and the prevalence of low birthweight are all higher in Philadelphia than the U.S. average. Among the city’s black and Hispanic infants, rates of low birthweight and preterm births are especially high. **Redressing a long history of racial and ethnic inequities will require multipronged efforts, but the process must include expanding access—particularly for people of color—to comprehensive, affordable health care for expecting and new mothers, and to improved public education on the importance of a healthy pregnancy.**
- **Philadelphia’s notable pockets of success may offer lessons for enhancing the effectiveness of interventions in other areas.** The city has increased its access to more affordable, high-quality early care and education programs, although more options are needed for infants and toddlers, specifically. Philadelphia can and is continuing to build on its successes. For example, the rate of smoking during pregnancy—which contributes to many childhood health problems—is lower in Philadelphia than in the nation as a whole. Among Philadelphia’s black mothers, the rate of breastfeeding—one of the most important strategies for promoting infant health—is higher than the national average. More infants and toddlers are up-to-date on their immunizations in Philadelphia than in the United States overall.
- **More data are needed at neighborhood and community levels to guide decisions on where to target resources.** Relatively few data for this report could be disaggregated and analyzed at the zip code level; most indicators could be reported at a city-wide level only. For example, more data are needed at the neighborhood level on the availability and qualifications of infant-toddler care providers, the supply and demand of home visiting services, and on new families who have multiple characteristics that put them at high risk. There is likely to be a growing need for sub-city geographic information to guide decisions on where to target resources for young children and their families.

This report informs an understanding of the well-being of Philadelphia’s youngest residents, and assists in identifying areas for improvement or expansion of indicators. Given Philadelphia’s existing activities in support of infants and toddlers, this report, together with other sources of information, can provide a starting point from which to monitor further progress.

References

- Almond, D., Hoynes, H. W., & Schanzenbach, D. W. (2008). *Inside the War on Poverty: The impact of food stamps on birth outcomes*. Madison, WI: Institute for Research on Poverty. Retrieved from www.irp.wisc.edu
- American Academy of Pediatrics. (2013). *Key Facts about Immigrant Children*. Retrieved from https://www.aap.org/en-us/Documents/cocp_toolkit_keyfacts.pdf
- Aron, L., Jacobson, W., & Turner, M.A. (2013). *Addressing Deep and Persistent Poverty: A Framework for Philanthropic Planning and Investment*. Washington, DC: Urban Institute. Retrieved from <https://www.urban.org/research/publication/addressing-deep-and-persistent-poverty-framework-philanthropic-planning-and-investment>
- A Running Start Philadelphia, for every child, birth to 5 (2015). Shared Prosperity Philadelphia. Retrieved from <http://williampennfoundation.org/sites/default/files/reports/A-Running-Start-Philadelphia-Report.pdf>
- Bishaw, A. (2011). *Areas with Concentrated Poverty: 2006-2010. American Community Survey Brief*. Suitland, MD: U.S. Census Bureau. Retrieved from <https://www.census.gov/content/dam/Census/library/publications/2011/acs/acsbr10-17.pdf>
- Bradley, R. H., & Corwyn, R. F. (2002). Socioeconomic status and child development. *Annual Review of Psychology*, 53(1), 371-99. doi: 10.1146/annurev.psych.53.100901.135233
- Brooks-Gunn, J., and Duncan, G. (1997). The effects of poverty on children. *The Future of Children*, 7(2), 55-71. doi: 10.2307/1602387
- Burger, K. (2010). How does early childhood care and education affect cognitive development? An international review of the effects of early interventions for children from different social backgrounds. *Early Childhood Research Quarterly*, 25(2), 140-165. doi: 10.1016/j.ecresq.2009.11.001
- Carlson, M & Corcoran, M. (2001). Family structure and children's behavioral and cognitive outcomes. *Journal of Marriage and the Family* 63(3), 779-792. doi: 10.1111/j.1741-3737.2001.00779.x
- Castro, D. C., García, E. E., & Markos, A. M. (2013). *Dual Language Learners: Research Informing Policy*. Chapel Hill, NC: The University of North Carolina, Frank Porter Graham Child Development Center. Retrieved from http://fpg.unc.edu/sites/fpg.unc.edu/files/resources/reports-and-policy-briefs/FPG_CECER-DLL_ResearchInformingPolicyPaper.pdf
- Cauthen, N. (2002). *Policies that improve family income matter to children*. National Center for Children in Poverty. Retrieved from http://www.nccp.org/publications/pdf/text_480.pdf
- Centers for Disease Control and Prevention. (2015a). *National Vital Statistics System* [data file]. Retrieved from <https://www.cdc.gov/nchs/nvss/index.htm>
- Centers for Disease Control and Prevention. (2015b). *Parents' Guide to Immunization*. Retrieved from <http://www.cdc.gov/vaccines/pubs/parents-guide/default.htm>
- Centers for Disease Control and Prevention. (2017). *Lead*. Retrieved from https://www.cdc.gov/nceh/lead/acclpp/blood_lead_levels.htm
- Child Trends DataBank. (2014a). *Dual Language Learners*. Available at: <https://www.childtrends.org/?indicators=dual-language-learners>
- Child Trends DataBank. (2015a). *Late or No Prenatal Care*. Available at: <https://www.childtrends.org/?late-or-no-prenatal-care>
- Child Trends DataBank. (2015b). *Preterm Births*. Available at: <https://www.childtrends.org/?indicators=preterm-births>
- Child Trends DataBank. (2015c). *Low and Very Low Birthweight Infants*. Available at: <http://www.childtrends.org/?indicators=low-and-very-low-birthweight-infants>

- Child Trends DataBank. (2015d). *Immunization*. Available at: <https://www.childtrends.org/?indicators=immunization>
- Child Trends DataBank. (2015e). *Births to Unmarried Women*. Available at: <https://www.childtrends.org/?indicators=births-to-unmarried-women>
- Child Trends DataBank. (2015f). *Secure Parental Employment*. Available at: <https://www.childtrends.org/indicators/secure-parental-employment/>
- Child Trends DataBank. (2015g). *Foster Care*. Available at: <https://www.childtrends.org/?indicators=foster-care>
- Child Trends DataBank. (2016a). *Children in Poverty*. Available at: <https://www.childtrends.org/?indicators=children-in-poverty>
- Child Trends DataBank. (2016b). *Child Maltreatment*. Available at: <https://www.childtrends.org/?indicators=child-maltreatment>
- Child Trends DataBank. (2016c). *Teen Births*. Available at: <https://www.childtrends.org/indicators/teen-births/>
- Child Trends DataBank. (2016d). *Mothers who Smoke while Pregnant*. Available at: <https://www.childtrends.org/?indicators=mothers-who-smoke-while-pregnant>
- Child Trends DataBank. (2016e). *Breastfeeding*. Available at: <https://www.childtrends.org/?indicators=breastfeeding>
- Child Trends DataBank. (2016f). *Asthma*. Available at: <https://www.childtrends.org/?indicators=asthma>
- Child Trends DataBank. (2016g). *Infant, Child, and Teen Mortality*. Available at: <https://www.childtrends.org/?indicators=infant-child-and-teen-mortality>
- Child Trends DataBank. (2016h). *Fertility and Birth Rates*. Available at: <https://www.childtrends.org/?indicators=fertility-and-birth-rates>
- Child Trends DataBank. (2016i). *Receipt of SNAP Benefits (Food Stamps)*. Available at: <https://www.childtrends.org/indicators/food-stamp-receipt/>
- Child Trends DataBank. (2017). *Lead Poisoning*. Available at: <https://www.childtrends.org/?indicators=lead-poisoning>
- City of Philadelphia. (n.d.). *A Running Start Health*. Available at: <http://runningstarthealth.phila.gov/>
- City of Philadelphia, Office of the Mayor. (n.d.). *What we do*. Available at: <https://beta.phila.gov/departments/mayor/>
- Colby, S. L. & Ortman, J.M. (2014). Projections of the Size and Composition of the U.S. Population: 2014 to 2060, *Current Population Reports*, P25-1143, U.S. Census Bureau, Washington, DC.
- Cox, R. G., Zhang, L., Zotti, M. E., & Graham, J. (2011). Prenatal care utilization in Mississippi: Racial disparities and implications for unfavorable birth outcomes. *Maternal and Child Health Journal*, 15(7), 931-942. <http://dx.doi.org/udel.idm.oclc.org/10.1007/s10995-009-0542-6>
- Dahl, G., and Lochner, L. (2008). The impact of family income on child achievement: Evidence from the Earned Income Tax Credit. *NBER Working Paper No. 14599*. Washington, DC: National Bureau of Economic Research.
- Demo, D., & Cox, M. (2000). Families with young children: A review of research in the 1990s. *Journal of Marriage and the Family*, 62(4), 876-895. doi: 10.1111/j.1741-3737.2000.00876.x
- Department of Public Health, City of Philadelphia. (2016). *Preliminary Vital Statistics Report: Philadelphia 2015-2016*. Retrieved from <http://www.phila.gov/health/pdfs/commissioner/2015%20-%202016%20Preliminary%20Philadelphia%20>

[Vital%20Statistics%20Report.pdf](#)

Early Head Start National Resource Center. (n.d.). *National Center on Early Childhood Development, Teaching, and Learning (NCECDTL)*. [Website Page]. Retrieved from <http://eclkc.ohs.acf.hhs.gov/hslc/tta-system/ehsnrc>

Fantuzzo, J., LeBoeuf, W., Brumley, B., & Perlman, S. (2013). A population-based inquiry of homeless episode characteristics and early educational well-being. *Children and Youth Services Review, 35*(6), 966-972. doi: 10.1016/j.childyouth.2013.02.016

Fox, M.K., Hamilton, W., & Lin, B. (2004). Effects of food assistance and nutrition programs on nutrition and health: Volume 4, Executive summary of the literature review. *Economic Research Service/USDA*. Retrieved from: https://www.ers.usda.gov/webdocs/publications/46575/30216_fanrr19-4_002.pdf?v=41479

Garfield, R., Majerol, M., Damico, A. & Foutz, J. (2016). The uninsured: A primer—Key facts about health insurance and the uninsured in the wake of health care reform. Prepared for the Kaiser Commission on Medicaid and the Uninsured. Retrieved from <http://files.kff.org/attachment/Report-TheUninsured-A%20Primer-Key-Facts-about-Health-Insurance-and-the-Uninsured-in-America-in-theEra-of-Health-Reform>

Gartner, L.M., & Eidelman, A. (2005). Breastfeeding and the use of human milk. *Pediatrics, 115*(2), 496-506. doi: 10.1542/peds.2004-2491

Gewirtz, A., Hart-Shegos, E., & Medhanie, A. (2008). Psychosocial status of homeless children and youth in family supportive housing. *American Behavioral Scientist, 51*(6), 810-823. doi: 10.1177/0002764207311989

Goodwin, R. D., Wickramaratne, P., Nomura, Y., & Weissman, M. M. (2007). Familial depression and respiratory illness in children. *Archives of Pediatrics & Adolescent Medicine, 161*(5), 487-494. doi:10.1001/archpedi.161.5.487

Grant, R., Shapiro, A., Joseph, S., Goldsmith, S., Rigual-Lynch, L., & Redlener, I. (2007). The health of homeless children revisited. *Advances in Pediatrics, 54*(1), 173-187. doi: 10.1016/j.yapd.2007.03.010

Guterman, N.B. (2001). *Stopping Child Maltreatment before it Starts: Emerging Horizons in Early Home Visitation Services*. Thousand Oaks, CA: Sage Publications.

Halle, T. G., Whittaker, J. V., Zepeda, M., Rothenberg, L., Anderson, R., Daneri, P., Wessel, J., & Buysse, V. (2014). The social-emotional development of dual language learners: Looking back at existing research and moving forward with purpose. *Early Childhood Research Quarterly, 29*(4), 734-749. doi: 10.1016/j.ecresq.2013.12.002

Harvard University, Center on the Developing Child (2009). *Five Numbers to Remember About Early Childhood Development* (Brief). Retrieved from <https://46y5eh11fhgw3ve3ytpwxt9r-wpengine.netdna-ssl.com/wp-content/uploads/2017/11/Five-Numbers-to-Remember-About-Early-Childhood-Development-updated-1.pdf>

Haveman, R., Wolfe, B., & Pence, K. (2001). Intergenerational effects of nonmarital and early childbearing. In L. L. Wu, & B. Wolfe (Eds.), *Out of Wedlock: Causes and Consequences of Nonmarital Fertility*. New York, NY: Russell Sage Foundation.

Hernandez, D. J., Denton, N. A., & Macartney, S. E. (2008). Children in immigrant families: looking to America's future. *Social Policy Report, 22*(3). Retrieved from <https://files.eric.ed.gov/fulltext/ED521704.pdf>

Heron, M. (2016). Deaths: Leading causes for 2013. *National Vital Statistics Reports, 65*(2). Hyattsville, Maryland: National Center for Health Statistics. Retrieved from: http://www.cdc.gov/nchs/data/nvsr/nvsr65/nvsr65_02.pdf

Kahn, J. & Moore, K. A. (2010). *What Works for Home Visiting Programs: Lessons from Experimental Evaluations of Programs and Interventions*. *Child Trends Fact Sheet*. Washington, DC: Child Trends. Retrieved from <https://www.childtrends.org/publications/what-works-for-home-visiting-programs-lessons-from-experimental-evaluations-of-programs-and-interventions/>

- Kids Count Data Center (2015). *Children in Foster Care by Age Group*. [Data set]. Retrieved from <http://datacenter.kidscount.org/data/tables/6244-children-in-foster-care-by-age-group#detailed/1/any/false/573,869,36,868,867/1889,2616,2617,2618,2619,122/12988,12989>
- Kreider, B., Pepper, J. V., Gundersen, C., & Jolliffe, D. (2012). Identifying the effects of SNAP (food stamps) on child health outcomes when participation is endogenous or misreported. *Journal of the American Statistical Association*, 107(499), 958-975.
- Lin, V., Cook, M., & Supplee, L. (2018). Snapshot of the home visiting system in the greater Philadelphia area: Research findings and recommendations. In press.
- March of Dimes (2012). *What We Know about Prematurity*. [Website page]. Retrieved from http://www.marchofdimes.com/mission/prematurity_indepth.html
- March of Dimes. (2014). *Low Birthweight*. Retrieved from: <https://www.marchofdimes.org/complications/low-birthweight.aspx>
- Marra, F., Marra, C. A., Richardson, K., Lynd, L. D., Kozyrskyj, A., Patrick, D. M., Bowie, W. R., & FitzGerald, J. M. (2009). Antibiotic use in children is associated with increased risk of asthma. *Pediatrics*, 123(3), 1003-1010. doi: [10.1542/peds.2008-1146](https://doi.org/10.1542/peds.2008-1146)
- Martin, J. A., Hamilton, B. E., Osterman, M. J., Driscoll, A. K., & Mathews, T. J. (2017). Births: Final Data for 2015. *National Vital Statistics Reports: From the Centers for Disease Control and Prevention, National Center for Health Statistics, National Vital Statistics System*, 66(1), 1-70. Retrieved from https://www.cdc.gov/nchs/data/nvsr/nvsr66/nvsr66_01.pdf
- McBride, J. T. (2011). The association of acetaminophen and asthma prevalence and severity. *Pediatrics*, 128(6), 1181-1185. doi: [10.1542/peds.2011-1106](https://doi.org/10.1542/peds.2011-1106)
- McCabe, A., Tamis-LeMonda, C.S., Bornstein, M. H., Cates, C.B., Golinkoff, R., Guerra, A. W.,... & Mendelsohn, A. (2013). Multilingual children: Beyond myths and toward best practices. *Social Policy Report*, 27(4), 1-21. Retrieved from <https://www.fcd-us.org/assets/2016/04/Multilingual-Children-Beyond-Myths-and-Towards-Best-Practices.pdf>
- McLanahan, S. & Sandefur, G. (1994). *Growing up with a Single Parent: What Hurts, What Helps*. Cambridge, MA: Harvard University Press.
- Migration Policy Institute. (2016). [Graph of children in U.S. immigrant families, number and share of the total U.S. child population, by age group and state]. *Data accessed from U.S. Census Bureau, 2016 American Community Survey (ACS) and 1990 Decennial Census*. Retrieved from <https://www.migrationpolicy.org/programs/data-hub/charts/children-immigrant-families>
- Murphey, D., Cooper, P. M., & Forry, N. (2013). *The Youngest Americans: A Statistical Portrait of Infants and Toddlers in the United States*. Bethesda, MD: The Robert C. McCormick Foundation and Child Trends. Retrieved from <https://www.childtrends.org/wp-content/uploads/2015/12/2015-28DC-Infants-Toddlers.pdf>
- Murphey, D. (2017). Health insurance coverage improves child well-being. Retrieved from https://www.childtrends.org/wp-content/uploads/2017/05/2017-22HealthInsurance_finalupdate.pdf
- National Institute of Child Health and Human Development, Safe to Sleep Campaign. (n.d.). *Fast facts about SIDS*. [Website page]. Retrieved from <https://www.nichd.nih.gov/sts/about/SIDS/Pages/fastfacts.aspx>
- National Research Council. (1993). *Understanding Child Abuse and Neglect*. Washington, DC: National Academy Press. Retrieved from <http://www.nap.edu/openbook.php?isbn=0309048893>
- National Scientific Council on the Developing Child. (2004). Young children develop in an environment of relationships. Working Paper No. 1. Retrieved from <http://www.developingchild.net>

- Ortqvist, A. K., Lundholm, C., Carlstrom, E., Lichtenstein P., Cnattingius, S., & Almqvist, C. (2009). Familial factors do not confound the association between birth weight and childhood asthma. *Pediatrics*, *124*(4), e737-e743. doi: 10.1542/peds.2009-0305
- Peacock, S., Konrad, S., Watson, E., Nickel, D., & Muhajarine, N. (2013). Effectiveness of home visiting programs on child outcomes: A systematic review. *BMC Public Health*, *13*(1), 17. doi: 10.1186/1471-2458-13-17
- People's Emergency Center (2018). Reports indicate a 35 percent increase in Pennsylvania's children and youth who experience homelessness. Retrieved from https://www.pec-cares.org/uploads/2/9/3/9/29391481/ehcy_summary_of_sy_2016_data_updated-2018-05-01.pdf
- Perlman, S., & Fantuzzo, J. (2010). Timing and influence of early experiences of child maltreatment and homelessness on children's educational well-being. *Children and Youth Services Review*, *32*(6), 874-883. doi: 10.1016/j.childyouth.2010.02.007
- Pew Research Center. (2015). *Parenting in America: Outlook, worries, aspirations are strongly linked to financial situation*. Retrieved from <http://www.pewsocialtrends.org/2015/12/17/1-the-american-family-today/>
- Philadelphia Department of Public Health, Environmental Health Services, Lead and Healthy Homes Program. (2016). *Childhood Lead Poisoning Surveillance Report 2016*. Retrieved from <http://www.phila.gov/health/pdfs/ChildhoodLead/PDPH%20Lead%20Poisoning%20Surveillance%20Report%202016.pdf>
- Public Citizens for Children and Youth. (2016). *Left Out: The Status of Children in Philadelphia*. Retrieved from http://www.pccy.org/wp-content/uploads/2016/10/Left-Out_Philadelphia-1.pdf
- Ranson, K. E. & Urichuk, L. J. (2008) The effect of parent-child attachment relationships on child biopsychosocial outcomes: a review, *Early Child Development and Care*, 178:2, 129-152, DOI: 10.1080/03004430600685282
- Raymond, J., & Brown, M. J. (2015). Childhood blood lead levels - United States, 2007-2012. *Morbidity and Mortality Weekly Report*: 62(54), 76- 80. Retrieved from <https://www.cdc.gov/mmwr/preview/mmwrhtml/mm6254a5.htm>
- Reinvestment Fund. (2017). *Estimating changes in the supply of and demand for child care in Philadelphia*. Retrieved from <https://www.reinvestment.com/childcaremap/pdfs/Reinvestment%20Fund%20-%20Estimating%20Changes%20in%20the%20Supply.pdf>
- Reinvestment Fund. (2018). *Estimating changes in the supply of and demand for child care in Philadelphia*. Retrieved from https://www.reinvestment.com/wp-content/uploads/2018/01/Reinvestment-Fund_ChildcareAnalysis2017_Final_web.pdf
- Reynolds, A. J., Magnuson, K. A., & Ou, S.-R. (2010). Preschool-to-third grade programs and practices: A review of research. *Children and Youth Services Review*, *32*(8), 1121-1131. doi: 10.1016/j.childyouth.2009.10.017
- Ricketts, S. A., Murray, E. K., & Schwalberg, R. (2005). Reducing low birthweight by resolving risks: Results from Colorado's Prenatal Plus Program. *American Journal Public Health*, *57*(11), 1952-1957. doi: 10.2105/AJPH.2004.047068
- Saha, C., Riner, M. E., & Liu, G. (2005). Individual and neighborhood-level factors in predicting asthma. *Archives of Pediatrics & Adolescent Medicine*, *159*(8), 759-763. doi: 10.1001/archpedi.159.8.759
- Shared Prosperity Philadelphia. (n.d.). *A Running Start*. Available at: <http://www.sharedprosperityphila.org/our-initiatives/a-running-start/>
- Skinner, C., Wight, V. R., Aratani, Y., Cooper, J. L., & Thampi, K. (2010). *English Language Proficiency, Family Economic Security, and Child Development*. New York: National Center for Children in Poverty.
- Slack, K. S., Holl, J. L., McDaniel, M., Yoo, J., & Bolger, K. (2004). Understanding the risks of child neglect: An exploration of poverty and parenting characteristics. *Child Maltreatment*, *9*(4), 395-408. doi: 10.1177/1077559504269193

- Solari, C.D., Shivji, A., de Sousa, T., Watt, R., & Silverbush, M. (2017). *2016 Annual Homeless Assessment Report (AHAR) to Congress. Part 2: Estimates of Homelessness in the United States*. Washington, DC: U.S. Department of Housing and Urban Development. Retrieved from <https://www.hudexchange.info/resources/documents/2016-AHAR-Part-2.pdf>
- Suglia, S. F., Enlow, M. B., Kullowatz, A., & Wright, R. J. (2009). Maternal intimate partner violence and increased asthma incidence in children. *Archives of Pediatrics & Adolescent Medicine*, *163*(3), 244-250. doi:10.1001/archpediatrics.2008.555
- The Pew Charitable Trusts. (2017a). *Philadelphia 2017: The State of the City*. Retrieved from http://www.pewtrusts.org/-/media/assets/2017/04/pri_philadelphia_2017_state_of_the_city.pdf
- The Pew Charitable Trusts. (2017b). *Philadelphia's poor: Who they are, where they live, and how that has changed*. Retrieved from http://www.pewtrusts.org/-/media/assets/2017/11/pri_philadelphias_poor.pdf
- Thomas, A. & Sawhill, I. (2005) For love and money? The impact of family structure on family income. *The Future of Children*, *15*(2), 57-74. doi: 10.1353/foc.2005.0020
- U.S. Department of Agriculture, Food and Nutrition Service. (2018). *Supplemental Nutrition Assistance Program (SNAP)*. [Website page]. Retrieved from <https://www.fns.usda.gov/snap/supplemental-nutrition-assistance-program-snap>
- U.S. Department of Education. (n.d.). *Part C - Homeless Education*. [Website page]. Retrieved from <https://www2.ed.gov/policy/elsec/leg/esea02/pg116.html>
- United States Census Bureau. (2016). *American community survey* [data file]. Retrieved from <https://www.census.gov/acs/www/data/data-tables-and-tools/data-profiles/2016/>
- Woo, J. G., Dolan, L. M., Morrow, A. L., Geraghty, S. R., & Goodman, E. (2008). Breastfeeding helps explain racial and socioeconomic status disparities in adolescent adiposity. *Pediatrics*, *121*(3), e458-e465. doi: 10.1542/peds.2007-1446
- Wright, R. J., Mitchell, H., Visness, C. M, Cohen, S., Stout, J., Evans, R., & Gold, D. R. (2004). Community violence and asthma morbidity: The inner-city asthma study. *American Journal of Public Health*, *94*(4), 625-632. doi: 10.2105/AJPH.94.4.625
- Wulczyn, F., Ernst, M., & Fisher, P. (2011). *Who are the Infants in Out-of-Home Care? An Epidemiological and Developmental Snapshot*. *Chapin Hall Issue Brief*. Retrieved from http://www.chapinhall.org/sites/default/files/publications/O6_08_11_Issue%20Brief_F_1.pdf

Appendix A: Data Tables for Figures

Table A1. Percentage of Child Population Living in Poverty, by Race/Hispanic Origin, 2016

	Philadelphia	United States
White	21.1%	13.4%
Black	35.3%	38.3%
Hispanic	45.5%	29.8%
Asian	14.7%	12.6%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

Table A2. Percent of Infants and Toddlers Living in Areas of Concentrated Poverty, 2011–2015

	Philadelphia	United States
Percentage of infants and toddlers living in census tracts where 20% or more of residents are living in poverty	64.8%	32.3%

Source: Child Trends' analysis of 2001–2015 American Community Survey data: Tables B09001 & S1701

Table A3. Emergency Room Visits for Asthma, Birth to Age 3, Philadelphia, 2016

	Philadelphia	United States
Quarter 1	1008	--
Quarter 2	571	--
Quarter 3	563	--
Quarter 4	1050	--
Annual total	3192	--

Source: PDPH Syndromic Surveillance System

Table A4. Percent of Infants and Toddlers Who Received Recommended Vaccinations

	Philadelphia	United States
Percent of infants and toddlers who have received selected vaccines	77.0%	70.7%

Sources: Philadelphia data from KIDS Registry, Philadelphia Department of Public Health (2016); US data from CDC, Morbidity and Mortality Weekly Report (2017)

Table A5. Infants/Toddlers as a Percentage of All Children in Foster Care, 2016

	Philadelphia	United States
Percent of children in foster care who are infants and toddlers	23.1%	18.2%

Source: Philadelphia data from Department of Human Services, City of Philadelphia (2017); US data from AFCARS (2016); Population data from U.S. Census Bureau, 2016 American Community Survey, PUMS data

Table A6. Percentage of Infants and Toddlers Living with at Least One Non-native-born Parent, by Race/Hispanic Origin, 2016

	Philadelphia	United States
White	24.27%	8.28%
Black	19.09%	17.40%
Hispanic	35.43%	47.16%
Asian	88.13%	88.42%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

Table A7. Home Language: Infants and Toddlers Living in Households where Limited English Is Spoken, by Race/Hispanic Origin, 2016

	Philadelphia		United States	
	Limited English household	Limited English household	Not limited English household	Not limited English household
White	4.5%	1.3%	98.7%	95.5%
Black	3.7%	3.0%	97.0%	96.3%
Hispanic	22.9%	17.4%	82.6%	77.1%
Asian	23.0%	23.0%	77.0%	77.0%
Total	10.4%	6.7%	93.3%	89.6%

Source: U.S. Census Bureau, 2016 American Community Survey, PUMS data

Table A8. Percentage of Infants (birth to age 1) Receiving Homelessness Services (emergency shelter and transitional housing)

	Philadelphia	United States
Children birth to age 1 receiving homelessness services (emergency shelter and transitional housing)	1.6%	0.9%

Source: Philadelphia Office of Homeless Services, 2016

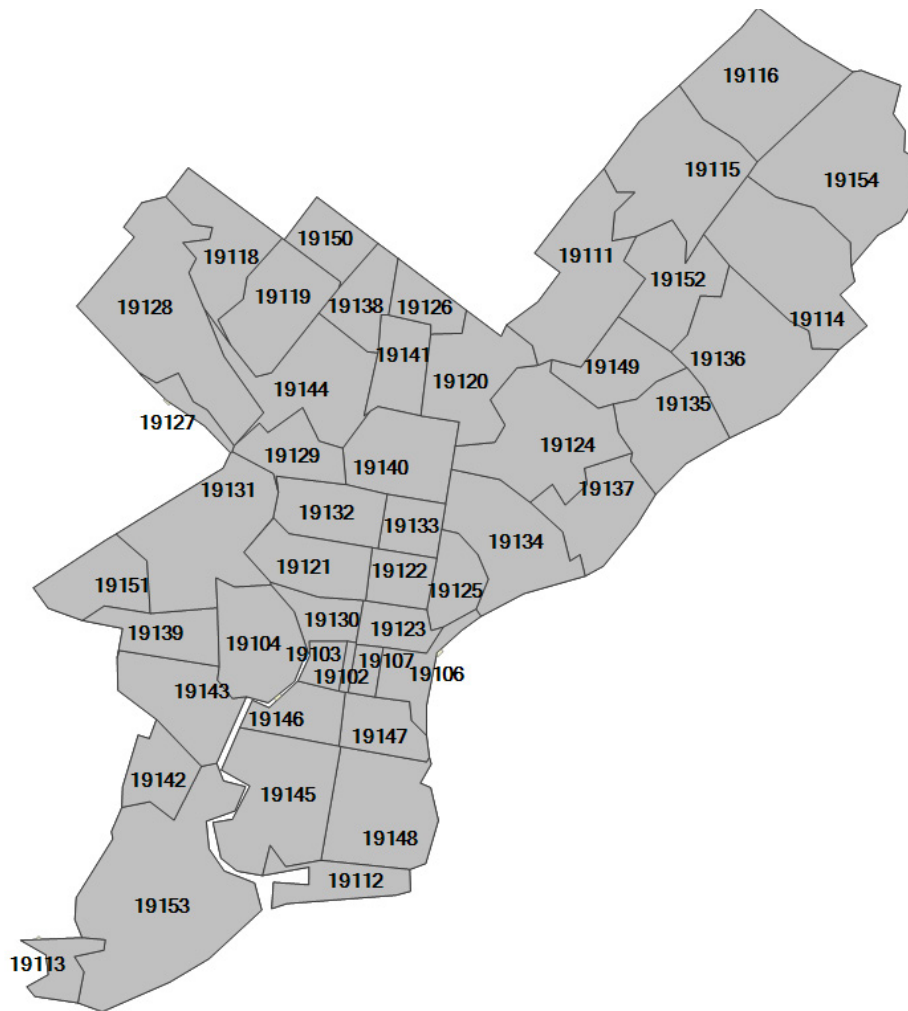
Table A9. Percent of Infants and Toddlers Receiving Homelessness Services

	Philadelphia	United States
0-1 years old	1.6	--
1-2 years old	1.7	--
2-3 years old	1.4	--

Source: Philadelphia Office of Homeless Services, 2016

Note: This data for infants and toddlers was not available at the national level (national data was only available for the 0-5 age group)

Appendix B: Map of Philadelphia with Zip Codes



Source: Zip codes are based on Tableau-generated latitudes and longitudes.

Appendix C: Zip Code Tables for Maps

Table C1. Lead Screening* and Newly Identified BLLs** $\geq 5\mu\text{g/dL}$ among Children Aged 0-2

Zip Code	Children Aged 0-2 with Newly Identified BLL $\geq 5\mu\text{g/dL}$	Children Aged 0-2 Screened for Lead Poisoning	Percent of Children Aged 0-2 Screened with Newly Identified BLL $\geq 5\mu\text{g/dL}$
19102	--	55	--
19103	8	264	3.0%
19104	41	588	7.0%
19106	--	134	--
19107	8	144	5.6%
19111	25	970	2.6%
19114	--	316	--
19115	9	365	2.5%
19116	--	318	--
19118	--	134	--
19119	42	461	9.1%
19120	82	1524	5.4%
19121	74	763	9.7%
19122	25	366	6.8%
19123	9	297	3.0%
19124	102	1637	6.2%
19125	32	520	6.2%
19126	24	228	10.5%
19127	8	78	10.3%
19128	32	689	4.6%
19129	12	232	5.2%
19130	17	540	3.1%
19131	62	750	8.3%
19132	116	831	14.0%
19133	71	795	8.9%
19134	112	1572	7.1%
19135	31	645	4.8%
19136	14	508	2.8%
19137	--	102	--
19138	44	568	7.7%
19139	85	936	9.1%
19140	153	1453	10.5%
19141	60	661	9.1%

Table C1, cont. Lead Screening* and Newly Identified BLLs** \geq 5 μ g/dL among Children Aged 0-2

Zip Code	Children Aged 0-2 with Newly Identified BLL \geq 5 μ g/dL	Children Aged 0-2 Screened for Lead Poisoning	Percent of Children Aged 0-2 Screened with Newly Identified BLL \geq 5 μ g/dL
19142	55	853	6.4%
19143	142	1432	9.9%
19144	126	850	14.8%
19145	32	925	3.5%
19146	45	1043	4.3%
19147	19	963	2.0%
19148	59	1162	5.1%
19149	30	1113	2.7%
19150	11	270	4.1%
19151	50	585	8.5%
19152	7	462	1.5%
19153	7	239	2.9%
19154	--	279	--

Source: Pennsylvania Department of Health NEDSS, Philadelphia Department of Public Health, 2016

Notes:

*Screened by any blood test for lead.

**By any type of blood specimen.

-- Data suppressed from the table due to low sample size or missing data

Zip codes 19109, 19112, and 19113 were removed from this table because they are either non-residential areas or have fewer than five residents under the age of five.

Table C2. Percent of children under 5 living in poverty

Zip Code	Percent of Children Under 5 in Poverty
19102	0.0%
19103	17.1%
19104	45.8%
19106	0.0%
19107	12.2%
19111	29.1%
19114	14.0%
19115	21.5%
19116	14.1%
19118	5.6%
19119	10.0%
19120	37.1%

Table C2, cont. Percent of children under 5 living in poverty

Zip Code	Percent of Children Under 5 in Poverty
19121	47.9%
19122	48.9%
19123	15.7%
19124	45.7%
19125	34.5%
19126	21.4%
19127	10.7%
19128	11.5%
19129	24.1%
19130	15.5%
19131	46.2%
19132	49.5%
19133	76.1%
19134	62.4%
19135	29.2%
19136	30.5%
19137	27.7%
19138	49.6%
19139	48.0%
19140	60.7%
19141	47.9%
19142	43.7%
19143	45.5%
19144	43.6%
19145	33.0%
19146	20.8%
19147	10.6%
19148	29.1%
19149	33.8%
19150	22.6%
19151	35.2%
19152	26.7%
19153	34.2%
19154	18.0%

Source: Philadelphia Department of Public Health, 2016

Notes: Zip codes 19109, 19112, and 19113 were removed from this table because they are either non-residential areas or have fewer than five residents under the age of five.

Table C3. Children aged 19-35 months in 2016 up-to-date immunization rates for 4:3:1:3 series

Zip Code	Percentage of Children with up-to-date Immunizations
19102	59.0%
19103	54.6%
19104	76.7%
19106	66.3%
19107	56.2%
19111	79.0%
19114	65.8%
19115	68.0%
19116	59.6%
19118	71.0%
19119	76.5%
19120	80.4%
19121	76.2%
19122	81.5%
19123	77.5%
19124	81.0%
19125	81.4%
19126	79.9%
19127	69.4%
19128	78.7%
19129	72.3%
19130	69.4%
19131	77.4%
19132	76.2%
19133	79.0%
19134	78.5%
19135	78.0%
19136	80.9%
19137	68.8%
19138	77.7%
19139	78.4%
19140	78.4%
19141	78.0%
19142	77.7%
19143	77.8%
19144	76.9%

Table C3, cont. Children aged 19-35 months in 2016 up-to-date immunization rates for 4:3:1:3 series

Zip Code	Percentage of Children with up-to-date Immunizations
19145	79.7%
19146	81.1%
19147	79.4%
19148	81.9%
19149	78.5%
19150	78.8%
19151	75.1%
19152	78.2%
19153	69.7%
19154	58.8%

Source: KIDS Registry, Philadelphia Department of Public Health, 2016

Notes: Zip codes 19109, 19112, and 19113 were removed from this table because they are either non-residential areas or have fewer than five residents under the age of five.

Acknowledgements

The Child Trends team would like to thank the many Philadelphia stakeholders who contributed data and provided input to the report, with a special thanks to Christie Balka (Mayor's Office of Community Empowerment and Opportunity, City of Philadelphia), James Moore (Data Management Office, Philadelphia Department of Health and Human Services), and Dr. Raynard Washington (Philadelphia Department of Public Health).

A special thank you to the following agencies in Philadelphia who contributed data to this report:

- City of Philadelphia Department of Human Services
- Department of Behavioral Health and Intellectual Disability Services
- Office of Homeless Services
- Philadelphia Department of Public Health
- The Pennsylvania Office of Childhood Development and Early Learning
- Reinvestment Fund

Child Trends is also grateful for the financial support provided by the William Penn Foundation for the development of this report. The opinions expressed in this report are those of the authors, and do not necessarily reflect the views of the William Penn Foundation.

Publication #2018-22

Copyright 2018 by Child Trends, Inc.