

Section I: Statewide Coordinated Statement of Need/Needs Assessment

A. Epidemiologic Overview

The following section has been updated, and is based on tables and figures from the Integrated Epidemiologic Profile for HIV/AIDS Prevention and Care Planning, Philadelphia Eligible Metropolitan Area (2018).¹ Both the original profile and the following section combine data from numerous sources, and they have been developed in accordance with the 2014 Integrated Guidelines for Developing Epidemiologic Profiles.² The complete epidemiologic profile describes the general population of the EMA, risk indicators, characteristics of the local HIV epidemic, unmet need and service utilization. The epidemiologic overview below includes selected highlights from the full profile, augmented by further information and context from the Philadelphia Department of Public Health (PDPH).

¹ Office of HIV Planning. (2018). Integrated Epidemiologic Profile for HIV/AIDS Prevention and Care Planning, Philadelphia Eligible Metropolitan Area. Retrieved from <https://www.hivphilly.org/data-and-statistics/epi-profile/>.

² Centers for Disease Control and Prevention and Health Resources and Services Administration. (2014). Integrated Guidance for Developing Epidemiologic Profiles: HIV Prevention and Ryan White HIV/AIDS Programs Planning. Atlanta, Georgia: Centers for Disease Control and Prevention.

a. Geographical Region of the EMA

The Health Resources and Services Administration (HRSA) defines the Philadelphia Eligible Metropolitan Area (EMA) as Bucks, Chester, Delaware, Montgomery, and Philadelphia Counties in Pennsylvania, and Burlington, Camden, Gloucester, and Salem Counties in New Jersey.

The Philadelphia Eligible Metropolitan Area



b. Sociodemographic Characteristics

The Philadelphia area spans two states and encompasses urban, suburban, and rural areas. Demographic makeup varies greatly by area, from 85% non-Hispanic White in Bucks County to the majority-minority City of Philadelphia. Chester County is the highest-income county in Pennsylvania and one of the wealthiest counties in the United States, while Philadelphia has the highest rate of deep poverty of any major city in the country. These demographic variations within the region also translate to variations in at-risk populations and people living with HIV/AIDS throughout the area.

In 2016, the nine-county Philadelphia metropolitan area had 5,393,549 residents.³ Of these, Philadelphia had 1,559,938 residents. In the suburban Pennsylvania counties, Bucks had 626,220 residents, Chester had 512,028 residents, Delaware had 562,316 residents, and Montgomery had 815,876 residents, totaling 2,516,440 suburban Pennsylvania residents. Among the Southern New Jersey

³ U.S. Census Bureau. (2018). PEPANNRES Annual Estimates of the Resident Population: April 1, 2011 to July 1, 2016 [Data]. 2016 Population Estimates. Retrieved from <http://factfinder.census.gov/>.

counties, Burlington had 450,236 residents, Camden had 511,145 residents, Gloucester had 291,285 residents, and Salem had 64,504 residents, totaling 1,317,170 Southern New Jersey residents.

Race and Ethnicity

Racial and ethnic composition varies widely across the Philadelphia area. In 2016, 63% of the EMA's population was non-Hispanic White, 20% was non-Hispanic Black, 6% was non-Hispanic Asian, and 9% was Hispanic (all races).⁴ Yet, in Philadelphia, only 35% of the general population was White, while 42% was Black, 7% was Asian, and 14% was Hispanic. Camden County was 58% White, 18% Black, 6% Asian, and 16% Hispanic. Bucks County was 85% White, 4% Black, 4% Asian, and 5% Hispanic. Even within these counties, racial and ethnic distribution was uneven. In each county, there are areas in which residents are predominantly of a single racial/ethnic group. This is particularly stark in Philadelphia, where the sheer population makes these patterns more evident. In addition, according to a 2015 analysis, Philadelphia is the fourth-most segregated city in the United States.⁵ This is illustrated through the Philadelphia county map on the following page.

Poverty and Income

As with many metropolitan areas, income varied throughout the Philadelphia EMA. By county, the highest median household income was found in Chester County (\$88,995 in 2016), while median household income in Coatesville (a city within Chester County) was only \$36,212.⁶ This is even lower than Philadelphia's median household income of \$39,770. In Camden County, the median household income was \$63,028, but in the City of Camden, median household income was only \$26,214. Median individual income by gender varied from county to county within the EMA. The income gap was largest in the county with the highest income (Chester) and smallest in the county with the lowest income (Philadelphia), both in absolute dollars and as a ratio.

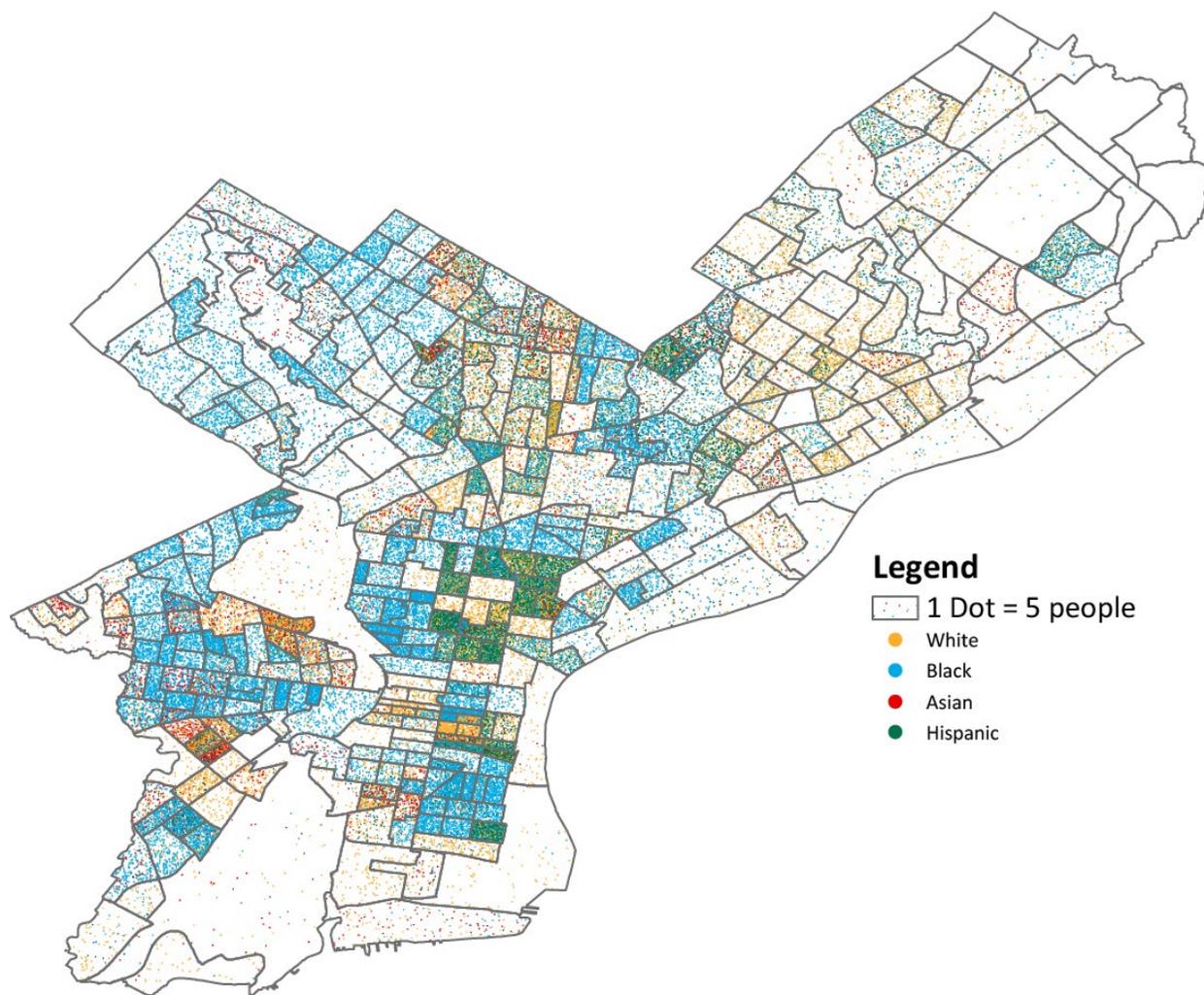
Less than 6% of people in Bucks County lived below the poverty level, while nearly 26% of Philadelphia lived in poverty. In every county, poverty is particularly concentrated in specific areas, although it is the most widespread in Philadelphia. The map on the next page illustrates where White, Black, Asian, and Hispanic residents in poverty live throughout the city. As seen below, Hispanics in poverty are concentrated in lower Northeast Philadelphia, while Blacks in poverty are concentrated in North, West, and Southwest Philadelphia. Whites and Asians in poverty are slightly more distributed: poor Whites are found in South, near West, upper Northeast, and lower Northwest Philadelphia, while poor Asians are concentrated in pockets in South Philadelphia, upper North Philadelphia, and the Northeast.

⁴ U.S. Census Bureau. (2018). DP05 Demographic and Housing Estimates [Data]. *2012-2016 American Community Survey 5-Year Estimates*. Retrieved from <http://factfinder.census.gov/>.

⁵ Silver, Nate. (2015). The Most Diverse Cities Are Often The Most Segregated. Retrieved from <http://fivethirtyeight.com/features/the-most-diverse-cities-are-often-the-most-segregated/>.

⁶ U.S. Census Bureau. (2018). S1901 Income in the Past 12 Months (in 2016 Inflation-Adjusted Dollars) [Data]. *2012-2016 American Community Survey 5-Year Estimates*. Retrieved from <http://factfinder.census.gov/>.

People in Philadelphia Below Poverty, by Race/Ethnicity (2014)



Author: Mari Ross-Russell, Office of HIV Planning

Maps describing the racial/ethnic distribution of people in poverty are available for each of the nine counties online. While these maps provide context on all people below poverty, it is notable that 12.1% of Philadelphia lives in deep poverty (defined as less than half of the federal poverty level). This is the highest deep poverty rate of the ten largest cities in the United States. The City of Camden had an even higher deep poverty rate in 2016, with 18.9% of residents living in deep poverty.

Education

In every county and both states of the EMA, poverty rates decreased for both men and women as educational attainment increased. In 2016, the poverty rate for men within the EMA with at least a bachelor's degree was 3.1%, and 3.8% for women.⁷ By contrast, the poverty rate among men who have not completed high school (or a GED program) was 18.6%; for women, this rate was 23.8%. In the City of Philadelphia, women without a high school education had a poverty rate of 41.4%, while men without a

⁷ U.S. Census Bureau. (2018). B17003 Poverty Status in the Past 12 Months of Individuals by Sex by Educational Attainment [Data]. 2012-2016 American Community Survey 5-Year Estimates. Retrieved from <http://factfinder.census.gov/>.

high school education had a poverty rate of 33.7%. As seen below, education level is also linked to unemployment.

Employment

In Philadelphia, 12.5% of residents in the labor force were unemployed in 2016 (a decrease from 14.9% in 2014).⁸ Unemployment rates varied significantly throughout the nine-county area; for example, the unemployment rate in Chester County was only 5.3%. As with poverty, unemployment rates also varied within counties: while Camden County residents in the workforce experienced 8.8% unemployment, 16.5% of Camden City's workforce was unemployed.

Unemployment also varied by race/ethnicity: 8.3% of Whites in Philadelphia's labor force were unemployed, while 17.4% of Blacks and 16.7% of Hispanics (any race) were unemployed. In nearly every county in the nine-county area, Blacks and Hispanics experienced a higher rate of unemployment than Whites.

As seen with the poverty rate by education level, the rate of unemployment went down as the level of education increased. Philadelphians aged 25 – 64 who had less than a high school education saw an unemployment rate of 20.6%, while Philadelphians with at least a bachelor's degree had a 4.1% unemployment rate. Again, this was true of every county in the nine-county Philadelphia EMA.

Insurance

New Jersey fully expanded Medicaid in 2014. Pennsylvania had limited Medicaid expansion in 2014 under a program called Healthy PA but fully expanded Medicaid in 2015.

In 2016, 12.0% of Philadelphians were uninsured.⁹ Uninsured rates in the suburban Pennsylvania counties ranged from 4.4% in Montgomery County to 7.0% in Delaware County. In the New Jersey counties, uninsured rates ranged from 5.9% in Burlington County to 9.8% in Camden County.

By contrast, in 2010, 14.9% of Philadelphia was uninsured. In the suburban Pennsylvania Counties, uninsured rates went from 6.7% in Bucks County to 9.2% in Delaware County. Uninsured rates in the four New Jersey Counties ranged from 7.4% in Burlington County to 12.4% in Camden County. In fact, the percentage of people who were insured increased across all counties in the EMA between 2010 and 2016.

For all counties, uninsured rates were significantly higher among people who were unemployed. In each county, the uninsured rate among people who were unemployed was three to four times the uninsured rate for people who were currently employed. In 2016, the percentage of unemployed people who were uninsured ranged from 21.7% - 37.7% by county in the EMA.

⁸ U.S. Census Bureau. (2018). S2301 Employment Status [Data]. *2012-2016 American Community Survey 5-Year Estimates*. Retrieved from <http://factfinder.census.gov/>.

⁹ U.S. Census Bureau. (2018). S2701 Health Insurance Coverage Status [Data]. *2012-2016 American Community Survey 5-Year Estimates*. Retrieved from <http://factfinder.census.gov/>.

In all counties, men were more likely to be uninsured than women. In every county where data was available, the uninsured rate among Hispanics was much higher than among non-Hispanic Whites, ranging from 2.3 times as high in Philadelphia County to 6.8 times as high in Chester County.

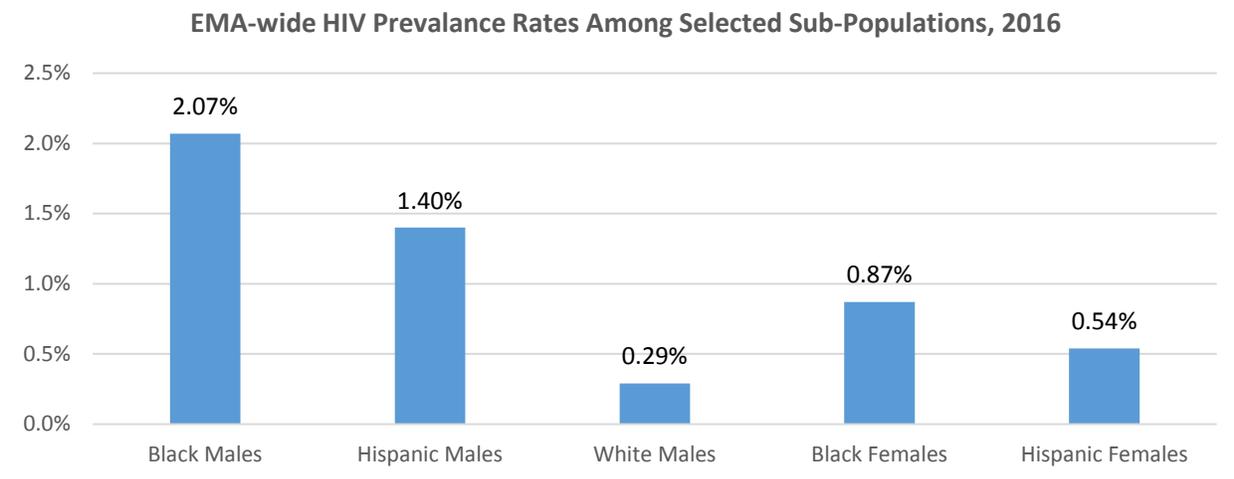
c. HIV/AIDS

As of 2016, 26,752 people were living with HIV/AIDS in the nine-county Philadelphia EMA. Of these, 12,012 (45%) were living with HIV (non-AIDS), while another 14,740 (55%) were living with AIDS. Between 2012 and 2016, there were 3,287 new HIV diagnoses and 1,876 new AIDS diagnoses.

Newly-Diagnosed HIV and AIDS Cases, Philadelphia EMA					
	2012	2013	2014	2015	2016
HIV (not AIDS)	712	729	679	596	571
AIDS	470	393	309	373	331

Prevalent HIV and AIDS Cases, Philadelphia EMA					
	2012	2013	2014	2015	2016
HIV (not AIDS)	11,244	11,508	11,843	11,816	12,012
AIDS	15,739	15,456	15,278	14,991	14,740

With 1.3% of residents living with HIV, the City of Philadelphia has a generalized epidemic, defined as a prevalence rate of 1% or higher. Prevalence for the entire nine-county EMA is about 0.3%. This prevalence rate varies by population, as displayed on the following page. When reviewing HIV prevalence by race/ethnicity and gender, Black men have the highest rates, followed by Hispanic men, Black women, and Hispanic women.



As with other characteristics within the nine-county Philadelphia EMA, HIV/AIDS varies within the area. For planning purposes, the nine counties in the Philadelphia EMA are broken out into three smaller regions: the City of Philadelphia, the four suburban Pennsylvania Counties (including Bucks, Chester, Delaware, and Montgomery), and the four New Jersey Counties (Burlington, Camden, Gloucester, and Salem). As seen previously, these smaller regions vary greatly by demographics and other characteristics.

The next table displays demographics of people who were newly diagnosed with HIV in 2016, contrasted with the demographics of all people living with HIV within the Philadelphia EMA. This information is useful for identifying emerging regional trends within the nine-county area. Specific populations will be discussed later in this section.

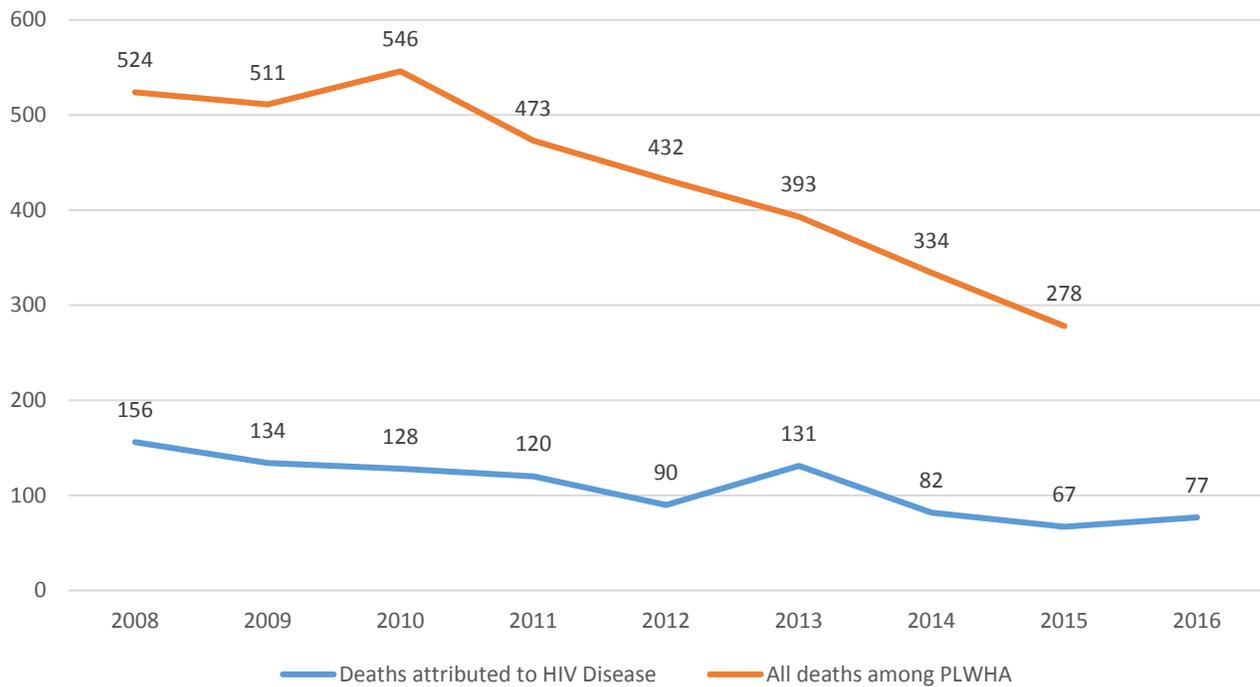
HIV (regardless of AIDS Status) New Diagnoses, and HIV/AIDS Prevalence Data by Demographic Group and Exposure Category for the Philadelphia EMA, 2016		
Demographic Group/Exposure Category	New Diagnoses	Prevalence
	HIV (regardless of AIDS Status)	Total PLWH N (%)
Race/Ethnicity		
White, not Hispanic	137 (19.0%)	6,057 (22.6%)
Black, not Hispanic	440 (61.0%)	15,532 (58.1%)
Hispanic	124 (17.2%)	4,052 (15.1%)
Asian/Pacific Islander	12 (1.7%)	268 (1.0%)
American Indian/Alaska Native	2 (0.3%)	47 (0.2%)
Multi-race	5 (0.7%)	791 (3.0%)
Unknown	1 (0.1%)	5 (0.0%)
Gender		
Male	532 (73.8%)	18,993 (71.0%)
Female	178 (24.7%)	7,503 (28.0%)
Transgender	11 (1.5%)	256 (1.0%)
Current Age as of Report Year		
<13 years	1 (0.1%)	53 (0.2%)
13 – 19 years	33 (4.6%)	129 (0.5%)
20-24 years	119 (16.5%)	669 (2.5%)
25-29 years	150 (20.8%)	1,836 (6.9%)
30-39 years	179 (24.8%)	4,267 (16.0%)
40-49 years	98 (13.6%)	5,858 (21.9%)
50+ years	141 (19.6%)	13,832 (51.7%)
Unknown	0 (0.0%)	108 (0.4%)
Exposure Category		
Men who have sex with men	365 (50.6%)	9,825 (36.7%)
Persons who inject drugs	38 (5.3%)	5,402 (20.2%)
Men who have sex with men and inject drugs	9 (1.2%)	853 (3.2%)
Heterosexuals	261 (36.2%)	9,299 (34.8%)
Adult Other	0 (0.0%)	44 (0.2%)
Adult risk not reported or identified	47 (6.5%)	913 (3.4%)
Mother with/at risk for HIV infection	1 (0.1%)	389 (1.5%)
Pediatric Other/Not reported or identified	0 (0.0%)	27 (0.1%)

Deaths

Within the Philadelphia Eligible Metropolitan Area, deaths among people with HIV/AIDS have been on the decline. This is true for both deaths by any cause among people with HIV and deaths attributed to HIV-related illness. The line graph below shows the decline in deaths for Philadelphia only because data are limited in the suburban counties.

As seen below, all deaths among people with HIV/AIDS and deaths due to HIV disease in Philadelphia have declined from 2008 to 2016.^{10 11} Deaths attributed to HIV disease in Philadelphia peaked in 1995, when there were 652 deaths. There were 77 deaths attributed to HIV-related illness in 2016.

HIV Deaths in Philadelphia, 2008 - 2016



¹⁰ Centers for Disease Control and Prevention, National Center for Health Statistics (2018). Underlying Cause of Death 1999-2014 on CDC WONDER Online Database [Data]. Data are from the Multiple Cause of Death Files, 1999-2016, as compiled from data provided by the 57 vital statistics jurisdictions through the Vital Statistics Cooperative Program. Retrieved from <http://wonder.cdc.gov/ucd-icd10.html>.

¹¹ Centers for Disease Control and Prevention, National Center for Health Statistics (2018). Compressed Mortality File 1979-1998. CDC WONDER Online Database, compiled from Compressed Mortality File CMF 1968-1988, Series 20, No. 2A, 2000 and CMF 1989-1998, Series 20, No. 2E, 2003 [Data]. Retrieved from <http://wonder.cdc.gov/cmfi-icd9.html>.

Emerging Populations: New HIV Cases versus Prevalence

The epidemic in the nine-county Philadelphia EMA is complex and has changed over time. There are a significant number of long-term survivors who have been living with HIV for 10, 15, 20+ years, and the populations that are acquiring HIV have shifted over time. Consequently, the people who are currently living with HIV/AIDS within the nine-county area are demographically very different from the people who are just being diagnosed with HIV/AIDS. 20.2% of PLWH in the EMA likely were exposed to HIV through injection drug use, but only 6% of new HIV (not AIDS) diagnoses were among people who inject drugs in 2016. This decrease in new cases among people who inject drugs is commonly attributed to Philadelphia's syringe exchange program. Meanwhile, people aged 13 - 24 make up only 3% of total people living with HIV/AIDS in the EMA, but represented 24.5% of new HIV (not AIDS) diagnoses in 2016. This demonstrates an emerging population for new HIV infections. Still, 51.7% of PLWH in the EMA are 50-plus, indicating that there is a significant aging population among people who are already HIV-positive. These differences indicate that different strategies may be needed for people who are linking to HIV care for the first time and those who the system is attempting to retain in care.

Special Populations

The target populations provided in the National HIV/AIDS Strategy are helpful in identifying those people most at risk of acquiring HIV or being loosely engaged in HIV care.¹² However, the Philadelphia EMA's diversity means that the target populations represent the majority of the EMA's general population. For example, combined population estimates for Black women and men, Latino men and women, and youth 13 – 24 total over 2 million EMA residents. Within the City of Philadelphia, Black women and men make up 42% of the population, and Latino men and women make up 14% of the population. These two target populations alone comprise 55% of the city's 1.56 million inhabitants. Therefore, while each National HIV/AIDS Strategy population is addressed through Philadelphia EMA goals (with the exception of people in the Southern United States), some of the populations have been stratified.

Gay, Bisexual, and Other Men Who Have Sex with Men of All Races and Ethnicities

PDPH estimates that 5% of men in Philadelphia are gay, bisexual, or other men who have sex with men (MSM). Yet, MSM make up over one-third (36.7%) of people living with HIV/AIDS within the Philadelphia EMA. In 2016, over one-third (38.7%) of new AIDS cases were among MSM, and over half (52.2%) of new HIV (non-AIDS) cases were among MSM in Philadelphia. This indicates that MSM are a significant at-risk population. Philadelphia surveillance data from 2014 suggests that 33.1% of the entire Black MSM population is living with HIV/AIDS and aware of their status. Incidence remains high among MSM of color aged 18 – 24. In 2015, this subpopulation accounted for 15.4% of all newly-diagnosed HIV (regardless of AIDS status) in Philadelphia. In Philadelphia's National HIV Behavioral Surveillance (NHBS) project, 27.5% of MSM tested positive for HIV. PDPH estimates that 10.7% of HIV-positive MSM are not aware of their status.

¹² The White House, Office of National AIDS Policy (2015). *National HIV/AIDS Strategy for the United States: Updated to 2020*. Retrieved from <https://www.aids.gov/federal-resources/national-hiv-aids-strategy/nhas-update.pdf>.

Black Women and Men

Black women and men make up 20% of the EMA-wide population but 58% of people living with HIV/AIDS in the Philadelphia EMA. In every part of the EMA, the percentage of new HIV infections among Blacks is significantly higher than the percentage of Blacks in the general population. In 2016, 61% of all new HIV (not AIDS) diagnoses in Philadelphia were among Blacks.

Latino Men and Women

Latino men and women make up 9% of the EMA-wide population but 15% of people living with HIV/AIDS within the EMA. In Philadelphia, 17% of new HIV (not AIDS) diagnoses were among Latinos in 2016.

People Who Inject Drugs

While injection drug use was a leading exposure category early in the HIV/AIDS epidemic, new infections through injection drug use have declined considerably. 20% of people living with HIV/AIDS in the Philadelphia EMA were exposed to HIV through injection drug use, but only 6% of new HIV (not AIDS) diagnoses in 2016 occurred among people who inject drugs. According to Philadelphia's National HIV Behavioral Surveillance (NHBS) project, over two-thirds of all people who inject drugs in Philadelphia access syringe supplies through the locally-funded syringe exchange program. This program is widely attributed as the cause of declining HIV infections among people who inject drugs. In addition to syringe exchange, this program provides harm reduction services like on-site HIV counseling and testing and referral to medical care. Furthermore, the NHBS project demonstrated that people who accessed the syringe exchange program had much higher rates of HIV testing than the general population of people who inject drugs (over 90%).

Youth Aged 13 – 24

Youth aged 15 – 24 make up about 15% of people living in the nine-county EMA.¹³ Yet, a disproportionate number of new HIV diagnoses have been among youth in recent years. In 2016, 26.8% of new HIV (not AIDS) diagnoses in Philadelphia were among youth aged 13 – 24. This figure was 15.6% in the PA counties and 22.6% in the New Jersey counties.

Transgender Women

Data on transgender women in the general population is very limited. In 2016, the Williams Institute estimated that 0.6% (about 1.4 million) of adults in the United States were transgender, based on survey data.¹⁴ In 2015, the Census Bureau more conservatively identified 89,667 transgender individuals who were alive in 2010, based on official name and sex changes in Social Security Administration records.¹⁵

¹³ U.S. Census Bureau (2018). S0101 Age and Sex [Data]. *2012-2016 American Community Survey 5-Year Estimates*. Retrieved from <http://factfinder.census.gov/>. The differences in age group between the section header and this sentence is not an error, but reflective of data reporting differences.

¹⁴ Flores, A.R., Herman, J.L., Gates, G.J., Brown, T.N.T. (2016). *How many adults identify as transgender in the United States?* The Williams Institute. Retrieved from <http://williamsinstitute.law.ucla.edu/wp-content/uploads/How-Many-Adults-Identify-as-Transgender-in-the-United-States.pdf>

¹⁵ Harris, Benjamin Cerf (2015). *Likely Transgender Individuals in U.S. Federal Administrative Records and the 2010 Census*. U.S. Census Bureau. Retrieved from http://www.census.gov/srd/carra/15_03_Likely_Transgender_Individuals_in_ARs_and_2010Census.pdf.

Assuming that the more inclusive William Institute estimate similarly applies to the Philadelphia EMA, we can crudely estimate that there may be 32,361 people who are transgender in the EMA.

There is information available about transgender women living with HIV/AIDS in Philadelphia, although transgender data is not available for the surrounding counties. Surveillance data on transgender persons is not uniformly collected by testing or medical providers. In addition, some transgender people may not identify as transgender or may be gender non-conforming. Philadelphia HIV surveillance data did not have the capacity to collect current gender until 2009 (only sex at birth was captured prior to this). This has resulted in incomplete reporting of transgender persons living with HIV in Philadelphia. Improving this data is a high priority for the PDPH. The 2016 HIV Care Continuum was based on 291 transgender persons living with HIV in Philadelphia. Of these, 85.8% were in care, 69.5% were retained in care, and 65.2% were virally suppressed. 70% of people of transgender experience diagnosed with HIV in 2016 were linked to care.

Pregnant Women

Prenatal care is a particular challenge in Philadelphia, where an average of 31% of mothers do not receive adequate prenatal care. According to PDPH data, 3% of HIV-positive women of childbearing age in the EMA become pregnant and deliver a baby each year. After extensive analysis, PDPH found that 25% of HIV-positive women who gave birth between 2005 and 2013 received their HIV diagnosis during pregnancy. Of these women, only 39% received adequate prenatal care during pregnancy, and 52% had achieved viral suppression at the time of delivery. This indicates an even lower receipt of appropriate prenatal care than seen in the general population (69%).

d. Indicators of HIV Risk

Mental Health

According to the 2014 – 2016 National Survey on Drug Use and Health (NSDUH), 4.04% of Philadelphians had a serious mental illness in the year before the survey, while 20.40% had any mental illness diagnosis during that time.¹⁶ These figures were 3.24% and 16.71% in Southeastern Pennsylvania, and 4.09% and 17.40% in Southern New Jersey. Furthermore, the NSDUH estimated that 7.31% of Philadelphians, 6.02% of Southeastern Pennsylvanians, and 7.01% of Southern New Jerseyans had a major depressive incident in the previous year.

Among people with HIV/AIDS, mental illness diagnoses were more common than in the general population. The 2009 – 2010 Medical Monitoring Project in Philadelphia found that 49% of people with HIV/AIDS had a mental health diagnosis. This indicates that approximately 13,108 people with HIV/AIDS in the Philadelphia EMA may have some form of mental illness.

¹⁶ United States Department of Health and Human Services. Substance Abuse and Mental Health Services Administration (2014 – 2016). 2014 – 2016 National Survey on Drug Use and Health substate estimates. Retrieved from <https://www.samhsa.gov/data/nsduh/2014-2016-substate-reports>.

Substance Use

The 2014 – 2016 National Survey on Drug Use and Health estimated that 7.15% of Philadelphians had alcohol use disorder in the year before the survey, as compared with 5.87% of Southeastern Pennsylvanians and 5.85% of people in Southern New Jersey.

In Philadelphia, the 2014 - 2016 NSDUH estimated that 0.86% of residents used heroin in the year before the survey. In the surrounding PA counties, 0.43% of residents were estimated to have used heroin in the past year, while 0.68% of residents in Southern New Jersey (a NSDUH region that includes the four EMA counties as well as three other counties) were estimated to have used heroin in the past year.

According to the 2014 Treatment Episode Data Set - Admissions (TEDS-A), 87% of people in the Philadelphia area who were in rehabilitation programs for injecting drugs were White.¹⁷ Among all Whites and Hispanics in rehabilitation programs, heroin was the most common primary substance, followed by alcohol. Among Blacks, the most common primary substance was marijuana, followed by alcohol.

The January 1, 2016 Morbidity and Mortality Weekly Report cited reports that there had been a sharp increase in seizures of fentanyl in Philadelphia, which has previously been associated with increased overdose deaths.¹⁸ In 2016, Pennsylvania experienced 4,762 drug-induced deaths, compared to 2,829 in 2014. In 2014, New Jersey had 1,303 drug-induced deaths; this rose to 2,132 in 2016. Overdose death rates by county in the EMA ranged from 23.0 per 100,000 in Chester County to 47.9 per 100,000 in Philadelphia in 2016.¹⁹ The City of Philadelphia formed The Mayor’s Task Force to Combat the Opioid Epidemic in November 2016.²⁰ Further discussion on this group will appear in future updates to this document.

Pennsylvania law changed to allow emergency responders to carry naloxone for the purposes of overdose reversal in November 2014. In 2016, police in Southeastern Pennsylvania reported successfully administering naloxone 728 times. Of these, 304 were in Delaware County, 147 were in Montgomery County, 127 were in Bucks County, 93 were in Chester County, and 57 were in Philadelphia County.²¹

¹⁷ United States Department of Health and Human Services. Substance Abuse and Mental Health Services Administration. Center for Behavioral Health Statistics and Quality (2014). Treatment Episode Data Set -- Admissions (TEDS-A).

<https://www.datafiles.samhsa.gov/study-dataset/treatment-episode-data-set-admissions-2014-teds-2014-ds0001-nid16950>

¹⁸ R.A. Rudd, N. Aleshire, J.E. Zibbell, & R.M. Gladden (2016). Increases in Drug and Opioid Overdose Deaths – United States, 2000 -2014. *Morbidity and Mortality Weekly Report*, 64(50 – 51), 1378 – 1382. Retrieved from <http://www.cdc.gov/mmwr/pdf/wk/mm6450.pdf>.

¹⁹ Centers for Disease Control and Prevention, National Center for Health Statistics (2015). Underlying Cause of Death 1999-2014 on CDC WONDER Online Database [Data]. Data are from the Multiple Cause of Death Files, 1999-2014, as compiled from data provided by the 57 vital statistics jurisdictions through the Vital Statistics Cooperative Program. Retrieved from <http://wonder.cdc.gov/ucd-icd10.html>.

²⁰ City of Philadelphia (2015, November 22). Mayor Addresses Opioid Crisis in Philadelphia. Retrieved from <https://www.phila.gov/press-releases/mayor/mayor-addresses-opioid-crisis-in-philadelphia/>.

²¹ Commonwealth of Pennsylvania (2018). Successful Naloxone Reversals by Law Enforcement Years 2014 - 2018 Drug and Alcohol Programs [Data]. Retrieved from <https://data.pa.gov/Opioid-Related/Successful-Naloxone-Reversals-by-Law-Enforcement-Y/jeh5-c3pf>.

A significant number of opioid overdoses have also been reversed in the New Jersey counties. There, naloxone administration data for 2016 is available for all emergency responders, including both EMS and police.²² In the four counties, emergency responders administered naloxone 2,418 times in 2016. Of those, 1,093 were in Camden County, 653 were in Burlington County, 574 were in Gloucester County, and 98 were in Salem County.

Some types of substance use appear to be more prevalent among the EMA's PLWH than the general population. Data from the 2013 Medical Monitoring Project in Philadelphia showed that 14.2% of people with HIV/AIDS who were accessing care binge drank. However, 24.2% of MMP participants used illicit substances in the previous twelve months. In addition, 10.7% of people with HIV/AIDS reported currently using substances during their PDPH's Client Services Unit intake.

Sexual Behaviors

Among adults in eight of the nine counties in the Philadelphia EMA (excluding Salem County), 93 of 1,899 Behavioral Risk Factor Surveillance Survey respondents in 2016 reported engaging in "risky behavior" in the year before the survey.²³ Risky behavior was defined as any of the following: intravenous drug use, sexually transmitted disease treatment, exchange of sex for money or drugs, or anal sex without a condom in the previous year. These behaviors were reported most frequently among 18 – 24 year olds among males, and 25 – 34 year olds among females.

In Philadelphia, 37.2% of high school students surveyed in 2015 reported having sex in the past three months, and 44.1% of sexually active students did not use a condom at their last encounter.²⁴ Of all students, 19.4% reported having had at least 4 partners during their lives.

Teen Pregnancies

In 2016, there were 6,449 births to teen mothers in Pennsylvania and 2,373 births to teen mothers in New Jersey.²⁵ There were an estimated 2,898 births to 15 – 19-year-old mothers in the Philadelphia EMA in 2016, a considerable decline from the estimated 4,302 births to teen mothers in the EMA in 2009.

Prenatal Care

Within Philadelphia, an average of 26.9% of pregnant mothers of received inadequate²⁶ prenatal care in 2015.²⁷ From 2013 – 2015, 34.5% of Black mothers and 31% of Hispanic mothers in Philadelphia

²² Serrano, Ken (2018, February 14). Back from the dead: NJ opioid antidote naloxone use nearly triples since 2014. *Asbury Park Press*. Retrieved from <https://www.app.com/story/news/investigations/heroin-jersey-shore/2018/02/14/naloxone-opioid-antidote-new-jersey-narcan-use-triples/335066002/>.

²³ Centers for Disease Control and Prevention (2016). Behavioral Risk Factor Surveillance System Survey Data [Data]. Atlanta, Georgia: U.S. Department of Health and Human Services, Centers for Disease Control and Prevention. Retrieved from https://www.cdc.gov/brfss/annual_data/annual_2016.html.

²⁴ Centers for Disease Control and Prevention (2015). 1991-2015 High School Youth Risk Behavior Survey Data [Data]. Atlanta, Georgia: U.S. Department of Health and Human Services, Centers for Disease Control and Prevention. Retrieved from <http://nccd.cdc.gov/youthonline/>.

²⁵ U.S. Census Bureau (2016). B13002 Women 15 to 50 Years Who Had a Birth in the Past 12 Months by Marital Status and Age [Data]. *2012-2016 American Community Survey 5-Year Estimates*. Retrieved from <http://factfinder.census.gov/>.

²⁶ Inadequate care was defined as a mother receiving less than half of recommended prenatal visits.

²⁷ National Center for Health Statistics (2015). Final natality data [Data]. Retrieved from <http://www.marchofdimes.org/peristats>.

received inadequate prenatal care. When broken out by age, 42.2% of mothers under the age of 20 received inadequate prenatal care. For the entire state of Pennsylvania, 28.5% of all mothers received inadequate prenatal care, compared with 28.3% among mothers under the age of 20, 28.5% among Black mothers, and 25.2% among Hispanic mothers. Data on prenatal care in New Jersey was not available.

Sexually Transmitted Infections

In Philadelphia, recent data on sexually transmitted infections indicate that they are once again on the rise. From 2012 to 2016, cases of syphilis (all stages) were on the rise, from 798 cases to 1,089.²⁸ Cases of gonorrhea declined from 2012 to 2014, hitting a low of 5,961; however, gonorrhea has also been on the rise again, and 2014 saw 6,967 cases.²⁹ This trend has also been seen in chlamydia: cases of chlamydia decreased from 2012 to 2014, when they reached a low at 18,935, but have since increased to 19,992 in 2016.³⁰

In the suburban Pennsylvania counties, cases of chlamydia, gonorrhea, and primary and secondary syphilis were all higher than their 2012 levels in 2016.³¹ Across the four counties, chlamydia cases increased from 6,583 in 2012 to 8,245 in 2016. Gonorrhea cases increased from 1,364 to 1,644 over that time, and primary and secondary syphilis cases increased from 28 to 108.

Trends in sexually transmitted infections vary among the New Jersey counties. As a region, gonorrhea cases in 2016 were comparable to 2012 levels. There were 1,770 cases of gonorrhea in 2012, compared to 1,847 cases in 2016.³² However, both chlamydia and syphilis were on the rise over the five-year period. In 2012, there were 112 cases of primary, secondary, early latent, and late latent syphilis combined; in 2016, there were 161 cases. There were 5,057 chlamydia cases in the New Jersey region in 2012, and 6,309 in 2016.

Incarceration

According to a Pew Charitable Trust report as of 2010, Philadelphia had the highest rate of incarceration of any of the ten major cities in the United States.³³ The prison population in Philadelphia rose from 1999 through 2008, and began to decline in 2009. The Pew report partially attributed this decline to a decrease in arrests and partially to a new state policy that moved many inmates from the Philadelphia

²⁸ Philadelphia Department of Public Health, STD Control (2017). Reported Cases of Syphilis (All Stages) [Data]. Retrieved from https://hip.phila.gov/Portals/_default/HIP/DataReports/Syphilis/UPDATE_Syphilis_ReportedSyphCaseCountsGenderAge_1990_2016.pdf.

²⁹ Philadelphia Department of Public Health, STD Control (2017). Reported Cases of Gonorrhea [Data]. Retrieved from https://hip.phila.gov/Portals/_default/HIP/DataReports/Gonorrhea/Gonorrhea_ReportedGCCaseCountsGenderAndAge_1990_2016.pdf

³⁰ Philadelphia Department of Public Health, STD Control (2017). Reported Cases of Chlamydia [Data]. Retrieved from https://hip.phila.gov/Portals/_default/HIP/DataReports/Chlamydia/Chlamydia_ReportedCTCaseCountsGenderAndAge_1990_2016.pdf

³¹ Pennsylvania Department of Health, Bureau of Communicable Diseases (2018). Sexually Transmitted Disease [Data]. Retrieved from <https://www.phaim.health.pa.gov/EDD/Default.aspx>.

³² New Jersey Department of Health, Division of HIV, STD, and TB Services (2017). 2016 County STD Morbidity [Data]. Retrieved from <https://www.nj.gov/health/hivstdtb/documents/stats/std/2016%20BY%20COUNTY.pdf>.

³³ The Pew Charitable Trust, Philadelphia Research Initiative. (2016). *Philadelphia's Crowded, Costly Jails: The Search for Safe Solutions* (pp. 2-5). Retrieved from http://www.pewtrusts.org/~media/assets/2010/05/17/philadelphias_crowded_costly_jails_rev.pdf

Prison System to the state system. In addition, the City of Philadelphia decriminalized the possession of small amounts of marijuana in October 2014. When comparing year-long arrest data (removing 2014, since the policy changed partway through the year), this led to an 85.8% decrease in marijuana possession arrests from 2013 to 2016.³⁴

Recent data on incarcerated populations is limited, however, and often only available at the state level. As of 2016, there were 85,720 incarcerated persons in Pennsylvania, with a prison incarceration rate of 383 per 100,000 and a jail incarceration rate of 360 per 100,000.³⁵ In New Jersey, 35,021 persons were incarcerated, with a prison incarceration rate of 221 per 100,000 and a jail incarceration rate of 220 per 100,000. There was a daily average of 7,400 inmates in 2016, a decrease from 8,801 in 2012.³⁶ In addition, a local study found that 3.5% of men within the Philadelphia Prison System were HIV-positive, and this rate was even higher among women. A PDPH estimate indicated that about 2,739 people living with HIV were released back into the EMA from county, state, and federal prisons annually. In the first six months of 2015, 10.1% of medical case management intakes reported incarceration within the previous twelve months.

Housing

Rent (and rent as a proportion of income) varies across the Philadelphia EMA. In 2016, median income for Philadelphia renters was \$28,463, while median rent was \$943 per month.³⁷ For Philadelphia renters who earned less than \$20,000 in the past 12 months, rent alone accounted for 31.9% of household income. By county within the rest of the EMA, this figure ranges from 16.3% – 31%. However, housing as a percentage of median income is even more expensive in the cities of Chester and Camden than in Philadelphia. For households with an income of less than \$20,000 per year, rent was 44.9% of income in Camden city and 43.9% in Chester city. These figures demonstrate that there are variations in access to affordable housing throughout the EMA, but housing is particularly unaffordable in cities.

From 2012 to 2016, homelessness increased by 4.1% in Pennsylvania and decreased by 31.7% in New Jersey.³⁸ By contrast, homelessness decreased by 11.5% nationally. Unsheltered homelessness increased in Pennsylvania, rising by 55.7% from 2012 to 2016. In New Jersey, unsheltered homelessness decreased by 10.2%. National unsheltered homelessness figures decreased by 17.2%.

Philadelphia's Office of Homeless Services has a Continuum of Care Board that addresses homelessness in a number of populations, including people with HIV/AIDS. Their January 2017 Point in Time count

³⁴ Pennsylvania State Police, Pennsylvania Uniform Crime Reporting System (2018). 18F – Drug Possession – Marijuana [Data]. Retrieved from <http://ucr.psp.state.pa.us/UCR/Reporting/Query/Summary/QuerySumArrestUI.asp>.

³⁵ U.S. Bureau of Justice Statistics (2016). State Imprisonment Rate [Data]. Retrieved from <http://www.sentencingproject.org/the-facts/>.

³⁶ The Pew Charitable Trusts (2017). Philadelphia 2017: The State of the City, p. 32 [Data]. Retrieved from https://www.pewtrusts.org/-/media/assets/2017/04/pri_philadelphia_2017_state_of_the_city.pdf.

³⁷ U.S. Census Bureau (2018). S2503 Financial Characteristics [Data]. 2012-2016 American Community Survey 5-Year Estimates. Retrieved from <http://factfinder.census.gov/>.

³⁸ National Alliance to End Homelessness (2017). *State of Homelessness in America*. Retrieved from <https://endhomelessness.org/homelessness-in-america/homelessness-statistics/state-of-homelessness-report/>.

identified 5,693 homeless persons in Philadelphia on a given night.³⁹ Of these, 159 were people known to be living with HIV/AIDS; 108 of these homeless PLWH were sheltered on the night of the count.

³⁹ City of Philadelphia, Office of Homeless Services (2017). Philadelphia Continuum of Care 2017 Point in Time Summary [Data]. Retrieved from <http://philadelphiaofficeofhomelesservices.org/wp-content/uploads/2016/12/pit-count-report-sept-28-2017.pdf>.