



PrEP Measurement in NYS

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Governor Andrew Cuomo announcing his new initiative to combat the AIDS epidemic before the 2014 NYC Gay Pride Parade.

Credit: Michael Appleton for The New York Times

Defining the End of AIDS

Goal

Reduce from 3,000 to 750 new HIV infections per year by the end of 2020.

Three Point Plan

1. Identify all persons with HIV who remain undiagnosed and link them to health care.
2. Link and retain those with HIV in health care, to treat them with anti-HIV therapy to maximize virus suppression so they remain healthy and prevent further transmission.
3. Provide Pre-Exposure Prophylaxis for persons who engage in high risk behaviors to keep them HIV negative.

Blueprint Recommendations for PrEP and PEP

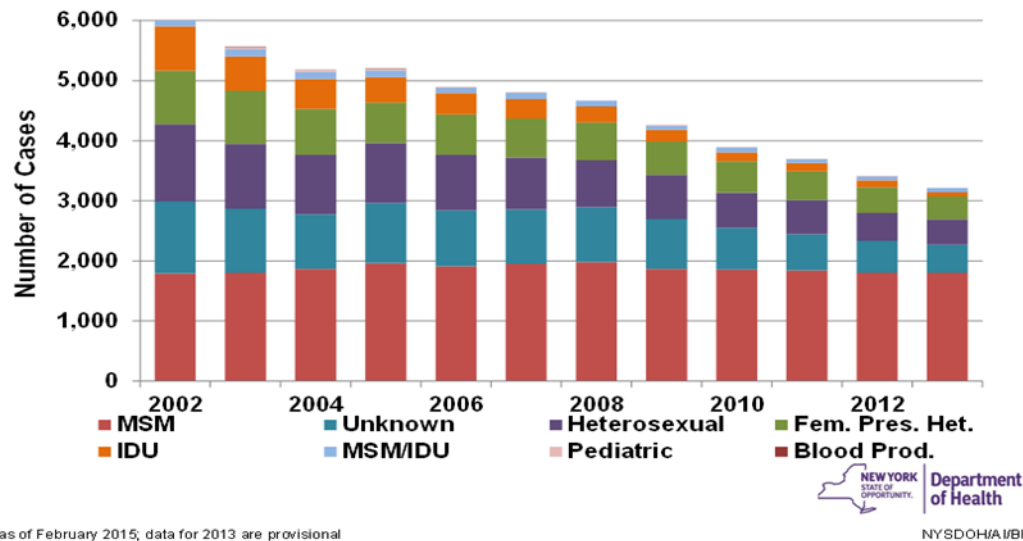
3. Provide access to PrEP for persons who engage in high-risk behaviors to keep them HIV-negative.

- ❖ **BP11:** Undertake a statewide education campaign on PrEP and nPEP
- ❖ **BP12:** Include a variety of statewide programs for distribution and increased access to PrEP and nPEP
- ❖ **BP13:** Create a coordinated statewide mechanism for persons to access PrEP and nPEP and prevention-focused care
- ❖ **BP14:** Develop mechanisms to determine PrEP and nPEP usage and adherence statewide



Key Populations

Newly Diagnosed HIV Cases by Year of Diagnosis and Transmission Risk, New York State, 2002-2013*



The Task Force ensured that prioritizing the needs of key populations significantly impacted by HIV and AIDS became a central component of the final ETE Blueprint document.

PrEP Measurement

- PrEP Use
- Size of Population in Need of PrEP
- PrEP Quality Metrics

Measuring PrEP Use

- Medicaid
- PrEP- Assistance Program (PrEP-AP)
- Targeted PrEP Implementation Program (TPIP)
- AIDS Institute Reporting System (AIRS)
- National HIV Behavioral Surveillance (NHBS)
- Partner Services
- Other (MarketScan / Gilead / RHIOs)



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Vital Signs: Increased Medicaid Prescriptions for Preexposure Prophylaxis Against HIV infection — New York, 2012–2015

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Abstract

Background: Approximately 3,000 incident cases of human immunodeficiency virus (HIV) infection occur in New York state each year. Daily HIV preexposure prophylaxis (PrEP) with the oral antiretroviral medication Truvada is a key component of New York's plan to end HIV/acquired immunodeficiency syndrome (AIDS) as an epidemic in the state by 2020.

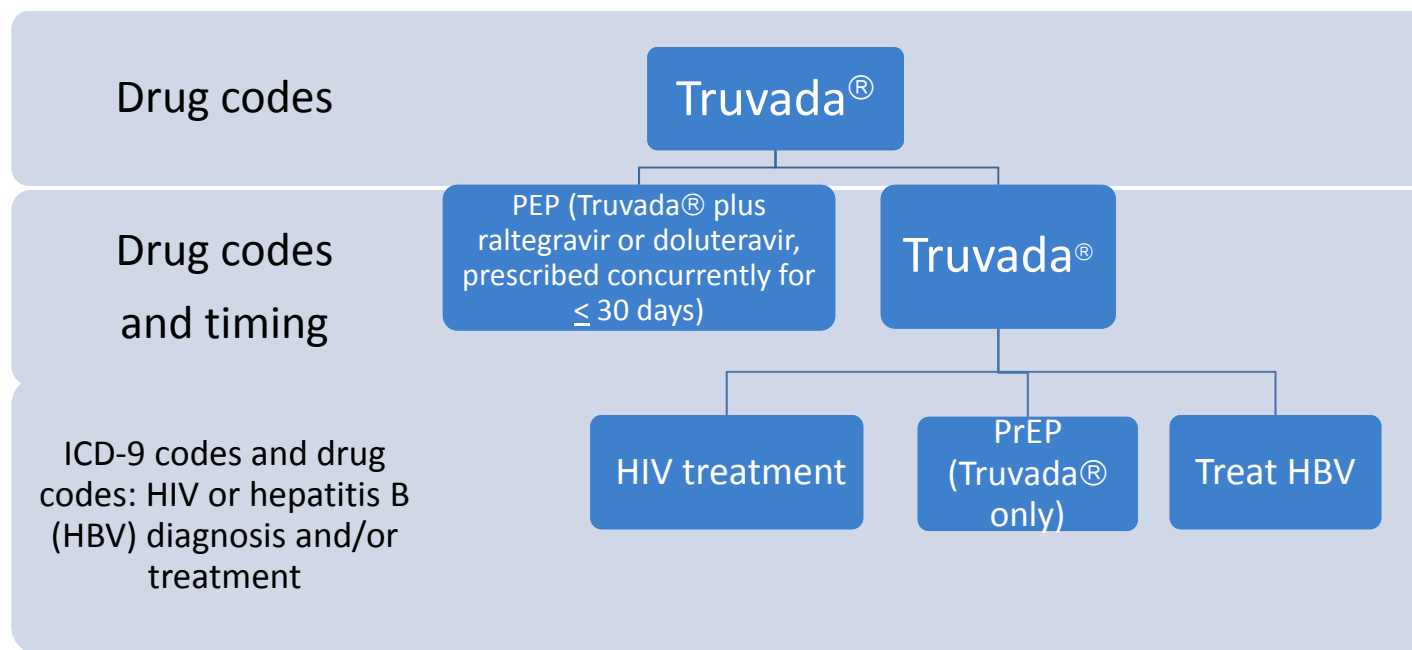
Methods: Prescription data from the New York state Medicaid program from July 2012 through June 2015 were analyzed with an algorithm using medication and diagnoses codes to identify continuous use of Truvada for >30 days, after excluding use for postexposure prophylaxis or treatment of HIV or chronic hepatitis B infection.

Results: During July 2012–June 2013, a total of 259 persons filled prescriptions for PrEP in the Medicaid program. During July 2013–June 2014, a total of 303 persons filled prescriptions for PrEP. During July 2014–June 2015, a total of 1,330 persons filled prescriptions for PrEP, a substantial increase over the previous 12 months. Across all periods studied, 1,708 Medicaid recipients filled at least one prescription for PrEP, most of whom were New York City (NYC) residents, male, aged <50 years, and, for those with available data on race, white.

Conclusions: PrEP use by Medicaid-insured persons increased substantially in the years following statewide efforts to increase knowledge of PrEP among potential prescribers and candidates for PrEP. Other jurisdictions can follow New York state's example by taking similar steps to remove the financial and knowledge barriers experienced by both potential users and prescribers of PrEP.

Implications for Public Health Practice: Although both state and local health department efforts contribute to the availability and use of PrEP, their collaboration enhances the successful implementation of strategies to increase PrEP use. In addition, the decision by the state Medicaid agency to cover PrEP recognizes the long-term benefits of preventing HIV infections.

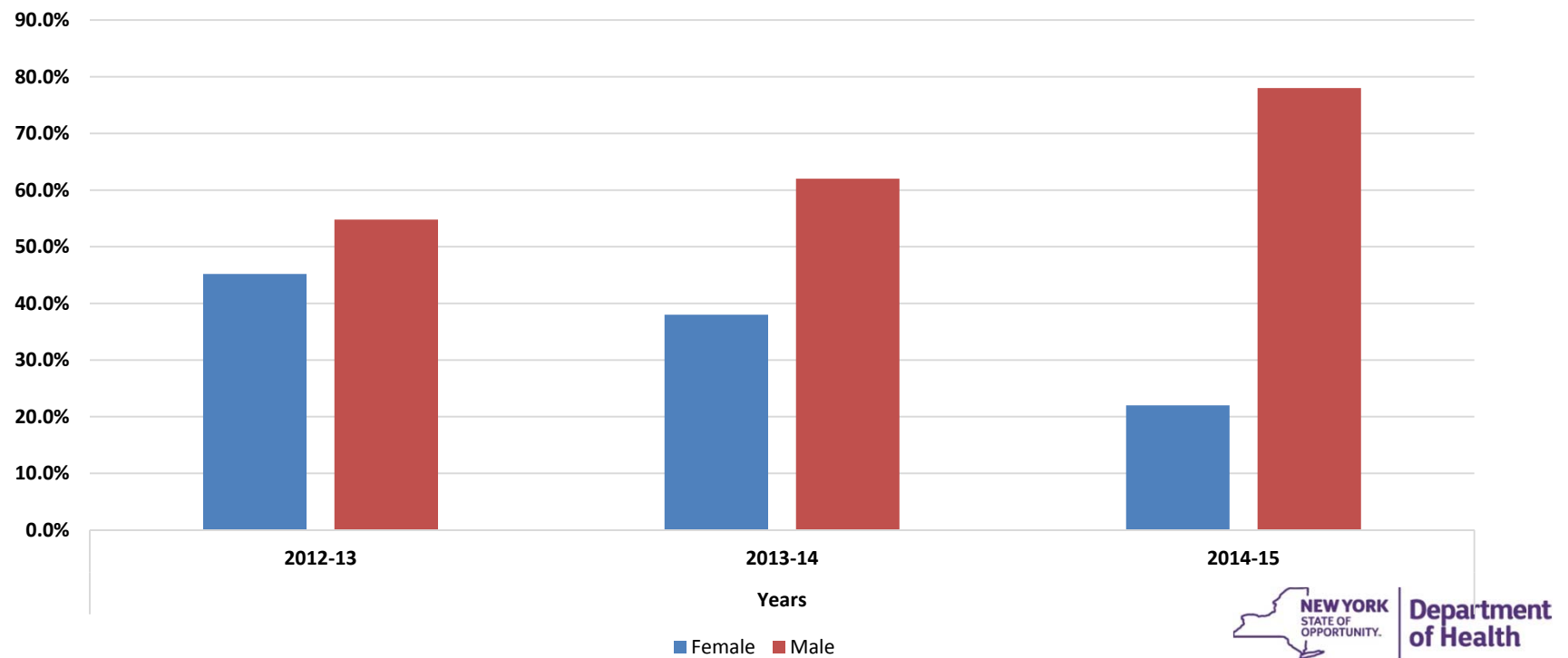
Coding algorithm for extracting Medicaid beneficiaries filling prescriptions for PrEP



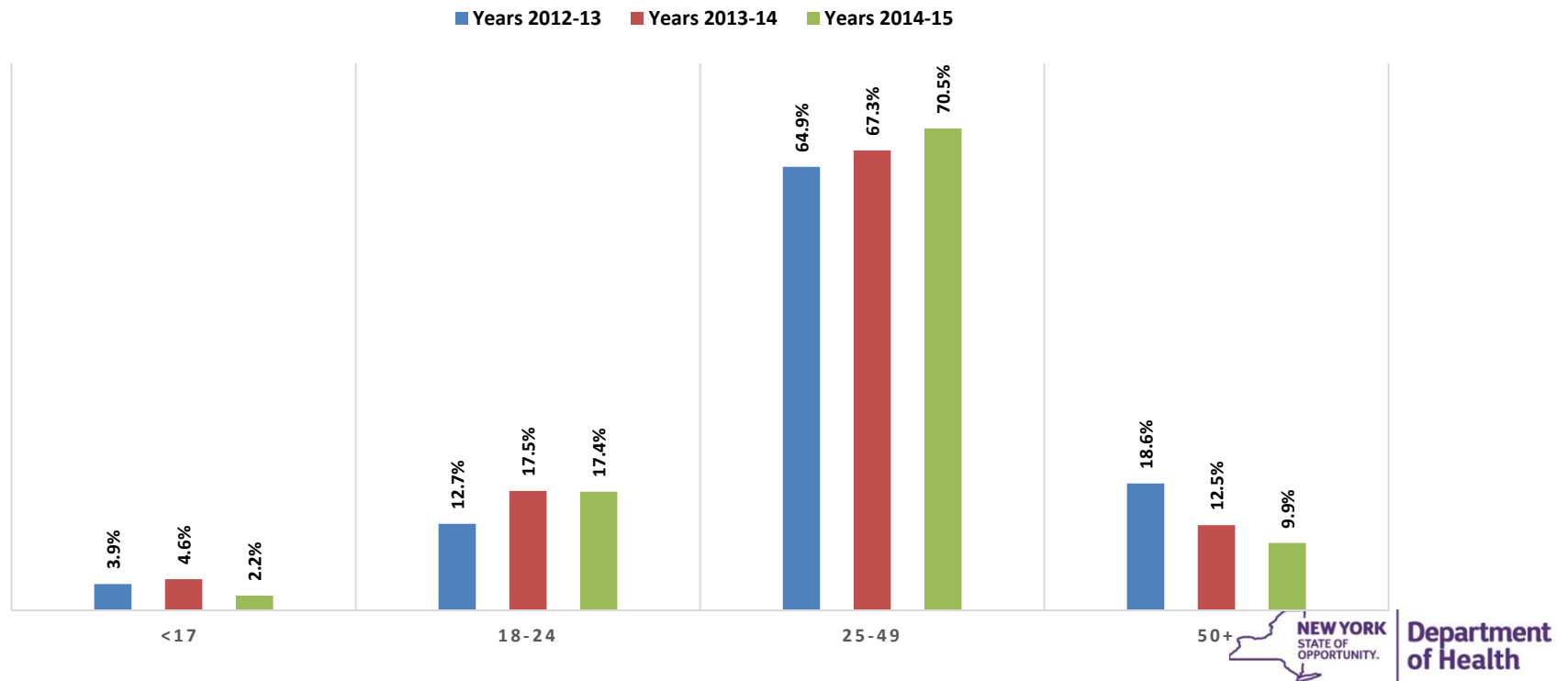
Prescriptions filled for PrEP by Medicaid recipients, 2012-2015

- July 1, 2012 – June 30, 2013
 - 259 recipients
- July 1, 2013 – June 30, 2014
 - 303 recipients (17.0% increase)
- July 1, 2014 – June 30, 2015
 - 1,330 recipients (338.9% increase)
- Across all periods
 - 1,708 recipients
 - 82.4% enrolled in Medicaid managed care plans
 - 80.7% reside in New York City

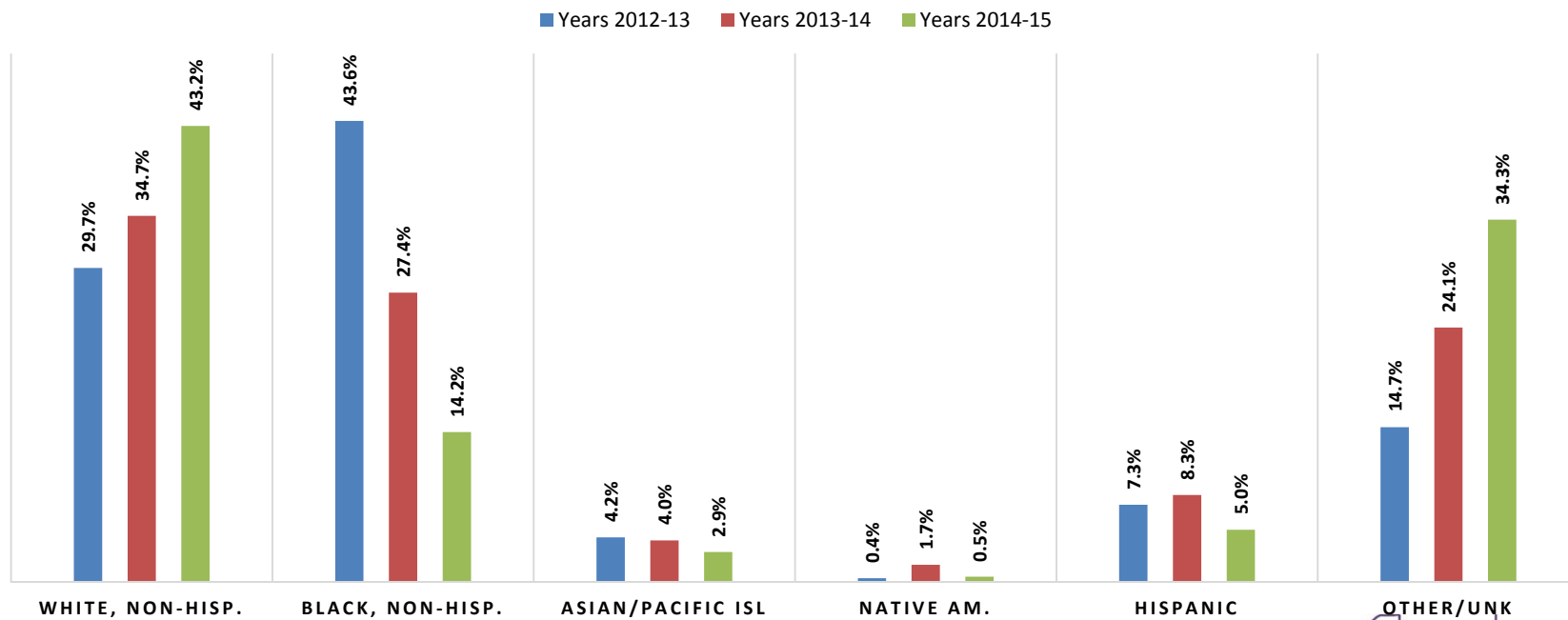
Prescriptions filled for PrEP by Medicaid recipients, by Gender



Prescriptions Filled for PrEP by Medicaid Recipients by Age



Prescriptions Filled for PrEP by Medicaid Recipients by Race/Ethnicity



Limitations of the Medicaid Data

- Based on administrative billing data
 - Data based comprised of procedure and diagnosis codes submitted for billing and payment purposes
- Data submitted contains:
 - Errors, such as poor compliance with accurate reporting of race/ethnicity
 - No indication of risk
- Included in count of recipients on PrEP if person fills at least one prescription, but may not necessarily be following the PrEP regimen

PrEP-Assistance Program

- The New York State Department of Health, AIDS Institute has created a Pre-Exposure Prophylaxis Assistance Program (PrEP-AP) modeled on and using the HIV Uninsured Care Programs (HUCP), primary care (ADAP Plus), operational systems and infrastructure.
- PrEP-AP will provide reimbursement for necessary primary care services for eligible individuals being seen by providers who are experienced in providing services to HIV-negative, high-risk, individuals.

PrEP-Assistance Program

- PrEP medication is provided to uninsured individuals through the manufacturer patient assistance program (PAP). Providers are responsible for assisting patients with the PAP application to receive Truvada as indicated for PrEP.
- Eligible providers are reimbursed for a specific set of services including but not limited to HIV testing, counseling, sexually transmitted disease testing and supportive primary care services, consistent with clinical guidelines.

PrEP-Assistance Program

- Since January, 2015 the program has received 360 applications for coverage. Uptake on enrollment continues as word of mouth spreads, requests from providers for in-service training are increasing.
- Provider Enrollment:
 - 85 providers with 148 sites
 - 57 labs

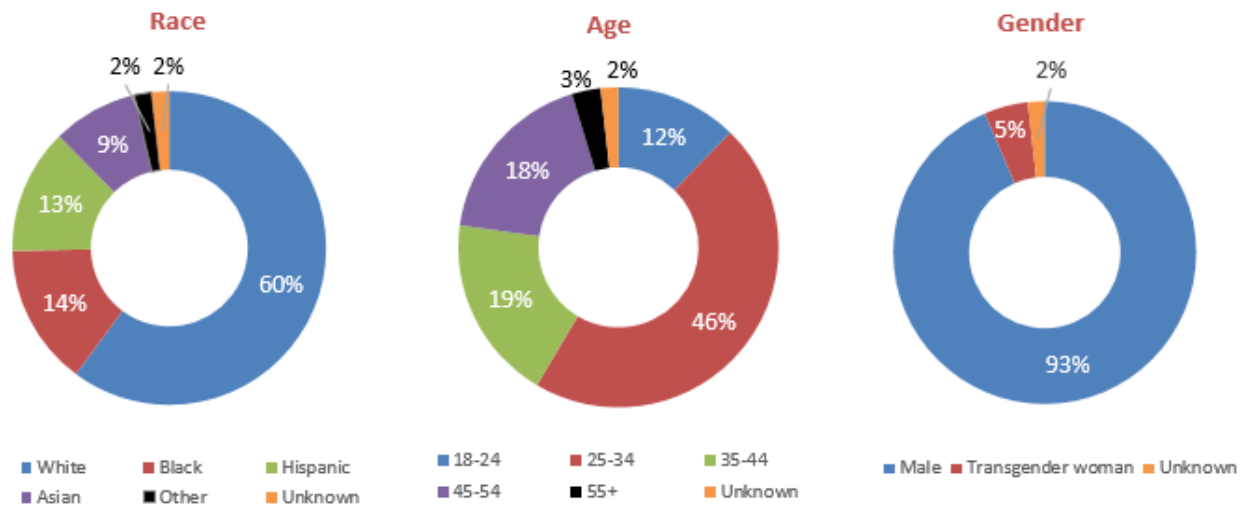
PrEP-Assistance Program

- PrEP-AP participant demographics (Data since January, 2015):
 - 78% are uninsured
 - 97% are male
 - 67% are 35 years of age or younger, with 15% younger than 25
 - 79% are from New York City, 21% Rest of State
 - 37% are White, 37% Latino, 11% African American and 8% Asian
 - 94% are single
 - 72% have incomes above 100% of the federal poverty level

Overview: Targeted PrEP Implementation Program (TPIP)

- Purpose: Evaluate PrEP implementation in “real world” settings
- Target Populations: Gay men, MSM, and transgender women
- Program: February 1, 2014 – July 31, 2015
- 5 agencies participated in TPIP’s data collection (3 in NYC and 2 in Rest of State
- **171 clients** enrolled in TPIP

Client Demographics (N=171)



Findings Reported from TPIP

- 82% of these clients stated they worried less about becoming HIV-positive since being on PrEP
- 94% of the clients said they would recommend PrEP to their friends
- 92% reported minimal to no side effects; those who had side effects said side effects diminished in the first few weeks of taking Truvada
- Most clients were adherent to PrEP
- STI lab data indicated there were few new positives
- 170 participants remained HIV-negative at the end of the program

*One individual was in the window period at initial testing and seroconverted during the first month

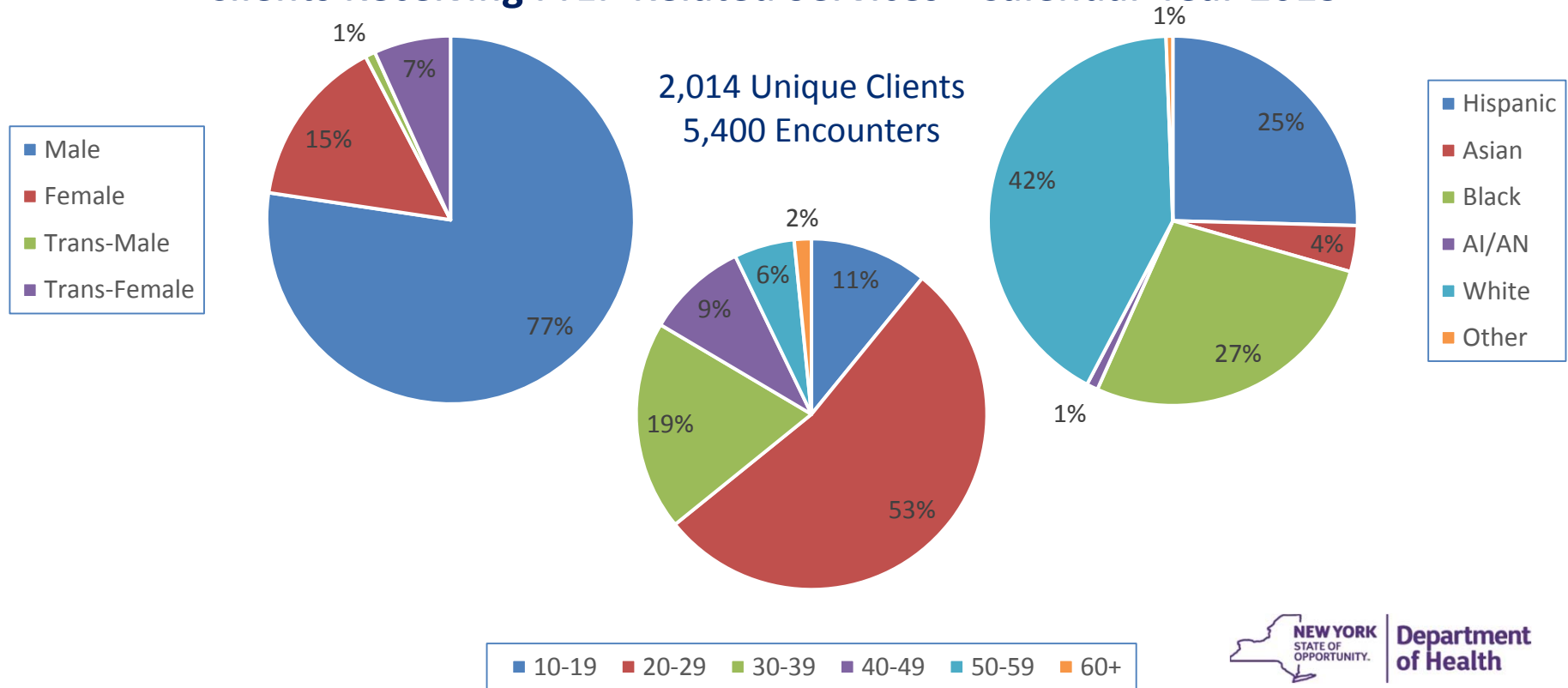


AIDS Institute Reporting System (AIRS)

- Collects client level data for all AI funded direct service contracts.
- PrEP specific services were added to the system in 2015.
- Prevention Contracts – Data will show PrEP assessment, PrEP referral, and linkage to PrEP and primary care.
- Health Care Contracts - Data will show PrEP related services, PrEP use, PrEP adherence, and reasons for PrEP discontinuation.
- Modifications will continue to be made as new PrEP contracts roll out and start using the system.

AIDS Institute Reporting System (AIRS)

Clients Receiving PrEP Related Services - Calendar Year 2015



National HIV Behavioral Surveillance (NHBS)

- The National HIV Behavioral Surveillance (NHBS) system is a Centers for Disease Control and Prevention (CDC)-sponsored, cross-sectional study of people at high risk for HIV in selected cities.
- In New York State, NHBS is conducted by the Bureau of HIV/AIDS Epidemiology (BHAEE) with a geographic focus in Nassau and Suffolk Counties (Long Island).
- Inclusion of PrEP related variables within the core questionnaire as well as more detailed PrEP questions added in the local use section.

Partner Services

- State and county partner services staff will begin documenting awareness, PrEP status and referrals for high risk HIV negative (or status unknown) males interviewed as part of Partner Services investigations.
- New questions are being added to the PS data system to capture information on PrEP awareness and utilization. Protocols for obtaining data are being developed.
- Partner Services data systems are being modified to capture PrEP information.

Other Data

- MarketScan
 - Commercial Claims and Encounters (CCE) Database is a medical and drug insurance claims database.
 - Includes drug / diagnosis data and medical / pharmacy insurance claims.
 - Contains inpatient admission records, outpatient services, prescription drugs, populations, eligibility status, and costs of services.
 - Contains approximately 138 million (since 1995) unique de-identified patients.
- Gilead
 - Access to prescription data for NYS.

Other Data

- Regional Health Information Organizations (RHIOs) - RHIOs are multi-stakeholder collaborations that enable the secure and interoperable exchange of health information.
- Statewide Health Information Network of New York (SHIN-NY) - The SHIN-NY is a “network of networks” that links New York’s nine regional RHIOs throughout the state.
- All RHIOS are live and exchanging data.

Measuring Size of Population

- Modeling the End of the Epidemic
- National HIV Behavioral Surveillance (NHBS)
- Behavioral Risk Factor Surveillance System

Measuring Size of Population

- **ETE Modeling Project**
- Project between AI and Rockefeller Institute of Government, SUNY.
- Building from the model previously developed for the 2012 HIV testing law evaluation.
- Project will help to analyze how demographic shifts and population specific outcomes will impact overall ETE related outcomes.
- Specifically, will consider how the use of PrEP will impact ETE outcomes.
- In order to do this, an estimate of those in need of PrEP, or at least those at high risk, will need to be developed.
- NYSDOH and NYCDOHMH staff participate in this project.

Measuring Size of Population

- **NHBS**
 - Utilize results from NYS and NYC samples to not only identify PrEP awareness and use, but also identify the population likely to benefit from PrEP.
- **BRFSS**
 - The BRFSS is an annual statewide telephone surveillance system designed by the Centers for Disease Control and Prevention (CDC).
 - BRFSS monitors modifiable risk behaviors and other factors contributing to the leading causes of morbidity and mortality in the population.
 - New York State's BRFSS sample represents the non-institutionalized adult household population, aged 18 years and older.
 - Information on risk behavior can help to identify the population likely to benefit from PrEP.
 - Potential to add local use questions specific to PrEP in future samples.

Proposed PrEP Quality Metrics

- PrEP Implementation Forum held on August 26th, 2015.
- Forum attended by health care providers, consumers, community stakeholders, and state and local health officials to discuss use of PrEP and PrEP care in NYS.
- Key recommendations, including proposed PrEP metrics, were developed and included in the PrEP Implementation Forum final report.

Proposed PrEP Quality Metrics



ETE Dashboard



- Key metrics will be systematically tracked at the state and local levels, with publicly available results.
- HIV prevention, HIV incidence, testing, new diagnoses and linkage, prevalence and care, AIDS diagnoses, and deaths compiled from various data sources and presented in one place.
- **ETEDASHBOARDNY.ORG**

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