Update on HIV and STI Epidemics in Los Angeles County

Leo Moore, MD, MSHPM
Acting Medical Director
Division of HIV and STD Programs
• No financial disclosures.
Presentation Overview

- Review of HIV/STD Epidemiology
- Review of the HIV care continuum
- How can you help?
HIV/STD Epidemiology
STD rates are rising nationally.
COMBINED DIAGNOSES OF CHLAMYDIA, GONORRHEA, AND SYPHILIS INCREASED SHARPLY OVER THE PAST FIVE YEARS

Source: Centers for Disease Control and Prevention
Factors affecting STD rates nationally and locally

- Financial challenges
- Low educational attainment
- Lack of client knowledge of STDs
- Poor interactions with health care systems due to racism, homophobia, transphobia, stigma
- Mental health and substance abuse
- Declining condom use overall, particularly in MSM

- Role of sexual networks within communities of color and MSM with increased STD prevalence
- Role of technology in expanding sexual networks
- Lack of appropriate screening and treatment by primary care providers
- Decreasing STD clinics and clinic hours
CDC STD Prevention Budget Decreases as Syphilis Cases Rise

Annual CDC - STD Prevention Budget
FY 2003 – FY 2018

40% decrease in purchasing power since 2003

Source: National Coalition of STD Directors
HIV/STD Cases and Rates (per 100,000) for LAC and Other Large Urban US Counties and Independent Cities, 2016

<table>
<thead>
<tr>
<th>County/Independent City</th>
<th>HIV² N(rate)</th>
<th>P&amp;S Syphilis³,⁴ N(rate)</th>
<th>Gonorrhea³ N(rate)</th>
<th>Chlamydia³ N(rate)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Los Angeles County, CA</td>
<td>1,845 (18.2)</td>
<td>1,814 (17.8)</td>
<td>22,376 (220)</td>
<td>59,116 (581.3)</td>
</tr>
<tr>
<td>Baltimore City, MD</td>
<td>531 (19)</td>
<td>197 (31.7)</td>
<td>3,534 (568.3)</td>
<td>7,394 (1,189)</td>
</tr>
<tr>
<td>Cook County, IL</td>
<td>1,125 (15.4)</td>
<td>1,018 (19.4)</td>
<td>13,608 (259.8)</td>
<td>41,056 (783.8)</td>
</tr>
<tr>
<td>Fulton County, GA</td>
<td>1,071 (29.4)</td>
<td>410 (40.6)</td>
<td>3,838 (379.8)</td>
<td>8,292 (820.5)</td>
</tr>
<tr>
<td>King County, WA</td>
<td>266 (9.1)</td>
<td>293 (13.8)</td>
<td>3,355 (158.5)</td>
<td>9,442 (445)</td>
</tr>
<tr>
<td>Miami-Dade County, FL</td>
<td>2,346 (38.7)</td>
<td>537 (19.9)</td>
<td>3,064 (113.8)</td>
<td>12,687 (47.1)</td>
</tr>
<tr>
<td>New York County, NY</td>
<td>2,707 (18.8)</td>
<td>719 (43.7)</td>
<td>6,329 (384.9)</td>
<td>15,216 (925.3)</td>
</tr>
<tr>
<td>Orleans Parish, LA</td>
<td>422 (33.3)</td>
<td>143 (36.7)</td>
<td>1,956 (502)</td>
<td>4,632 (1,188.9)</td>
</tr>
<tr>
<td>Orleans Parish, LA</td>
<td>N/A</td>
<td>287 (12.3)</td>
<td>2,808 (120)</td>
<td>12,904 (551.7)</td>
</tr>
<tr>
<td>San Francisco County, CA</td>
<td>315 (19.3)</td>
<td>522 (60.4)</td>
<td>5,278 (610.3)</td>
<td>8,175 (945.3)</td>
</tr>
</tbody>
</table>

1. Data are provisional due to reporting delay.
2. Data based on the 2016 CDC HIV Surveillance Report. Rate calculations may have been conducted at different points in time between jurisdictions. Queens County included in New York County number and rate.
3. Data for non-Los Angeles County areas are based on Tables 9, 20, and 33 of the CDC 2016 Sexually Transmitted Diseases Surveillance Report.
4. P&S syphilis includes all cases staged as primary and secondary.
5. Los Angeles County data for P&S syphilis, gonorrhea, and chlamydia excludes cases reported in the cities of Long Beach and Pasadena.

Source: LAC Division of HIV and STD Programs
Reported STD and HIV/AIDS Cases, Los Angeles County, 2016

A total of 88,781 STD and HIV/AIDS cases were reported in LAC in 2016:

- 65.9% Chlamydia (58,546)
- 24.9% Gonorrhea (22,069)
- 7.1% Syphilis (6,281)
- 2.1% HIV/AIDS (1,885)

1 2016 data are provisional due to reporting delay; may not total 100% due to rounding
Reported STD Cases, Los Angeles County, 2016¹ N=86,896

- Chlamydia 67.4% (n=58,546)
- Gonorrhea 25.4% (n=22,069)
- Syphilis 7.2% (n=6,281)

¹ 2016 data are provisional due to reporting delay.
Number of Reported Cases of Syphilis (all stages), Gonorrhea, and Chlamydia, Los Angeles County, 1998-2017¹

1. Does not include cases reported in the cities of Long Beach and Pasadena; total syphilis includes all cases staged as primary, secondary, early latent, late latent, and unknown duration
2. 2016 and 2017 data are provisional due to reporting delay.

Source: Division of HIV and STD Programs
Rates of CT, GC, P&S SY and HIV/AIDS by Race/Ethnicity and Gender, LAC, 2015

1 Rates with a pattern fill are unstable due to small numbers (<12); rates for groups with fewer than 5 cases are not shown. Rates for APIs and NA may be unstable due to small numbers; 2015 data are provisional due to reporting delay.
2 Data are from STD Casewatch system; excludes cases with unknown race/ethnicity and cases in Long Beach and Pasadena.
3 Data are from eHARS system; includes cases in Long Beach and Pasadena.

Source: Division of HIV and STD Programs
Rates of CT, GC, P&S SY and HIV/AIDS by Age and Gender, LAC, 2015

Chlamydia

Gonorrhea

P&S Syphilis

HIV/AIDS diagnoses

1 Rates with a pattern fill are unstable due to small numbers (<12); rates for groups with fewer than 5 cases are not shown; 2015 data are provisional due to reporting delay.
2 Data are from STD Casewatch system; excludes cases with unknown race/ethnicity and cases in Long Beach and Pasadena.
3 Data are from eHARS system; includes cases in Long Beach and Pasadena.

Source: Division of HIV and STD Programs
Syphilis Rates by Gender, LAC, 2005-2016

Data are from STD Casewatch as of 05/17/2017 and excludes cases in Long Beach and Pasadena.

2015-2016 data are provisional due to reporting delay.

Syphilis includes all cases staged as primary, secondary, early latent and late latent / unknown duration.

Source: Division of HIV and STD Programs
Early Syphilis*, Number of Cases by Gender & Gender of Sex Partners, California, 1996–2016

* Includes primary, secondary, and early latent syphilis.
Female Early Syphilis* and Congenital Syphilis Cases California, 2009–2016

* Includes primary, secondary, and early latent syphilis.

Number of Cases

Year


Female Early Syphilis

Congenital Cases

Rev. 6/2017

Note: NA/AN = Native American/Alaskan Native, A/PI = Asian/Pacific Islander.
Race/ethnicity “Not Specified” ranged from 0% to 6.7% of cases for females in any given year.

* Includes primary, secondary, and early latent syphilis.

Rev. 6/2017

MSM=Men who have sex w/men, MSW=Men who have sex w/women, MSM&W=Men who have sex with men & women

* Includes primary, secondary, and early latent syphilis.
California has the second highest rate of CS in the U.S. and represented 33% of all CS cases in the U.S. in 2016.

Of the 207 CA CS cases reported in 2016, 37 (18%) were in LAC.

Note: The Modified Kaufman Criteria were used through 1989. The CDC Case Definition (MMWR 1989; 48: 828) was used effective January 1, 1990. California data prior to 1985 include all cases of congenital syphilis, regardless of age.

Sources: Centers for Disease Control and Prevention, 2016; California Department of Public Health, 2016; LAC DHSP, 2018.
Number of Female Syphilis and Congenital Syphilis (CS) Cases, LAC, 2006-2018

Data are from STD Casewatch as of 07/17/2018 and excludes cases from Long Beach and Pasadena.

2016-2018 data are provisional due to reporting delay. 2018 projections are based on provisional data. As of 7/31/18, 26 congenital syphilis cases have been reported.

Congenital Syphilis includes syphilitic stillbirths.

Syphilis among females of childbearing age (ages 15-44) including all cases staged as primary, secondary, early latent and late latent

Source: Division of HIV and STD Programs

1 Data are from STD Casewatch as of 07/17/2018 and excludes cases from Long Beach and Pasadena.

2 2016-2018 data are provisional due to reporting delay. 2018 projections are based on provisional data. As of 7/31/18, 26 congenital syphilis cases have been reported.

3 Congenital Syphilis includes syphilitic stillbirths.

4 Syphilis among females of childbearing age (ages 15-44) including all cases staged as primary, secondary, early latent and late latent.
2017 Maternal Characteristics (n=40)
Median Age: 29.2 years (range 16-38)

Race/Ethnicity:
- 46% AA
- 38% Latina

Entry into PNC:
- 26% 1st Tri
- 18% 2nd Tri
- 18% 3rd Tri
- 38% No PNC
2017 Maternal Characteristics (n=40)

Drug Use During Pregnancy
- 33% No drug use
- 12% MJ only
- 8% unk
- 9% Meth + MJ
- 28% Meth
- 8% +Cocaine
- 9% YES

History of Incarceration
- 51% No History
- 46% YES
- 3% unk
HIV Care Continuum
Annual Diagnoses of HIV Infection\(^1\), Stage 3 HIV Infection (AIDS), Persons Living with HIV\(^2\), and Deaths\(^3\) among Persons Diagnosed with HIV Infection (PLWH), Los Angeles County, 2006-2022 \(^4,5\)

\(^1\) Based on named reports for persons with a diagnosis of HIV infection regardless of the disease stage at time of diagnosis.
\(^2\) Based on residence at the time of HIV diagnosis.
\(^3\) The number of deaths among persons with HIV infection is based on the date of death report when the actual year of death is unknown.
\(^4\) Data for 2013-15 are provisional due to reporting delay.
\(^5\) Numbers for Persons Living with HIV, Diagnosed HIV Infection and Stage 3, and Deaths 2016-2022 and all new HIV infections are projected estimates based on DHSP HIV/AIDS Strategy activities.
New HIV Positivity among Special Populations

- Latino & African American MSM: 2.5%
- Transgender Individuals: 2.4%
- Youth 18-29: 1.9%
- American Indian/Alaskan Natives: 1.8%
- African Americans: 1.4%
- Males: 1.4%

Data Source: 2015 HIV Testing Services Data
HIV Care Continuum
HIV Care Continuum Definitions

- **Data Source:** HIV Surveillance data (Enhanced HIV/AIDS Reporting System-eHARS)
- **Linkage to care defined as:** ≥1 CD4/VL/genotype test within 30 days of HIV diagnosis in 2016
- **Engaged in care defined as:** ≥1 CD4/VL/genotype test in 2016
- **Retained in care defined as:** ≥2 CD4/VL/genotype tests at least 91 days apart in 2016
- **Viral suppression:** Last VL in 2016 <200 copies/ml
2016 LAC HIV Cascade for Persons Diagnosed and Living with HIV Infection

- Diagnosed in 2016 (N=1,881)

- Percentage of Undiagnosed HIV Infections among PLWH
  - Undiagnosed (14.2%)
  - Diagnosed (85.8%)

Persons Living with Diagnosed HIV Infection (N=48,911)

- Linked to care ≤ 30 days: 100%
- Diagnosed: 69%
- Engaged in care: 54%
- Retained in care: 60%
- Virally Suppressed: 60%

1. Denominator includes persons who were diagnosed with HIV infection in 2016; numerator includes persons reported with diagnosed HIV infection in 2016 who linked to care within 30 days of HIV diagnosis.
2. Denominator includes persons with diagnosed HIV infection through 2015 and living with diagnosed HIV infection in LAC as of 12/31/2016 based on most recent residence; excludes persons who no longer live in LAC and includes persons who moved to LAC after their initial HIV diagnosis.
4. Viral suppression defined as <200 copies/ml.
5. Based on a local estimate for undiagnosed PLWH in LAC.

Data Source: 2016 preliminary eHARS data as of September 2017
HIV Care Continuum by Gender, LAC 2016

1. Denominator includes persons who were diagnosed with HIV infection in 2016; numerator includes persons reported with diagnosed HIV infection in 2016 who linked to care within 30 days of HIV diagnosis

2. Denominator includes persons with diagnosed HIV infection through 2015 and living with HIV infection in LAC as of 12/31/2016 based on most recent residence; excludes persons who no longer live in LAC and includes persons who moved to LAC after their initial HIV diagnosis.


4. Viral suppression defined as <200 copies/ml.

Data Source: 2016 preliminary eHARS data as of September 2017
HIV Care Continuum by Age, LAC 2016

1. Denominator includes persons who were diagnosed with HIV infection in 2016; numerator includes persons reported with diagnosed HIV infection in 2016 who linked to care within 30 days of HIV diagnosis.
2. Denominator includes persons with diagnosed HIV infection through 2015 and living with HIV infection in LAC as of 12/31/2016 based on most recent residence; excludes persons who no longer live in LAC and includes persons who moved to LAC after their initial HIV diagnosis.
4. Viral suppression defined as <200 copies/ml.

Data Source: Preliminary 2016 eHARS as of September 2017
HIV Care Continuum by Race/Ethnicity, LAC 2016

1. Denominator includes persons who were diagnosed with HIV infection in 2016; numerator includes persons reported with diagnosed HIV infection in 2016 who linked to care within 30 days of HIV diagnosis.

2. Denominator includes persons with diagnosed HIV infection through 2015 and living with HIV infection in LAC as of 12/31/2016 based on most recent residence; excludes persons who no longer live in LAC and includes persons who moved to LAC after their initial HIV diagnosis.


4. Viral suppression defined as <200 copies/ml.

Data Source: Preliminary 2016 eHARS as of September 2017
Goal 1: Reduce Annual HIV infections to 500 by 2022

Goal 2: Increase the Proportion of Persons Living with HIV who are Diagnosed to at least 90% by 2022

Goal 3: Increase the Proportion of Diagnosed Persons Living with HIV who are Virally Suppressed to 90% by 2022
Evolution to Health District-based Planning

- From 8 Service Planning Areas to 26 Health Districts

- Combine RWHAP providers, Federally Qualified Health Centers (FQHCs), Hospitals, PrEP Centers of Excellence (COEs), DPH STD Clinics with HIV/STD Impact Maps

- Incorporate Bivariate Maps into Planning Efforts

- Each of the 26 Health Districts have area-specific performance metrics across 5 domains.
HOLLYWOOD-WILSHIRE HEALTH DISTRICT PROFILE

STRATEGY GOALS

The Los Angeles County Department of Public Health’s Division of HIV and STD Programs (DHSIP) is undertaking an ambitious strategy to significantly reduce the number of HIV infections in LA County. The goals of the strategy are:

- Reduce annual new HIV infections to 500
- Increase proportion of persons living with HIV (PLWH) who are diagnosed to at least 90%
- Increase viral suppression of PLWH to at least 50%

HIV INFECTION REDUCTION GOAL

*Graph showing reduction in HIV infections*

HIV DIAGNOSIS GOAL

*Graph showing increase in HIV diagnoses*

PrEP ENROLLMENT GOAL

*Graph showing increase in PrEP enrollment*

HIV VIRAL SUPPRESSION GOAL

*Graph showing increase in HIV viral suppression rates*

KEY FOCUS AREAS

- Increase PrEP enrollment
- Increase targeted HIV testing
- Increase viral suppression rates among females and transgender persons
- Increase viral suppression rates among 18-29 year olds
- Increase viral suppression rates among African American, Latino, and American Indian persons

LEGEND

- HIV Testing Provider
- Ryan White Provider
- PrEP Provider
- DHS Facility
- DMH Facility
- Hospital (in Statistically Impacted Area)
- Hospital
- Federally Qualified Health Center

Estimated Number of PLWH Residing in the Hollywood-Wilshire Health District at the End of 2016

<table>
<thead>
<tr>
<th>Area Size (% of LAC)</th>
<th>32 square miles (1%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Health District Population (% of LAC)</td>
<td>56,237 (6%)</td>
</tr>
<tr>
<td>PLWH (% of LAC)</td>
<td>11,691 (19%)</td>
</tr>
<tr>
<td>HIV Rate (Rank in LAC)</td>
<td>2,332/100,000 (1 of 26)</td>
</tr>
</tbody>
</table>
How can you help?
How can you help?

• Conduct a thorough sexual history on all of your patients at least once per year.
• Screen patients as indicated per California and Los Angeles County guidelines.
• Test patients for STDs at the appropriate sites – don’t forget the pharynx and rectum!
• Treat patients for STDs correctly.
• Screen pregnant women for syphilis in the 1st trimester, 3rd trimester (28 – 32 weeks), and at delivery!
• Report cases of HIV and other STDs promptly and accurately.
• Call us for patient’s Syphilis serology history or with questions!
• Prescribe PrEP to patients at highest risk for HIV acquisition.
2018 Los Angeles County STD Summit: Improving Prevention and Care

- Tuesday, October 30, 2018, 8:00 am to 4:30 pm
- Radisson Midtown Hotel at USC
  - 3540 South Figueroa Street, Los Angeles, California 90007
- To register, please visit: https://tinyurl.com/y99fx8zg.
- Topics of discussion include:
  - STD screening and treatment best practices
  - Patient Delivered Partner Therapy
  - Current LA County STD data and trends
  - PrEP and STDs
- Hosted by the Department of Public Health, Essential Access Health and the Community Clinic Association of Los Angeles (CCALAC)
Thank You!

Leo Moore, MD, MSHPM

lmoore@ph.lacounty.gov