CHAPTER 37

Sexually Transmitted Diseases
(STD)

Lead Agency

Centers for Disease Control and Prevention

Contents

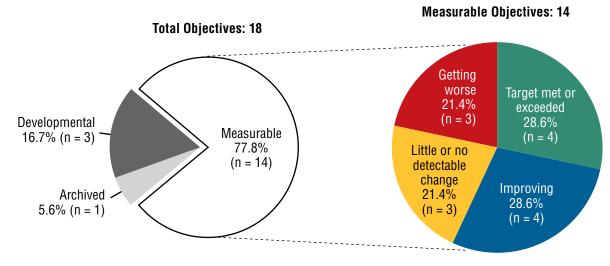# Goal: Promote healthy sexual behaviors, strengthen community capacity, and increase access to quality services to prevent sexually transmitted diseases (STDs) and their complications.

This chapter includes objectives that monitor the incidence, prevalence, and screening of selected sexually transmitted diseases. The Reader's Guide provides a step-by-step explanation of the content of this chapter, including criteria for highlighting objectives in the Selected Findings.[1]

Status of Objectives

Figure 37–1. Midcourse Status of the Sexually Transmitted Diseases Objectives

Of the 18 objectives in the Sexually Transmitted Diseases Topic Area, 1 was archived,[2] 3 were developmental,[3] and 14 objectives were measurable[4] (Figure 37–1, Table 37–1). The midcourse status of the measurable objectives was as follows (Table 37–2):

- 4 objectives had met or exceeded their 2020 targets,[5]

- 4 objectives were improving,[6]

- 3 objectives demonstrated little or no detectable change,[7] and

- 3 objectives were getting worse.[8]

Selected Findings

Chlamydia

- The proportion of ***Chlamydia trachomatis* infections among females aged 15–24 who had attended family planning clinics** (STD-1.1) increased from 7.4% in 2008 to 8.3% in 2011, moving away from the baseline and 2020 target (Table 37–2).

  » In 2011, the disparity by race and ethnicity in the proportion of *Chlamydia trachomatis* infections among females aged 15–24 who had attended family planning clinics (STD-1.1) was not tested for statistical significance (Table 37–3).

- The proportion of ***Chlamydia trachomatis* infections among females aged 16–24 who were enrolled in a National Job Training Program** (STD-1.2) decreased from 12.8% in 2008 to 11.7% in 2013, moving toward the 2020 target (Table 37–2).

  » In 2013, the disparity by race and ethnicity in the proportion of *Chlamydia trachomatis* infections among females aged 16–24 who were enrolled in a National Job Training Program (STD-1.2) was not tested for statistical significance (Table 37–3).

- The proportion of ***Chlamydia trachomatis* infections among males aged 16–24 who were enrolled in a National Job Training Program** (STD-1.3) demonstrated little or no detectable change between 2008 and 2013 (7.0% and 7.4%, respectively) (Table 37–2).

» In 2013, the disparity by race and ethnicity in the proportion of *Chlamydia trachomatis* infections among males aged 16–24 who were enrolled in a National Job Training Program (STD-1.3) was not tested for statistical significance (Table 37–3).

■ Between 2008 and 2014, the proportion of **sexually active females aged 21–24 on Medicaid who were screened for chlamydia** (STD-3.2) increased from 59.4% to 62.0%, moving toward the 2020 target (Table 37–2).

■ From 2008 to 2014, the proportion of **sexually active females with commercial health insurance who were screened for chlamydia** increased from 40.1% to 42.7% among those aged 16–20 (STD-4.1), and from 43.5% to 52.1% among those aged 21–24 (STD-4.2), moving toward their respective 2020 targets (Table 37–2).

Pelvic Inflammatory Disease

■ The proportion of **females aged 15–44 who were ever treated for pelvic inflammatory disease (PID)** (STD-5) decreased from 4.2% in 2006–2010 to 3.6% in 2011–2013, exceeding the 2020 target (Table 37–2).

» In 2011–2013, there were statistically significant disparities by disability status and geographic location in the proportion of females aged 15–44 who were ever treated for PID (Table 37–3, STD-5). The disparities by race and ethnicity and education were not statistically significant.

Gonorrhea

■ **New cases of gonorrhea among females aged 15–44** (STD-6.1) decreased from 279.9 per 100,000 population in 2008 to 248.1 in 2014, exceeding the 2020 target (Table 37–2).

» In 2014, the disparity by race and ethnicity in new cases of gonorrhea among females aged 15–44 (STD-6.1) was not tested for statistical significance (Table 37–3).

■ Between 2008 and 2014, **new gonorrhea cases among males aged 15–44** (STD-6.2) increased from 216.5 to 262.8 per 100,000 population, moving away from the baseline and 2020 target (Table 37–2).

» In 2014, the disparity by race and ethnicity in new gonorrhea cases among males aged 15–44 (STD-6.2) was not tested for statistical significance (Table 37–3).

Syphilis

■ Between 2008 and 2014, **new cases of primary and secondary syphilis among females** (STD-7.1) decreased from 1.4 to 1.1 per 100,000 population, exceeding the 2020 target (Table 37–2).

» In 2014, 39 states had met or exceeded the national target for new cases of primary and secondary syphilis among females (Map 37–1, STD-7.1).

» In 2014, the disparity by race and ethnicity in new cases of primary and secondary syphilis among females (STD-7.1) was not tested for statistical significance (Table 37–3).

■ **New cases of primary and secondary syphilis among males** (STD-7.2) increased from 7.4 per 100,000 population in 2008 to 11.6 in 2014, moving away from the baseline and 2020 target (Table 37–2).

» In 2014, 23 states had met or exceeded the national target for new cases of primary and secondary syphilis among males (Map 37–2, STD-7.2).

» In 2014, the disparity by race and ethnicity in new cases of primary and secondary syphilis among males (STD-7.2) was not tested for statistical significance (Table 37–3).

■ There was little or no detectable change in **new cases of congenital syphilis** (STD-8) between 2008 and 2014 (10.7 and 11.6 per 100,000 live births, respectively) (Table 37–2).

» In 2014, 36 states and the District of Columbia had met or exceeded the national target for new cases of congenital syphilis (Map 37–3, STD-8).

» In 2014, the disparity by race and ethnicity in new cases of congenital syphilis (STD-8) was not tested for statistical significance (Table 37–3).

Genital Herpes

■ The proportion of **young adults aged 20–29 with genital herpes infection due to herpes simplex type 2** (STD-10) decreased from 10.5% in 2005–2008 to 8.5% in 2009–2012, exceeding the 2020 target (Table 37–2).

» In 2009–2012, there were statistically significant disparities by sex and race and ethnicity in the proportion of young adults aged 20–29 who tested positive for genital herpes infections due to herpes simplex type 2 (Table 37–3, STD-10). The disparities by education, family income, and activity limitation status were not statistically significant.

More Information

Readers interested in more detailed information about the objectives in this topic area are invited to visit the HealthyPeople.gov website, where extensive substantive and technical information is available:

- For the background and importance of the topic area, see: http://www.healthypeople.gov/2020/topics-objectives/topic/sexually-transmitted-diseases

- For data details for each objective, including definitions, numerators, denominators, calculations, and data limitations, see: http://www.healthypeople.gov/2020/topics-objectives/topic/sexually-transmitted-diseases/objectives
  Select an objective, then click on the "Data Details" icon.

- For objective data by population group (e.g., sex, race and ethnicity, or family income), including rates, percentages, or counts for multiple years, see: http://www.healthypeople.gov/2020/topics-objectives/topic/sexually-transmitted-diseases/objectives
  Select an objective, then click on the "Data2020" icon.

- Additional information on statistics and trends for sexually transmitted diseases in the United States through 2014 is available from the Centers for Disease Control and Prevention's 2014 "Sexually Transmitted Disease Surveillance" report (available from: http://www.cdc.gov/std/stats14/).

Data for the measurable objectives in this chapter were from the following data sources:

- Healthcare Effectiveness Data and Information Set: http://www.ncqa.org/HEDISQualityMeasurement.aspx

- National Health and Nutrition Examination Survey: http://www.cdc.gov/nchs/nhanes.htm

- National Survey of Family Growth: http://www.cdc.gov/nchs/nsfg.htm

- National Vital Statistics System–Natality: http://www.cdc.gov/nchs/births.htm

- Population Estimates: http://www.census.gov/popest/

- STD Surveillance System: http://www.cdc.gov/std/stats/

Footnotes

[1]The Technical Notes provide more information on Healthy People 2020 statistical methods and issues.

[2]**Archived** objectives are no longer being monitored due to lack of data source, changes in science, or replacement with other objectives.

[3]**Developmental** objectives did not have a national baseline value.

[4]**Measurable** objectives had a national baseline value.

[5]**Target met or exceeded**—One of the following, as specified in the Midcourse Progress Table:
- » At baseline the target was not met or exceeded and the midcourse value was equal to or exceeded the target. (The percentage of targeted change achieved was equal to or greater than 100%.)
- » The baseline and midcourse values were equal to or exceeded the target. (The percentage of targeted change achieved was not assessed.)

[6]**Improving**—One of the following, as specified in the Midcourse Progress Table:
- » Movement was toward the target, standard errors were available, and the percentage of targeted change achieved was statistically significant.
- » Movement was toward the target, standard errors were not available, and the objective had achieved 10% or more of the targeted change.

[7]**Little or no detectable change**—One of the following, as specified in the Midcourse Progress Table:
- » Movement was toward the target, standard errors were available, and the percentage of targeted change achieved was not statistically significant.
- » Movement was toward the target, standard errors were not available, and the objective had achieved less than 10% of the targeted change.
- » Movement was away from the baseline and target, standard errors were available, and the percentage change relative to the baseline was not statistically significant.
- » Movement was away from the baseline and target, standard errors were not available, and the objective had moved less than 10% relative to the baseline.
- » There was no change between the baseline and the midcourse data point.

[8]**Getting worse**—One of the following, as specified in the Midcourse Progress Table:
- » Movement was away from the baseline and target, standard errors were available, and the percentage change relative to the baseline was statistically significant.
- » Movement was away from the baseline and target, standard errors were not available, and the objective had moved 10% or more relative to the baseline.

Suggested Citation

National Center for Health Statistics. Chapter 37: Sexually Transmitted Diseases. Healthy People 2020 Midcourse Review. Hyattsville, MD. 2016.

Table 37–1. Sexually Transmitted Diseases Objectives

LEGEND

🚦 Data for this objective are available in this chapter's Midcourse Progress Table.

📊 Disparities data for this objective are available, and this chapter includes a Midcourse Health Disparities Table.

🗺 A state or county level map for this objective is available at the end of the chapter.

| Not Applicable | Midcourse data availability is not applicable for developmental and archived objectives. **Developmental** objectives did not have a national baseline value. **Archived** objectives are no longer being monitored due to lack of data source, changes in science, or replacement with other objectives. |

Objective Number	Objective Statement	Data Sources	Midcourse Data Availability
STD-1.1	Reduce the proportion of females aged 15 to 24 years with *Chlamydia trachomatis* infections attending family planning clinics	STD Surveillance System (STDSS), CDC/NCHHSTP	🚦 📊
STD-1.2	Reduce the proportion of females aged 24 years and under with *Chlamydia trachomatis* infections enrolled in a National Job Training Program	STD Surveillance System (STDSS), CDC/NCHHSTP	🚦 📊
STD-1.3	Reduce the proportion of males aged 24 years and under enrolled in a National Job Training Program with *Chlamydia trachomatis* infections	STD Surveillance System (STDSS), CDC/NCHHSTP	🚦 📊
STD-2	(Archived) Reduce chlamydia rates among females aged 15 to 44 years		Not Applicable
STD-3.1	Increase the proportion of sexually active females aged 16 to 20 years enrolled in Medicaid plans who are screened for chlamydia infections during the measurement year	Healthcare Effectiveness Data and Information Set (HEDIS), National Committee for Quality Assurance (NCQA)	🚦
STD-3.2	Increase the proportion of sexually active females aged 21 to 24 years enrolled in Medicaid plans who are screened for chlamydia infections during the measurement year	Healthcare Effectiveness Data and Information Set (HEDIS), National Committee for Quality Assurance (NCQA)	🚦
STD-4.1	Increase the proportion of sexually active females aged 16 to 20 years enrolled in commercial health insurance plans who are screened for chlamydia infections during the measurement year	Healthcare Effectiveness Data and Information Set (HEDIS), National Committee for Quality Assurance (NCQA)	🚦
STD-4.2	Increase the proportion of sexually active females aged 21 to 24 years enrolled in commercial health insurance plans who are screened for chlamydia infections during the measurement year	Healthcare Effectiveness Data and Information Set (HEDIS), National Committee for Quality Assurance (NCQA)	🚦
STD-5	Reduce the proportion of females aged 15 to 44 years who have ever required treatment for pelvic inflammatory disease (PID)	National Survey of Family Growth (NSFG), CDC/NCHS	🚦 📊

Table 37–1. Sexually Transmitted Diseases Objectives—Continued

LEGEND

🚦	Data for this objective are available in this chapter's Midcourse Progress Table.
🔵	Disparities data for this objective are available, and this chapter includes a Midcourse Health Disparities Table.
🗺️	A state or county level map for this objective is available at the end of the chapter.

Not Applicable — Midcourse data availability is not applicable for developmental and archived objectives. **Developmental** objectives did not have a national baseline value. **Archived** objectives are no longer being monitored due to lack of data source, changes in science, or replacement with other objectives.

Objective Number	Objective Statement	Data Sources	Midcourse Data Availability
STD-6.1	Reduce gonorrhea rates among females aged 15 to 44 years	STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census	🚦 🔵
STD-6.2	Reduce gonorrhea rates among males aged 15 to 44 years	STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census	🚦 🔵
STD-7.1	Reduce domestic transmission of primary and secondary syphilis among females	STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census	🚦 🔵 🗺️
STD-7.2	Reduce domestic transmission of primary and secondary syphilis among males	STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census	🚦 🔵 🗺️
STD-8	Reduce congenital syphilis	STD Surveillance System (STDSS), CDC/NCHHSTP; National Vital Statistics System–Natality (NVSS–N), CDC/NCHS	🚦 🔵 🗺️
STD-9.1	(Developmental) Reduce the proportion of females with human papillomavirus (HPV) types 6 and 11	(Potential) National Health and Nutrition Examination Survey (NHANES), CDC/NCHS; National Health Interview Survey (NHIS), CDC/NCHS	Not Applicable
STD-9.2	(Developmental) Reduce the proportion of females with human papillomavirus (HPV) types 16 and 18	(Potential) National Health and Nutrition Examination Survey (NHANES), CDC/NCHS; National Health Interview Survey (NHIS), CDC/NCHS	Not Applicable
STD-9.3	(Developmental) Reduce the proportion of females with other human papillomavirus (HPV) types	(Potential) National Health and Nutrition Examination Survey (NHANES), CDC/NCHS	Not Applicable
STD-10	Reduce the proportion of young adults with genital herpes infection due to herpes simplex type 2	National Health and Nutrition Examination Survey (NHANES), CDC/NCHS	🚦 🔵

Table 37–2. Midcourse Progress for Measurable[1] Sexually Transmitted Diseases Objectives

LEGEND

| ✓ Target met or exceeded[2,3] | ✚ Improving[4,5] | ⬤ Little or no detectable change[6–10] | ▬ Getting worse[11,12] | ▮ Baseline only[13] | ▮ Informational[14] |

	Objective Description	Baseline Value (Year)	Midcourse Value (Year)	Target	Movement Toward Target[15]	Movement Away From Baseline[16]	Movement Statistically Significant[17]
▬[12]	**STD-1.1** *Chlamydia trachomatis* infections among females attending family planning clinics (percent, 15–24 years)	7.4% (2008)	8.3% (2011)	6.7%		12.2%	
✚[5]	**STD-1.2** *Chlamydia trachomatis* infections among females enrolled in a National Job Training Program (percent, 16–24 years)	12.8% (2008)	11.7% (2013)	11.5%	84.6%		
⬤[9]	**STD-1.3** *Chlamydia trachomatis* infections among males enrolled in a National Job Training Program (percent, 16–24 years)	7.0% (2008)	7.4% (2013)	6.3%		5.7%	
⬤[9]	**STD-3.1** Sexually active females on Medicaid screened for chlamydia (percent, 16–20 years)	52.7% (2008)	52.3% (2014)	70.9%		0.8%	
✚[5]	**STD-3.2** Sexually active females on Medicaid screened for chlamydia (percent, 21–24 years)	59.4% (2008)	62.0% (2014)	80.0%	12.6%		
✚[5]	**STD-4.1** Sexually active females with commercial health insurance screened for chlamydia (percent, 16–20 years)	40.1% (2008)	42.7% (2014)	61.3%	12.3%		
✚[5]	**STD-4.2** Sexually active females with commercial health insurance screened for chlamydia (percent, 21–24 years)	43.5% (2008)	52.1% (2014)	74.6%	27.7%		
✓[2]	**STD-5** Females ever treated for pelvic inflammatory disease (percent, 15–44 years)	4.2% (2006–2010)	3.6% (2011–2013)	3.8%	150.0%		No
✓[2]	**STD-6.1** New cases of gonorrhea among females (per 100,000 population, 15–44 years)	279.9 (2008)	248.1 (2014)	251.9	113.6%		
▬[12]	**STD-6.2** New cases of gonorrhea among males (per 100,000 population, 15–44 years)	216.5 (2008)	262.8 (2014)	194.8		21.4%	
✓[2]	**STD-7.1** New cases of primary and secondary syphilis among females (per 100,000 population)	1.4 (2008)	1.1 (2014)	1.3	300.0%		
▬[12]	**STD-7.2** New cases of primary and secondary syphilis among males (per 100,000 population)	7.4 (2008)	11.6 (2014)	6.7		56.8%	
⬤[9]	**STD-8** New cases of congenital syphilis (per 100,000 live births)	10.7 (2008)	11.6 (2014)	9.6		8.4%	
✓[2]	**STD-10** Genital herpes infection due to herpes simplex type 2 among young adults (percent, 20–29 years)	10.5% (2005–2008)	8.5% (2009–2012)	9.5%	200.0%		No

Table 37–2. Midcourse Progress for Measurable[1] Sexually Transmitted Diseases Objectives—Continued

NOTES

See HealthyPeople.gov for all Healthy People 2020 data. The Technical Notes provide more information on the measures of progress.

FOOTNOTES

[1]**Measurable** objectives had a national baseline value.

Target met or exceeded:

[2]At baseline the target was not met or exceeded and the midcourse value was equal to or exceeded the target. (The percentage of targeted change achieved was equal to or greater than 100%.)

[3]The baseline and midcourse values were equal to or exceeded the target. (The percentage of targeted change achieved was not assessed.)

Improving:

[4]Movement was toward the target, standard errors were available, and the percentage of targeted change achieved was statistically significant.

[5]Movement was toward the target, standard errors were not available, and the objective had achieved 10% or more of the targeted change.

Little or no detectable change:

[6]Movement was toward the target, standard errors were available, and the percentage of targeted change achieved was not statistically significant.

[7]Movement was toward the target, standard errors were not available, and the objective had achieved less than 10% of the targeted change.

[8]Movement was away from the baseline and target, standard errors were available, and the percentage change relative to the baseline was not statistically significant.

[9]Movement was away from the baseline and target, standard errors were not available, and the objective had moved less than 10% relative to the baseline.

[10]There was no change between the baseline and the midcourse data point.

Getting worse:

[11]Movement was away from the baseline and target, standard errors were available, and the percentage change relative to the baseline was statistically significant.

[12]Movement was away from the baseline and target, standard errors were not available, and the objective had moved 10% or more relative to the baseline.

[13]**Baseline only:** The objective only had one data point, so progress toward target attainment could not be assessed.

[14]**Informational:** A target was not set for this objective, so progress toward target attainment could not be assessed.

[15]For objectives that **moved toward** their targets, movement toward the target was measured as the percentage of targeted change achieved (unless the target was already met or exceeded at baseline):

$$\text{Percentage of targeted change achieved} = \frac{\text{Midcourse value} - \text{Baseline value}}{\text{HP2020 target} - \text{Baseline value}} \times 100$$

[16]For objectives that **moved away** from their baselines and targets, movement away from the baseline was measured as the magnitude of the percentage change from baseline:

$$\text{Magnitude of percentage change from baseline} = \frac{|\text{ Midcourse value} - \text{Baseline value }|}{\text{Baseline value}} \times 100$$

[17]Statistical significance was tested when the objective had a target and at least two data points, standard errors of the data were available, and a normal distribution could be assumed. Statistical significance of the percentage of targeted change achieved or the magnitude of the percentage change from baseline was assessed at the 0.05 level using a normal one-sided test.

DATA SOURCES

STD-1.1	STD Surveillance System (STDSS), CDC/NCHHSTP
STD-1.2	STD Surveillance System (STDSS), CDC/NCHHSTP
STD-1.3	STD Surveillance System (STDSS), CDC/NCHHSTP
STD-3.1	Healthcare Effectiveness Data and Information Set (HEDIS), National Committee for Quality Assurance (NCQA)
STD-3.2	Healthcare Effectiveness Data and Information Set (HEDIS), National Committee for Quality Assurance (NCQA)
STD-4.1	Healthcare Effectiveness Data and Information Set (HEDIS), National Committee for Quality Assurance (NCQA)
STD-4.2	Healthcare Effectiveness Data and Information Set (HEDIS), National Committee for Quality Assurance (NCQA)
STD-5	National Survey of Family Growth (NSFG), CDC/NCHS
STD-6.1	STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census
STD-6.2	STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census
STD-7.1	STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census
STD-7.2	STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census
STD-8	STD Surveillance System (STDSS), CDC/NCHHSTP; National Vital Statistics System–Natality (NVSS–N), CDC/NCHS
STD-10	National Health and Nutrition Examination Survey (NHANES), CDC/NCHS

Table 37–3. Midcourse Health Disparities[1] for Population-based Sexually Transmitted Diseases Objectives

Most favorable (least adverse) and least favorable (most adverse) group rates and summary disparity ratios[2,3] for selected characteristics at the midcourse data point

LEGEND

At the midcourse data point | ■ Group with the most favorable (least adverse) rate | ■ Group with the least favorable (most adverse) rate | ▢ Data are available, but this group did not have the highest or lowest rate. | ▢ Data are not available for this group because the data were statistically unreliable, not collected, or not analyzed.

Legend key for colored cells below: **MF** = Group with the most favorable (least adverse) rate (dark blue); **LF** = Group with the least favorable (most adverse) rate (rose); **A** = Data available but not highest/lowest (gray); blank = data not available.

Characteristics and Groups

Population-based Objectives	Sex: Male	Sex: Female	Sex: Summary Disparity Ratio[2]	Race: American Indian or Alaska Native	Race: Asian	Race: Native Hawaiian or other Pacific Islander	Race: Two or more races	Race: Hispanic or Latino	Race: Black, not Hispanic	Race: White, not Hispanic	Race: Summary Disparity Ratio[3]	Edu: Less than high school	Edu: High school graduate	Edu: At least some college	Edu: Associate's degree	Edu: 4-year college degree	Edu: Advanced degree	Edu: Summary Disparity Ratio[3]	Income: Poor	Income: Near-poor	Income: Middle	Income: Near-high	Income: High	Income: Summary Disparity Ratio[3]	Disability: Persons with disability	Disability: Persons without disability	Disability: Summary Disparity Ratio[2]	Location: Metropolitan	Location: Nonmetropolitan	Location: Summary Disparity Ratio[2]
STD-1.1 *Chlamydia trachomatis* infections among females attending family planning clinics (percent, 15–24 years) (2011)								A	LF	MF	1.675†																			
STD-1.2 *Chlamydia trachomatis* infections among females enrolled in a National Job Training Program (percent, 15–24 years) (2013)					MF				LF		1.616†																			
STD-1.3 *Chlamydia trachomatis* infections among males enrolled in a National Job Training Program (percent, 15–24 years) (2013)					MF				LF		1.911†																			
STD-5 Females ever treated for pelvic inflammatory disease (percent, 15–44 years) (2011–2013)									LF	MF	1.249		LF	MF				1.292	A						LF	MF	3.722*	MF	LF	1.550*
STD-6.1 New cases of gonorrhea among females (per 100,000 population, 15–44 years) (2014)				A	MF	A	A	A	LF	A	11.887†																			
STD-6.2 New cases of gonorrhea among males (per 100,000 population, 15–44 years) (2014)				A	MF	A	A	A	LF	A	5.198†																			
STD-7.1 New cases of primary and secondary syphilis among females (per 100,000 population) (2014)				A	MF	A	A	A	LF	A	8.250†																			
STD-7.2 New cases of primary and secondary syphilis among males (per 100,000 population) (2014)				A	MF	A	A	A	LF	A	2.590†																			

Table 37–3. Midcourse Health Disparities[1] for Population-based Sexually Transmitted Diseases Objectives—Continued

Most favorable (least adverse) and least favorable (most adverse) group rates and summary disparity ratios[2,3] for selected characteristics at the midcourse data point

LEGEND

At the midcourse data point

| ■ (blue) Group with the most favorable (least adverse) rate | ■ (red) Group with the least favorable (most adverse) rate | □ (gray) Data are available, but this group did not have the highest or lowest rate. | □ (white) Data are not available for this group because the data were statistically unreliable, not collected, or not analyzed. |

Characteristics and Groups

Population-based Objectives	Sex: Male	Sex: Female	Summary Disparity Ratio[2]	Race: American Indian or Alaska Native	Race: Asian	Race: Native Hawaiian or other Pacific Islander	Race: Two or more races	Race: Hispanic or Latino	Race: Black, not Hispanic	Race: White, not Hispanic	Summary Disparity Ratio[3]	Edu: Less than high school	Edu: High school graduate	Edu: At least some college	Edu: Associate's degree	Edu: 4-year college degree	Edu: Advanced degree	Summary Disparity Ratio[3]	Income: Poor	Income: Near-poor	Income: Middle	Income: Near-high	Income: High	Summary Disparity Ratio[3]	Disability: Persons with disability	Disability: Persons without disability	Summary Disparity Ratio[2]	Location: Metropolitan	Location: Nonmetropolitan	Summary Disparity Ratio[2]
STD-8 New cases of congenital syphilis (per 100,000 live births) (2014)	□	□		□(gray)	□a(gray)	□a(gray)	□	□(gray)	■(red)	■(blue)	4.527†	□	□	□	□	□	□		□	□	□	□	□		□	□		□	□	
STD-10 Genital herpes infection due to herpes simplex type 2 among young adults (percent, 20–29 years) (2009–2012)	■(blue)	■(red)	2.514*	□	□	□	□	□(gray)	■(red)	■(blue)	3.073*	■(red)	□	■b(blue)	□	□	□	1.345	■(red)	□(gray)	■(blue)	□	□	1.619	■c(red)	■d(blue)	1.553	□	□	

NOTES

See HealthyPeople.gov for all Healthy People 2020 data. The Technical Notes provide more information on the measures of disparities.

FOOTNOTES

[1] **Health disparities** were assessed among population groups within specified demographic characteristics (sex, race and ethnicity, educational attainment, etc.). This assessment did not include objectives that were not population-based, such as those based on states, worksites, or those monitoring the number of events.

[2] When there were only two groups (e.g., male and female), the **summary disparity ratio** was the ratio of the higher to the lower rate.

[3] When there were three or more groups (e.g., white non-Hispanic, black non-Hispanic, Hispanic) and the most favorable rate (R_b) was the highest rate, the **summary disparity ratio** was calculated as R_b/R_a, where R_a = the average of the rates for all other groups. When there were three or more groups and the most favorable rate was the lowest rate, the summary disparity ratio was calculated as R_a/R_b.

[4] Unless otherwise footnoted, data do not include persons under age 25 years.

[5] Unless otherwise footnoted, the poor, near-poor, middle, near-high, and high income groups are for persons whose family incomes were less than 100%, 100%–199%, 200%–399%, 400%–599%, and at or above 600% of the poverty threshold, respectively.

*The summary disparity ratio was significantly greater than 1.000. Statistical significance was assessed at the 0.05 level using a normal one-sided test on the natural logarithm scale.

†The summary disparity ratio was not tested for statistical significance because standard errors of the data were not available or normality on the natural logarithm scale could not be assumed.

[a] Data are for Asian or Pacific Islander persons.

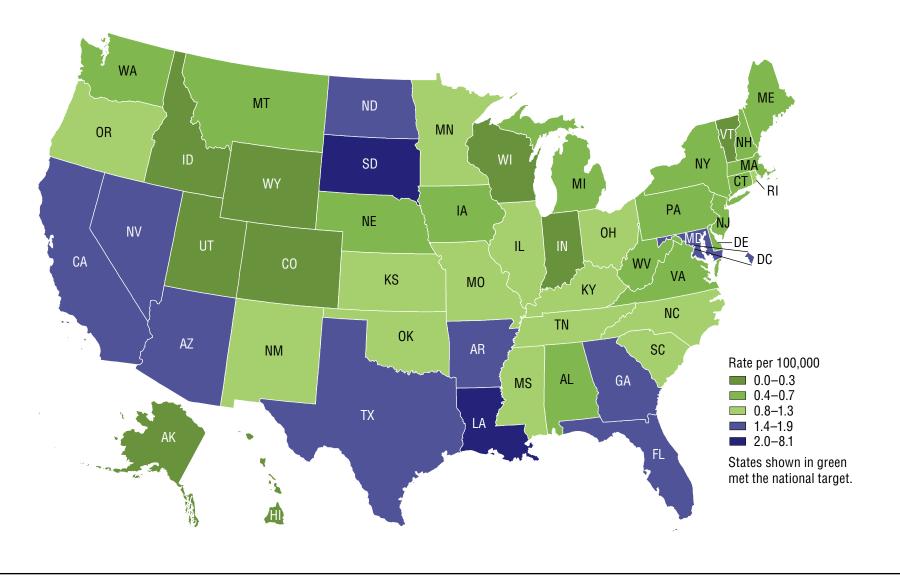[b] Data are for persons who completed some college or received an associate's degree.

[c] Data are for persons with activity limitations.

[d] Data are for persons without activity limitations.

DATA SOURCES

STD-1.1	STD Surveillance System (STDSS), CDC/NCHHSTP
STD-1.2	STD Surveillance System (STDSS), CDC/NCHHSTP
STD-1.3	STD Surveillance System (STDSS), CDC/NCHHSTP
STD-5	National Survey of Family Growth (NSFG), CDC/NCHS
STD-6.1	STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census
STD-6.2	STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census
STD-7.1	STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census
STD-7.2	STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census
STD-8	STD Surveillance System (STDSS), CDC/NCHHSTP; National Vital Statistics System–Natality (NVSS–N), CDC/NCHS
STD-10	National Health and Nutrition Examination Survey (NHANES), CDC/NCHS

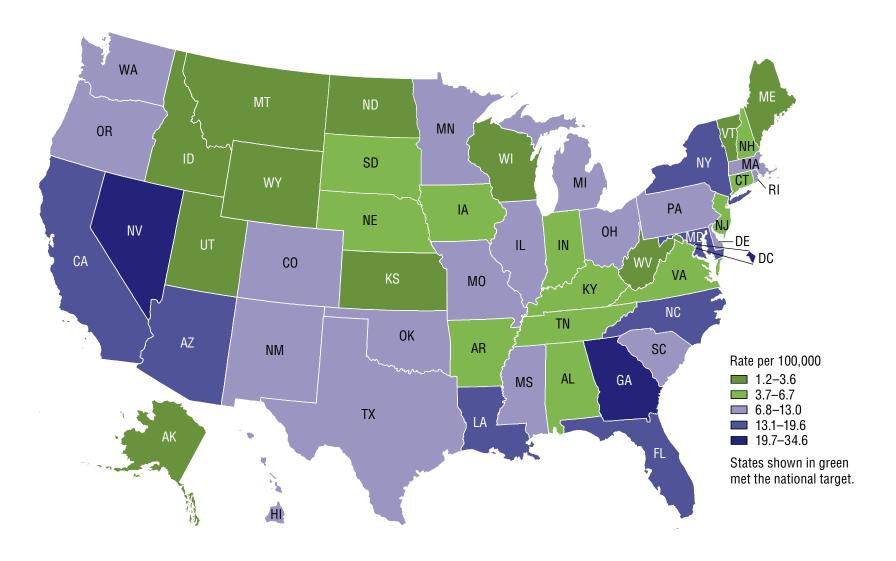# Map 37–1. New Cases of Primary and Secondary Syphilis Among Females, by State: 2014

Healthy People 2020 Objective STD-7.1 ● National Target = 1.3 per 100,000 population ● National Rate = 1.1 per 100,000 population

Rate per 100,000

- 0.0–0.3
- 0.4–0.7
- 0.8–1.3
- 1.4–1.9
- 2.0–8.1

States shown in green met the national target.

NOTES: Data are for individual-level case report data of females with primary and secondary syphilis electronically sent to CDC through the National Electronic Telecommunications System for Surveillance (NETSS) and U.S. Census population data. Data are displayed by a modified Jenks classification for U.S. states which creates categories that minimize within-group variation and maximize between-group variation. The Technical Notes provide more information on the data and methods.

DATA SOURCES: STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census

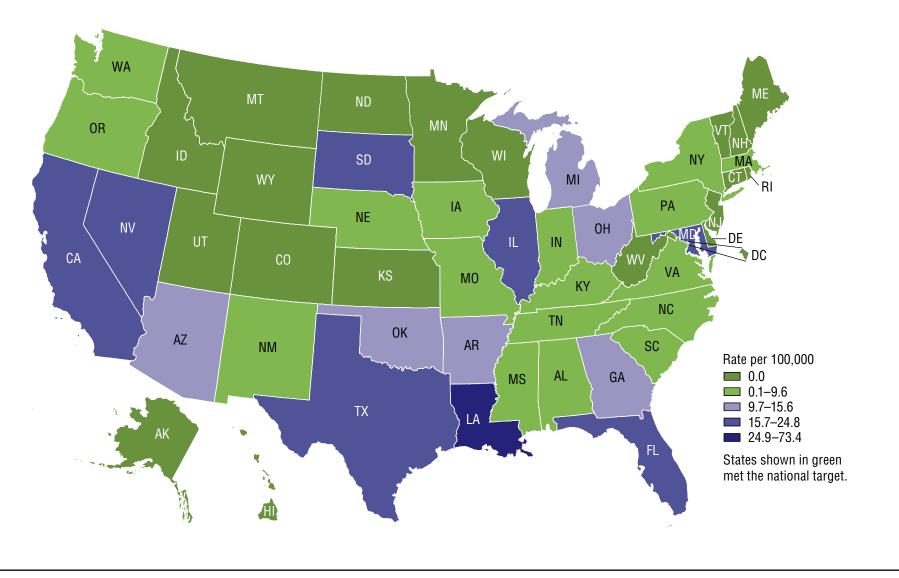# Map 37–2. New Cases of Primary and Secondary Syphilis Among Males, by State: 2014

Healthy People 2020 Objective STD-7.2 ● National Target = 6.7 per 100,000 population ● National Rate = 11.6 per 100,000 population

Rate per 100,000

- 1.2–3.6
- 3.7–6.7
- 6.8–13.0
- 13.1–19.6
- 19.7–34.6

States shown in green met the national target.

NOTES: Data are for individual-level case report data of males with primary and secondary syphilis electronically sent to CDC through the National Electronic Telecommunications System for Surveillance (NETSS) and U.S. Census population data. Data are displayed by a modified Jenks classification for U.S. states which creates categories that minimize within-group variation and maximize between-group variation. The Technical Notes provide more information on the data and methods.

DATA SOURCES: STD Surveillance System (STDSS), CDC/NCHHSTP; Population Estimates, Census

Map 37–3. New Cases of Congenital Syphilis, by State: 2014

Healthy People 2020 Objective STD-8 ● National Target = 9.6 per 100,000 live births ● National Rate = 11.6 per 100,000 live births

Rate per 100,000

- 0.0
- 0.1–9.6
- 9.7–15.6
- 15.7–24.8
- 24.9–73.4

States shown in green met the national target.

NOTES: Data are for new reported cases of congenital syphilis in the past 12 months. Data are displayed by a modified Jenks classification for U.S. states which creates categories that minimize within-group variation and maximize between-group variation. The Technical Notes provide more information on the data and methods.

DATA SOURCES: STD Surveillance System (STDSS), CDC/NCHHSTP; National Vital Statistics System–Natality (NVSS–N), CDC/NCHS