

Chlamydia trachomatis Cases in Clark County

General Chlamydia trachomatis Information

Background

Chlamydia is a sexually transmitted disease (STD) caused by a bacterium that can infect both men and women, potentially causing serious, permanent damage to a women's reproductive organs. Within the United States, chlamydia is the most frequently reported bacterial sexually transmitted infection (STI) with over 1.5 million cases reported in 2016; however, an estimated 2.86 million infections occur annually.

Transmission & Risk

This STD is transmitted person-to-person by having sex with someone who has the infection, "having sex" is defined as either anal, vaginal, or oral sex. It can also be transmitted from an infected woman to her baby during childbirth. An individual once infected with chlamydia can still get infected again if they have sex with an infected person. Any sexually active person is at risk for being infected with chlamydia, especially those who are young. 1 in 15 sexually active females aged 14-19 years has chlamydia.

Untreated chlamydia in pregnant women has been associated with pre-term delivery and can spread to the newborn. It is highly recommended that pregnant women be screened for chlamydia during their first prenatal visit.

Symptoms & Complications

In women, the bacteria first infect the cervix (structure that connects the vagina or birth canal to the uterus or womb) and/or the urethra (urine canal). Some infected women have an abnormal vaginal discharge or a burning sensation when urinating. Untreated infections can spread upward to the uterus and fallopian tubes (tubes that carry fertilized eggs from the ovaries to the uterus), causing pelvic inflammatory disease (PID). PID can be silent or can cause symptoms such as abdominal and pelvic pain. Even if PID causes no symptoms initially, it can lead to infertility (not being able to get pregnant) and other complications later.

Some infected men have discharge from their penis or a burning sensation when urinating. Pain and swelling in one or both testicles (known as "epididymitis") may also occur but is less common. Infection in men is less common than in women. Chlamydia can also infect the rectum in men and women, either through receptive anal sex, or possibly via spread from the cervix and vagina. While these infections often cause no symptoms, they can cause rectal pain, discharge, and/or bleeding (known as "proctitis").

Testing, Diagnosis, Treatment

It is recommended that sexually active persons should get tested for chlamydia, especially if they 1) have genital symptoms, 2) have an oral, anal, vaginal partner who was recently diagnosed with a STD, 3) are a woman 25 and younger or an older woman with chlamydial risk factors, 4) are pregnant, 5) are a

man who has sex with men (MSM) who have receptive anal sex, and/or 6) have multiple partners. HIV-infected sexually active women who are 25 or younger and all HIV-infected patients who engage in receptive anal sex should be tested at their first HIV care visit and at least annually afterwards.

A laboratory test is needed to diagnose chlamydia, such as a vaginal cotton swab or a urine sample. Chlamydia is easily treated and cured with antibiotics (in both infants and adults), persons infected should refrain from having sex for 7 days after single dose antibiotics or until completion of a seven-day course of antibiotics. Repeat infection is common and those who have not been appropriately treated are at high risk for reinfection. Multiple infections increase a women’s risk of serious reproductive health complications. It is recommended that individuals with chlamydia get retested three months after treatment.

More information can be found here: <https://odh.ohio.gov/wps/portal/gov/odh/know-our-programs/infectious-disease-control-manual/section3/section-3-chlamydia>

Clark County Related Discussion

Figure 1 shows the chlamydia cases in Clark County from 2017 to 2021. All cases during this period are classified as confirmed. From 2017 to 2021 there is a 18.5% decrease in cases, and from 2018 to 2021 there is a 20.1% decrease in cases. The decline that has occurred since 2018 could potentially be attributed to the COVID-19 pandemic restrictions that recommended people stay inside, social distance, and maintain a small circle of personal contacts.

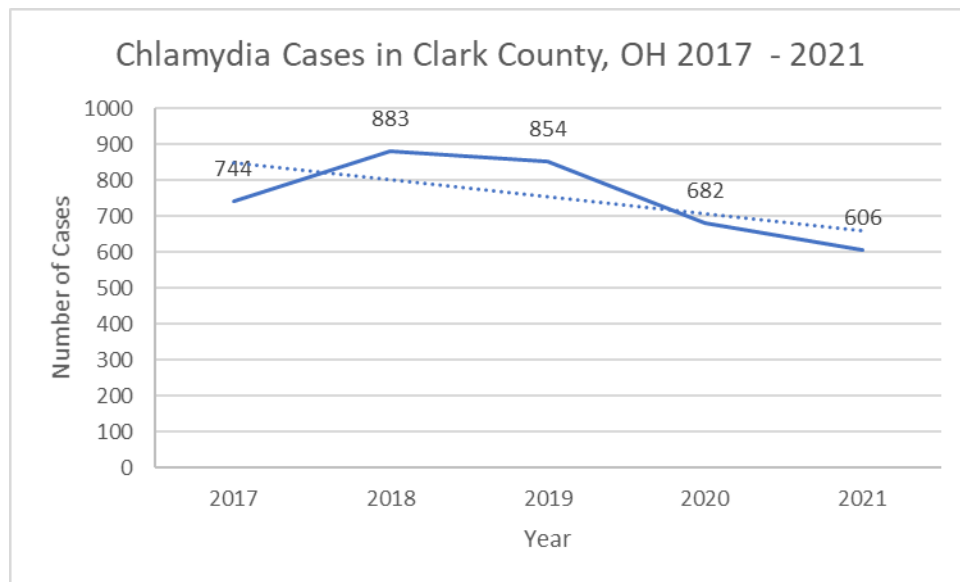


Figure 1 Chlamydia cases 2017-2021

As expected, there are more female cases compared to male cases and Table 1 shows the breakdown of gender per year, including the percent difference between female and male. The percent differences between female and male range from 90.4% to 95.3%.

	Female	Male	% Difference ¹
2017	541	203	90.9%
2018	641	242	90.4%
2019	627	227	93.7%
2020	505	177	96.2%
2021	446	160	94.4%

Table 1 Annual chlamydia cases by sex

When we look at the breakdown by race, there are some disparities that are shown. Those who identify as Black or African American in Clark County comprise 24.1% of cases; however, they make up 9.0% of the population². Those who identify as white comprise 40.8% of cases but are 86.9% of the population. The full racial breakdown can be seen in Table 2. The gender and racial breakdown can be seen in Figure 2. Asian and Native Hawaiian or Pacific Islander were combined into Other on the graph due to small counts.

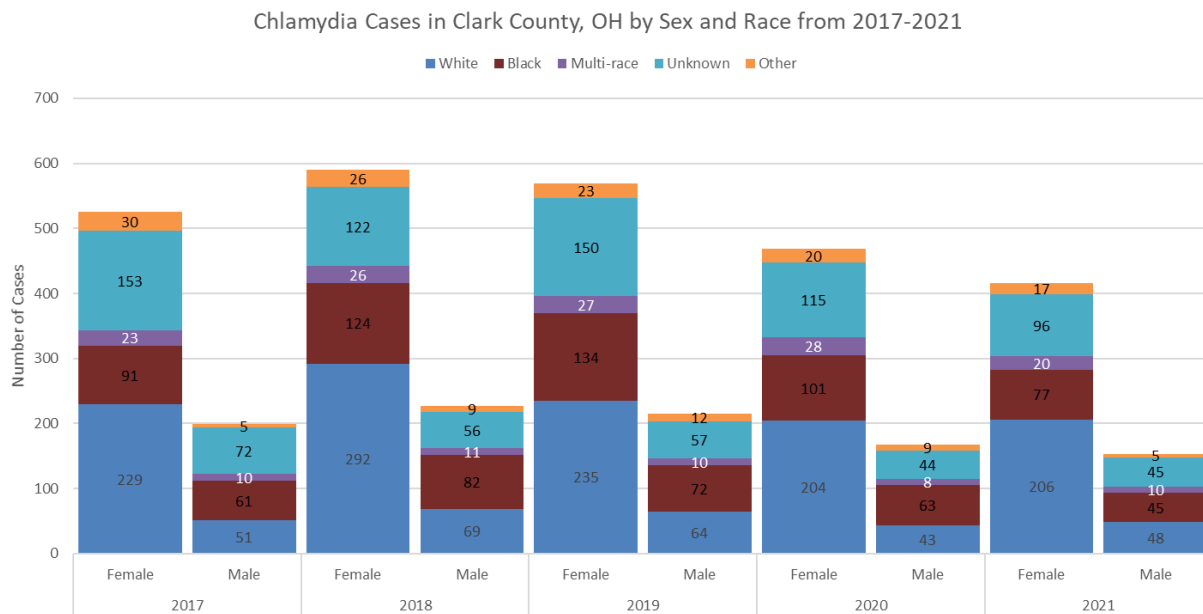


Figure 2 Chlamydia cases by sex and race

¹ Calculated by: $\frac{a-b}{\frac{a+b}{2}} * 100$; a = female, b = male

² Population percentages were gathered from here: <https://www.census.gov/quickfacts/clarkcountyohio>

	% Cases	% Population	% Change ³
White	40.8	86.9	-53.0%
Black or African American	24.1	9.0	167.5%
Asian	0.1	0.7	-79.8%
Native Hawaiian or Pacific Islander	0.1	0.1	0.0%
Multi-Race	4.9	3.0	63.4%
Other	4.2	NA	NA
Unknown	25.8	NA	NA

Table 2 Total chlamydia cases by race

Within Clark County, the highest concentration of cases is within the 0-19 (36.0%) and 20-29 (50.6%) age groups. Females make up a majority of cases in 0-19, 20-29, 30-39, and 40-49. Males make predominantly make up cases in 50-59, 60-69, 70-79, while these age groups do not have as many cases in comparison. Table 3 shows the full breakdown.

Age Group	Female	Male	Total	% Of Cases	% Difference ¹
0-19	1092	265	1357	36.0%	121.9%
20-29	1352	555	1907	50.6%	83.6%
30-39	270	131	401	10.6%	69.3%
40-49	37	34	71	1.9%	8.5%
50-59	7	17	24	0.6%	-83.3%
60-69	1	4	5	0.1%	-120.0%
70-79	1	3	4	0.1%	-100.0%

Table 3 Total chlamydia cases by age group

³ Calculated by: $\frac{a-b}{b} * 100$; a = % cases, b = % population