

Teen Health Brief

Riverside University Health System – Public Health
Epidemiology & Program Evaluation



September 2022

Teen Health, Riverside County, CA

INTRODUCTION

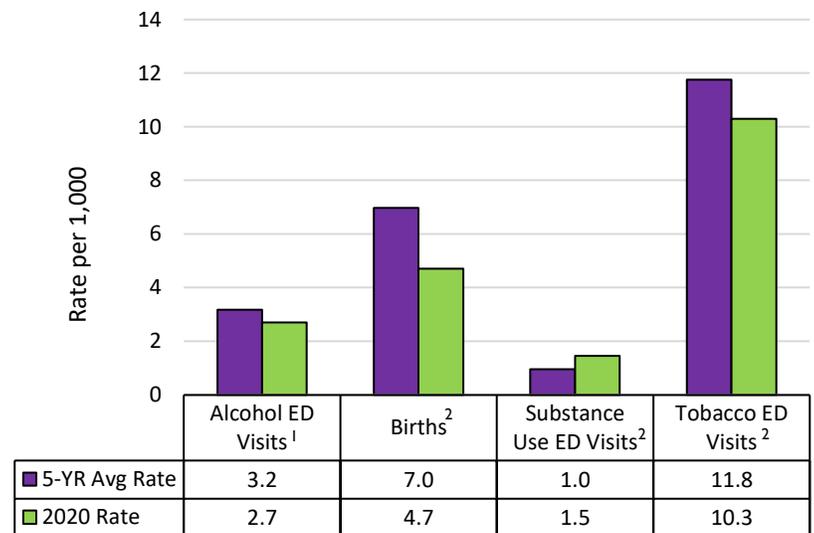
Adolescence and early adulthood is a time when behaviors that can affect current and future health outcomes are shaped. The healthy people objectives for 2030 adolescents include topics of substance use, sexual health, mental health, and injury and violence prevention. This brief will address the current status of sexual and reproductive health, suicide, substance use, alcohol use, and tobacco use for teenagers between the ages of 15-19 in Riverside County, California.

Overview

Key Findings Among Teens

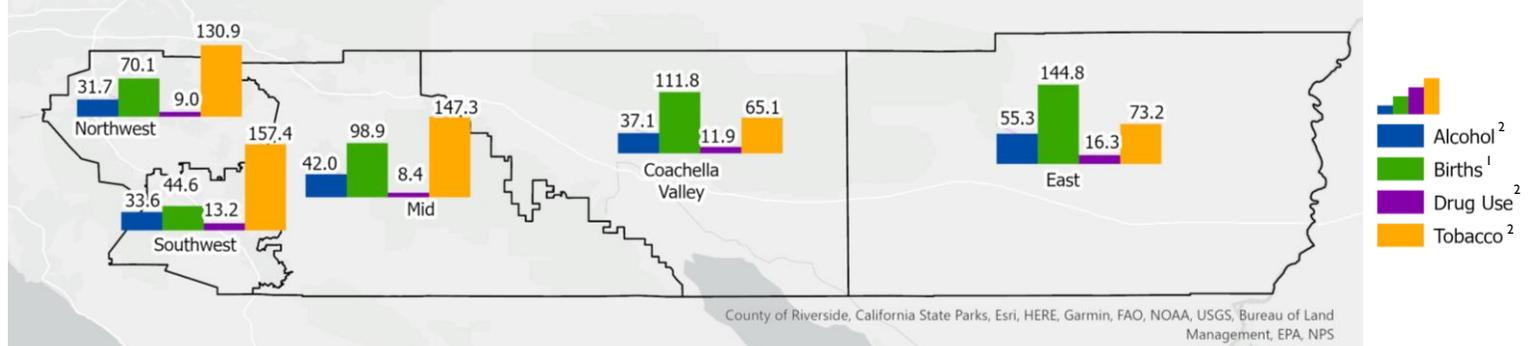
- Teen birth rates for females aged 15-19 decreased 50% from 2016-2020
- On average three STDs were diagnosed each day between 2019 and 2021
- On average, one attempted suicide and three suicidal ideations presented to the ED every day from 2018-2021
- The number of drug-related ED visits increased by 68%, similar to other age groups.
- The number of alcohol-related ED visits decreased by 32% from 2016-2020
- Tobacco use in teens that visited the ED decreased by more than half from 2016 to 2020

Figure 1. Comparison of Teen Health Indicator Rates, Riverside County, CA, 2016-2020



Source: ¹California Department of Public Health, Birth Statistical Master File (Static), 2016-2020. Compiled by Center for Health Statistics and Informatics. ²Department of Health Care Access and Information (HCAI): ED Data, Riverside County, 2016-2020.

Figure 2. Teen Health Indicator Rates by Riverside County Region, CA, 2016-2020



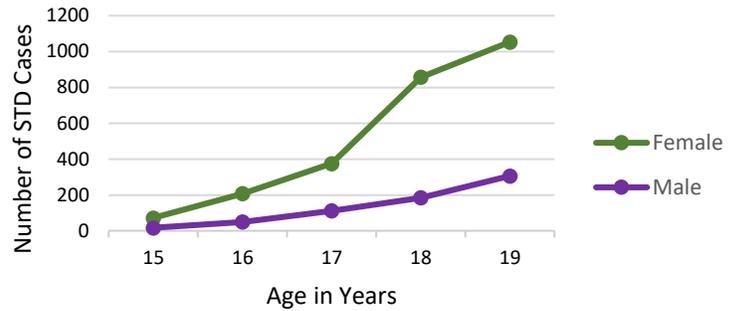
Source: ¹California Department of Public Health, Birth Statistical Master File (Static), 2016-2020. Compiled by Center for Health Statistics and Informatics. ²Department of Health Care Access and Information (HCAI): Patient Discharge Data, Riverside County, 2016-2020.

SEXUAL HEALTH

Positive STD Results in Teens, 2019-2021

Younger people are at greater risk of getting an STD due to low screening, subject avoidance, limit to access, and greater number of sexual partners¹. Young teens, specifically those assigned female at birth, are at greater risk because their bodies are biologically more susceptible to STDs¹. In Riverside County, a total of 3,908 STDs were diagnosed in teens between 2019 and 2021. Females carried the largest burden in comparison to males regardless of age or STD type (Figure 3).

Figure 3. Cumulative Number of STDs in Teens Aged 15-19 by Sex, 2019-2021, Riverside County, CA



Source: California Department of Public Health, California Reportable Disease Information Exchange (CalREDIE), 2019-2021. *Data does not include HIV diagnosis.
 † Due to the binary nature of this data, we are currently unable to provide more inclusive information on gender.



61% (n=43) of all teens diagnosed with syphilis were male



There was a 27% decrease in the number of STDs from 2019 to 2021



One out of every 35 females aged 15-19 were diagnosed with an STD

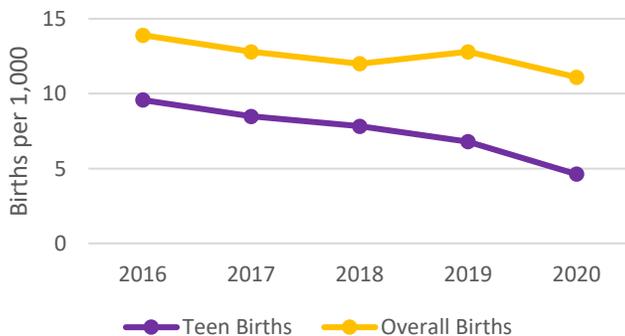


Chlamydia accounted for 83% of all reportable STDs in teens

Teen Births

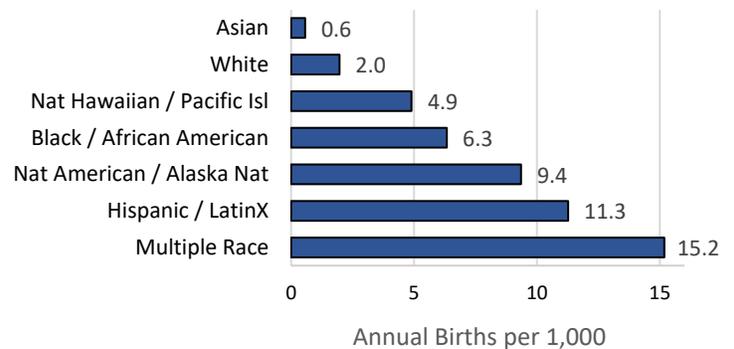
Health, social and educational attainment can be stunted in teens that were pregnant and delivered a baby². Teen parents are more likely to deliver a baby with low birth weight and/or have a preterm delivery². In 2020, there were 5 teen births per 1,000 females aged 15-19 in Riverside County, a rate less than half of that of California³. Like overall births in Riverside County, teen birth rates have continued to drop every year from 2016-2020 with an overall teen birth rate of 9.6 in 2016 and 4.6 in 2020.

Figure 4. Comparison of Annual Birth Rates for Females Aged 15-19 and County Birth Rates, 2016-2020, Riverside County, CA



Source: California Department of Public Health, Birth Statistical Master File (Static), 2016-2020. Compiled by Center for Health Statistics and Informatics.

Figure 5. Teen Birth Rates by Ethnicity, 2016-2020, Riverside County, CA



Source: California Department of Public Health, Birth Statistical Master File (Static), 2016-2020. Compiled by Center for Health Statistics and Informatics.

Teen birth rates have continued to drop every year from 2016-2020 with an overall birth rate of 9.6 in 2016 and 4.6 in 2020



One in 70 female teens between the ages of 15-19 gave birth every year from 2016-2020

Non-Hispanic teens who identified with multiple races were the only group whose birth rate increased from 2016-2020

Hispanic/LatinX accounted for 76% of all teen births between 2016-2020

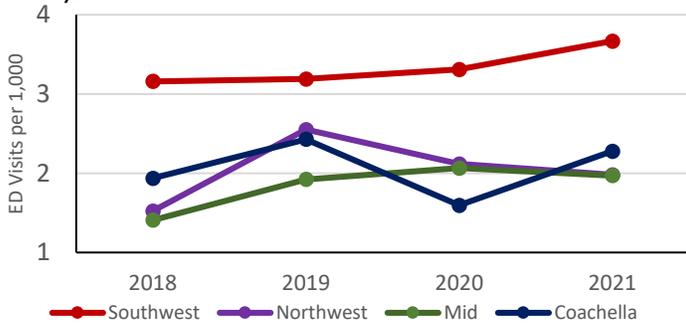
Coachella Valley makes up 16% of the teen population but accounted for 24% of teen births (2016-2020)

SUICIDE

Teen Suicide in Riverside County, 2018-2021

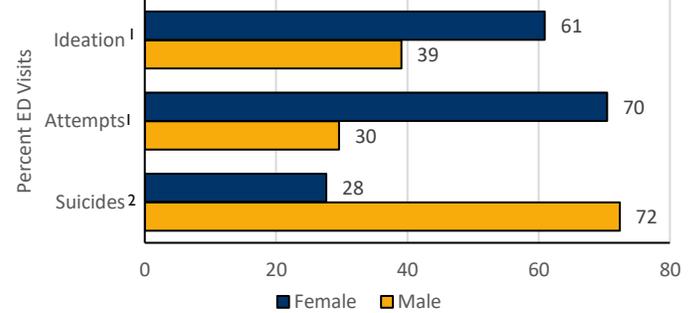
Mental disorders, such as depression, are associated with exposure to violence and aggression, sudden loss, bullying, or impulsive behavior and may lead to suicides or suicidal ideation. In 2020, suicide was the third leading cause of death, behind accidents and assault, in teens and young adults aged 15-19 with a rate of 6.9 per 100,000⁴ in California.

Figure 6. Teen Suicide Attempts by Region, 2018-2021, Riverside County, CA



Source: Electronic Surveillance System for the Early Notification of Community-Based Epidemics (ESSENCE); Riverside County, 2018-2021.

Figure 7. Comparison of the Number of Teen Ideation, Attempts, and Suicides by Sex 2018-2021, Riverside County, CA



Source: ¹Electronic Surveillance System for the Early Notification of Community-Based Epidemics (ESSENCE); Riverside County, 2018-2021. ²California Integrated Vital Records System (Cal-IVRS), Riverside County, 2010-2020. ³Due to the binary nature of this data, we are currently unable to provide more inclusive information on gender.

The Southwest region was the only region in the county that increased in attempted suicides every year from 2018-2021

30% of 11th graders experiencing homelessness in Riverside County considered suicide between 2017-2019, 4% less than the state of California⁶

47%
of LGBTQ+ 9th graders considered suicide in the past 12 months between 2017-2019

Teen females had over 2 times the number of suicide attempts (n=1,042) than teen males (n=438), but males had nearly 3 times more suicides (n=34) than females (n=13)

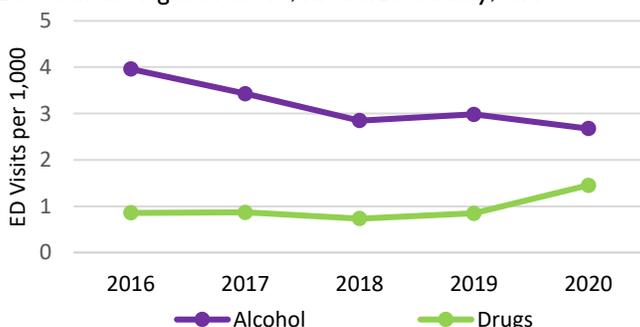
Persons of Asian descent make up 6% of the Riverside County population, yet they accounted for 15% of all suicide deaths from 2018-2021

SUBSTANCE USE

Emergency Department Visits for Drugs and Alcohol, 2016-2020

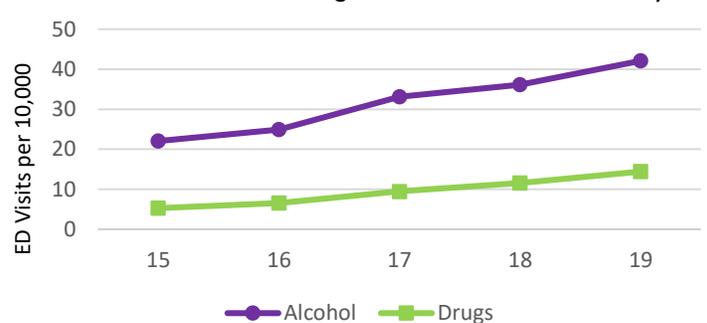
Drug and alcohol use may occur alongside other risky behaviors like unprotected sex and reckless driving⁵. In Riverside County, an average of 563 alcohol-related and 168 drug-related emergency department visits (ED) occurred every year for teens between the ages of 15 and 19. Drug and alcohol-related ED visits increased with age, but alcohol-related ED visits declined over time while drug-related ED visits increased (Figures 8, 9). Teen males had higher ED visit rates than females for both alcohol (352.5 vs 283.9 per 10,000) and drug use (13.2 vs 5.9 per 10,000). The number of unintentional opioid-related ED visits increased from 49 in 2016 to 178 in 2020 (Figure 10).

Figure 8. Drug and Alcohol-Related ED Visit Rates for Teens Between the Ages of 15-19, Riverside County, CA



Source: Department of Health Care Access and Information (HCAI); Patient Discharge Data, Riverside County, 2016-2020.

Figure 9. Drug and Alcohol-Related ED Visit 5-Year Average Rate for Teens Between the ages of 15-19, Riverside County, CA



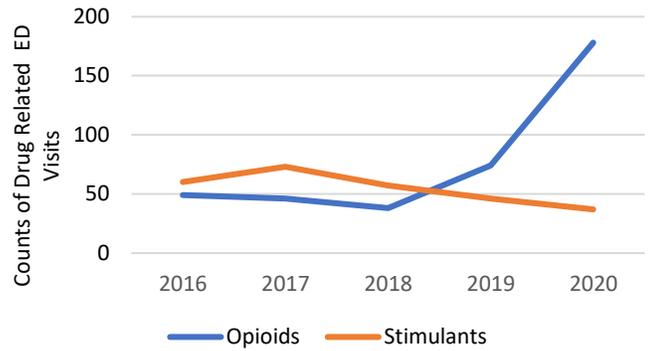
Source: Department of Health Care Access and Information (HCAI); Patient Discharge Data, Riverside County, 2016-2020.

Table I. Average Annual Unintentional Drug and Alcohol ED Visits for Teenagers Between the Ages of 15-19 by Race/Ethnicity, Riverside County, CA, 2016-2020

	Alcohol-Related ED Visits per 10,000	Drug-Related ED Visits per 10,000
Asian	10.1	*
Black / African American	34.7	9.5
Hispanic / Latinx	38.0	9.7
Native American / Alaska Native	27.4	*
Native Hawaiian / Pacific Islander	20.4	0
White	23.8	10.5

Source: Department of Health Care Access and Information (HCAI): Patient Discharge Data, Riverside County, 2016-2020.

Figure 10. Count of Unintentional Drug-Related ED Visits for Teens Aged 15-19 Over Time by Opioids and Stimulants, Riverside County, CA



Source: Department of Health Care Access and Information (HCAI): Patient Discharge Data, Riverside County, 2016-2020.

62% of students experiencing homelessness that attended non-traditional schools reported drug or alcohol use⁶



29%
of all students in continuation school reported alcohol or drug use, 7% higher than all students enrolled in 11th grade⁶

Teens identifying as LGBTQ+ reported higher proportions of alcohol and drug use for every grade level than those identifying as straight/heterosexual or unsure⁶

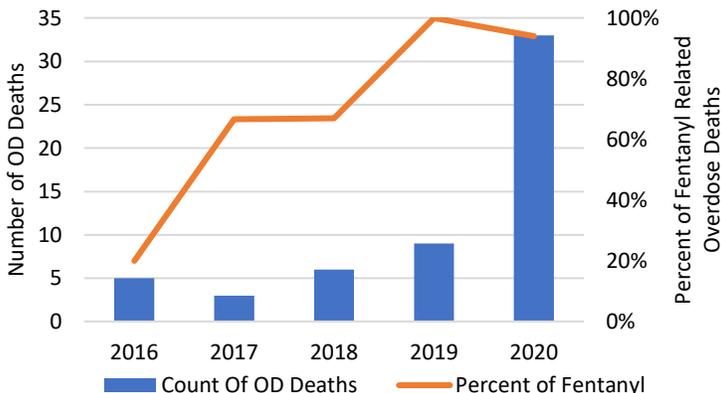
Teens aged 19 years old had 180% more ED visits relating to drug use and 97% more ED visits for alcohol use than 15-year-olds

ED rates for drug use were more than 2 times higher in males (13.2 per 10,000) than in females

Unintentional Drug Overdose Mortality, 2016-2020

Throughout the county, unintentional overdose deaths increased from 9 in 2019 to 33 in 2020; 94% of unintentional overdose deaths in 2020 involved fentanyl. The percentage of fentanyl overdose-related deaths among youth have increased over time, accounting for 20% (n=1) of all overdose deaths (n=5) in 2016 to 95% (n=31) in 2020 (Figure 11). From 2016 to 2020 most overdose deaths were related to fentanyl polysubstance (45%).

Figure 11. Unintentional OD Deaths and Percent of Fentanyl Related Deaths for Teens Aged 15-19 Over Time, Riverside County, CA



Source: Department of Health Care Access and Information (HCAI): Patient Discharge Data, Riverside County, 2016-2020.

Table 2. Comparison of the Cumulative Number of Overdose Deaths for Teens Aged 15-19 by Riverside County Region, CA 2016-2020

	Counts	Percent
Coachella Valley	14	25%
East	0	0%
Mid	2	4%
Northwest	30	54%
Southwest	10	18%
Total	56	100%

Source: Department of Health Care Access and Information (HCAI): Patient Discharge Data, Riverside County, 2016-2020.

Tobacco Use, 2016-2020

Tobacco is one of the most common substances used by adolescents. It is estimated that four in ten 9th-12th grade students in the U.S. report having tried cigarettes⁵. In Riverside County, an average of 70 teens visited the emergency department (ED) each year due to lung complications of smoking e-cigarettes and an average of 1,702 teens were diagnosed with dependence to tobacco each year at an ED. However, the number of teens reporting tobacco use in the ED decreased by more than half from 2016 (n=469) to 2020 (n=202). Overall, males had a higher rate of ED visits relating to use, dependence or complications than females of the same age, but the ED visit rates increased for all teens as age increased (Figure 12). In this section, a tobacco-related ED visit refers to a visit in which a patient was indicated to use, be dependent on, or have lung complications due to the use of tobacco products.



Tobacco-related ED visit rates were nearly 9 times higher in 19-year-old males than 15-year-old males

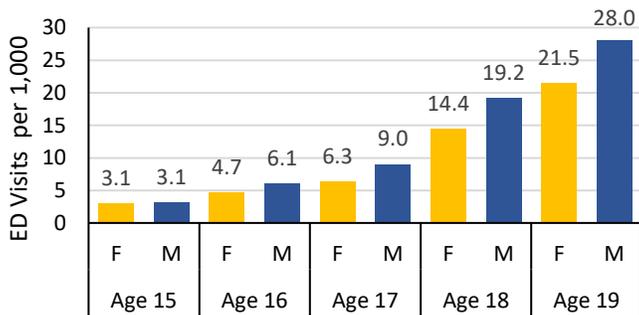


40% of teens experiencing homelessness attending continuation school reported smoking⁶



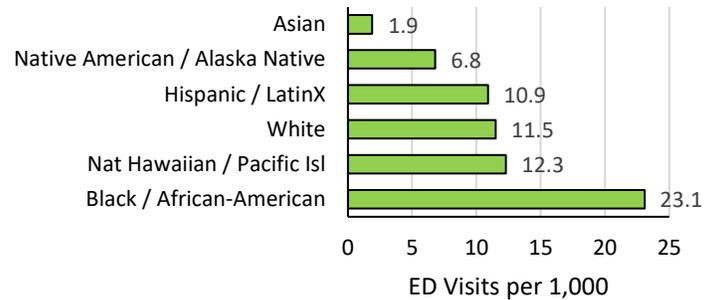
15% of LGBTQ+ teens in continuation school reported smoking, 5% higher than the state of California⁶

Figure 12. Comparison of 5-Year Tobacco-Related ED Visit Rate by Age and Sex, Riverside County, CA, 2016-2020



Source: Department of Health Care Access and Information (HCAI): Patient Discharge Data, Riverside County, 2016-2020.
 *Due to the binary nature of this data, we are currently unable to provide more inclusive information on gender.

Figure 13. Comparison of 5-Year Tobacco-Related ED Visit Rates of Teenagers Aged 15-19 by Race/Ethnicity, Riverside County, CA, 2016-2020



Source: Department of Health Care Access and Information (HCAI): Patient Discharge Data, Riverside County, 2016-2020.

Some current data sources only provide gender as binary; RUHS – Public Health fully supports the collection, analysis, and display of gender identity data. We continue to work with partners and advocate for the collection of this data for future reporting.

Suggested Citation: Abouazra, I., Curlee, E., Ruedas, G. Teen Health 2022. Riverside University Health System-Public Health, Epidemiology Program Evaluation.

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