

Introduction and Highlights

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STATUS REPORT ON MISSOURI'S SUBSTANCE USE AND MENTAL HEALTH

Twenty-fifth Edition -- 2019



MISSOURI DEPARTMENT OF MENTAL HEALTH
Division of Behavioral Health

STATUS REPORT ON MISSOURI'S SUBSTANCE USE AND MENTAL HEALTH

TWENTY-FIFTH EDITION — 2019

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FOREWORD

An estimated 925,000 Missouri adults over age 18 experienced some form of mental illness in the past year—one-fifth of our adult population. Among these are 226,000 with serious mental illnesses that substantially limit their major life activities. In addition, Missouri has 17,000 adolescents and 353,000 adults with harmful and disruptive substance use disorders.

An important part of our mission is to develop and manage effective treatment services for individuals with mental and substance use disorders, and to support community education and prevention programs that reduce the need for those services. Prior to the inception of the Status Report in 1994, the Missouri Advisory Council on Alcohol and Drug Abuse adopted an Operational Plan that included several prevention and treatment objectives. One priority project was the development of an annual and consistent data set to assist communities and stakeholders to address, monitor, and prevent substance use and related disorders. Now in its 25th year, the Status Report continues to assemble national, state, and county behavioral and mental health data and examine trends.

Data from previous Status Reports and other sources are available to query in the Missouri Behavioral Health Data archive. Visit <https://seow.dmh.mo.gov/>. Please direct inquiries and comments regarding these data products to the Division's Research and Statistics office at dbhmail@dmh.mo.gov.

Sincerely,

A handwritten signature in black ink, appearing to read "Richard N. Gowdy".

Richard N. Gowdy, Ph.D.

ACKNOWLEDGMENTS

The Missouri Department of Mental Health, Division of Behavioral Health would like to thank the following individuals and their agencies for providing data during the past year for this 2019 edition of the Status Report:

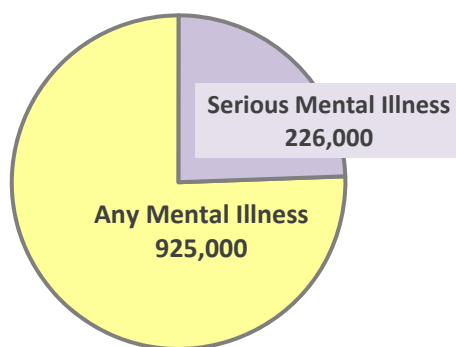
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DATA HIGHLIGHTS

MENTAL DISORDERS

State-level estimates from the National Survey on Drug Use and Health (NSDUH) highlight Missouri adults with mental health disorders, based on a recent two-year reporting period. The NSDUH indicates that 20% of Missouri’s adult population—925,000 residents—had a mental illness in the past year, compared to 18% in the previous study. Missouri’s estimated rates of past-year mental illness were higher among young adults than for those over age 25, and rates for Missouri’s adults older than 25 were higher than U.S. rates.

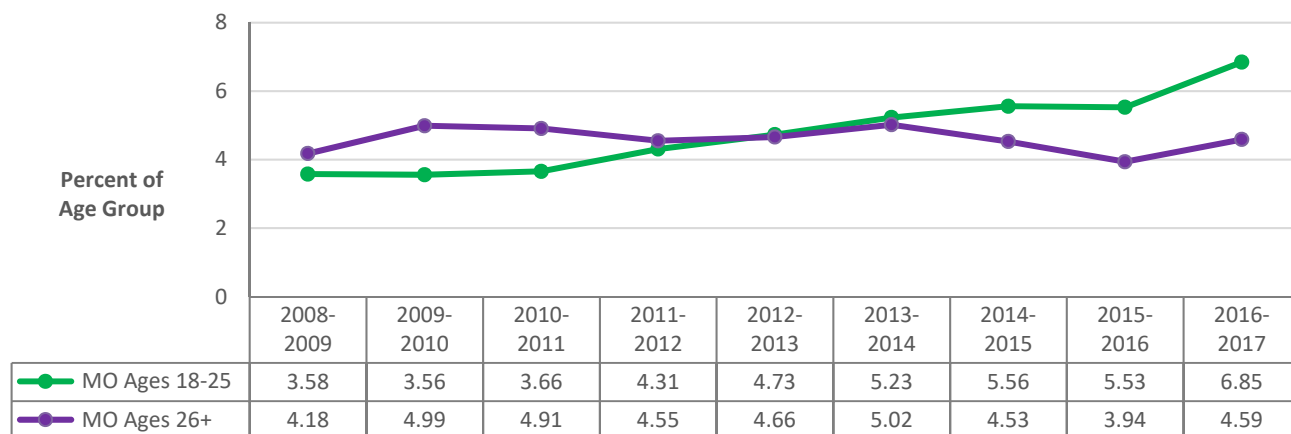
Figure 1: Estimated Number of Missouri Adults with Past-Year Mental Illness



Data Source: U.S. Substance Abuse and Mental Health Services Administration (SAMHSA): National Survey on Drug Use and Health, 2016-2017. Adolescents 12-17 years of age are not included in the survey questions assessing mental illness.

An estimated 226,000—nearly 5% of Missouri adults—had serious mental illness during the past year. Serious mental illness (SMI) pertains to adults who have a diagnosable mental, behavioral, or emotional disorder with serious impairment that substantially interferes with important life activities. Major depression, bipolar mood, and schizophrenia comprise most of the SMI disorders. According to the NSDUH, during the past eight years the percentage of young adults with SMI has increased alarmingly nationwide. The latest survey indicates nearly 7% of Missouri adults 18-25 years of age had a past-year serious mental illness.

Figure 2: Trend in Rates of Serious Mental Illness among Missouri Adults

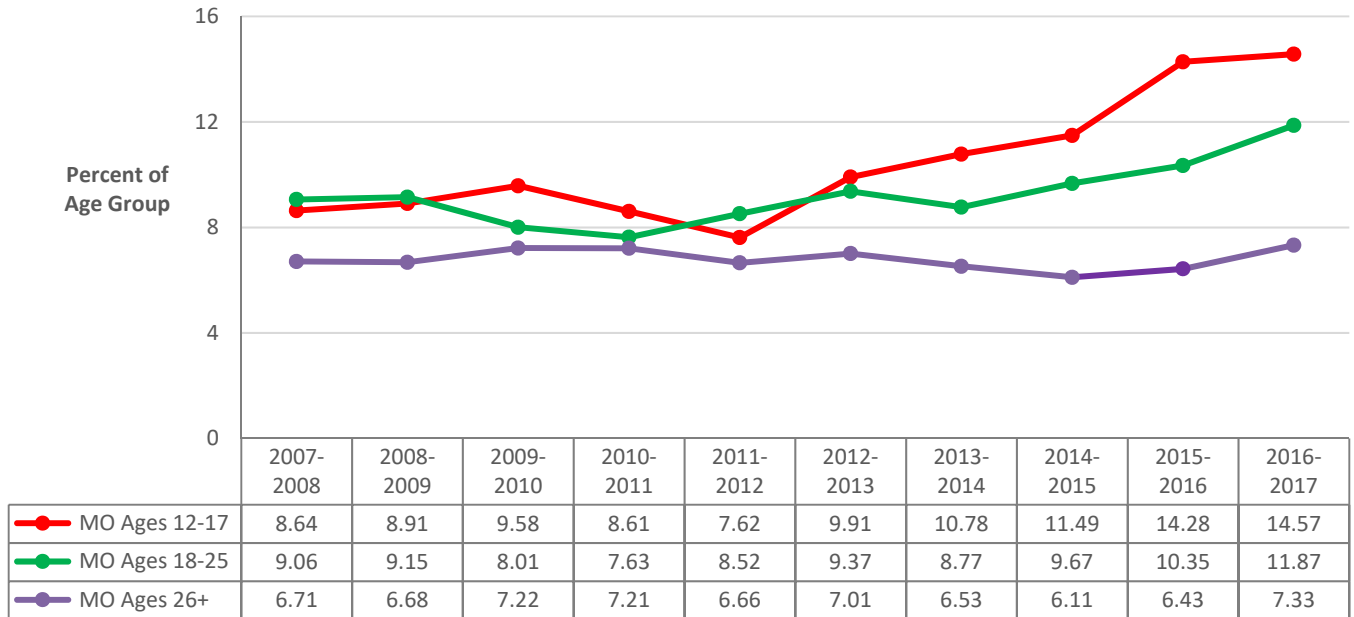


Data Source: SAMHSA: National Survey on Drug Use and Health.

DEPRESSION

Major depression accounts for some of the increase in serious mental illness. The NSDUH indicates that 367,000 Missouri adults and 68,000 adolescents had a major depressive episode (MDE) in the past year. The adolescent rate of MDE has increased each of the past five years, reaching 14.5% and surpassing the national rate of 13%.

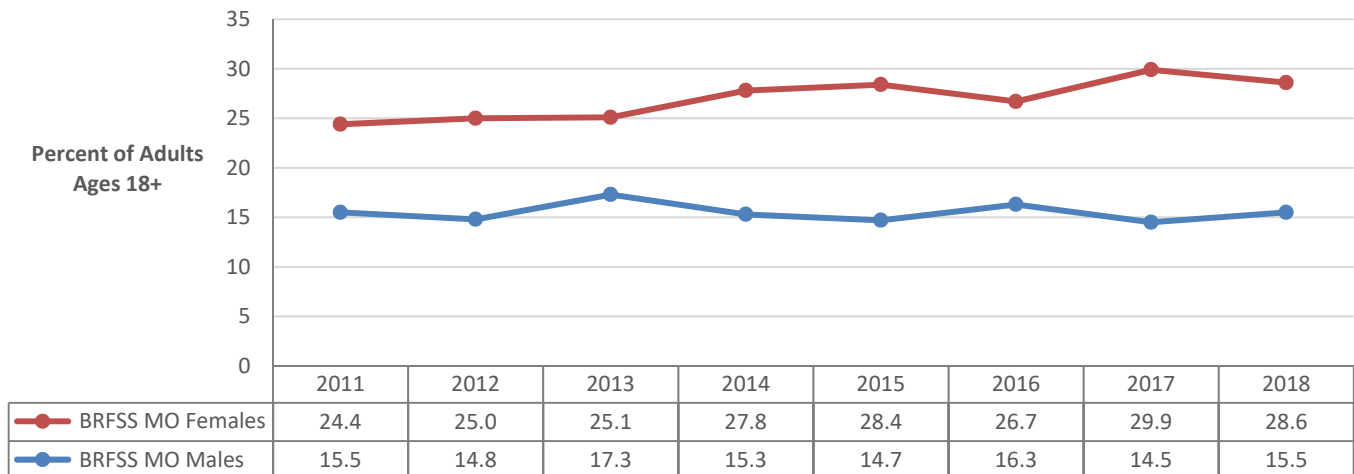
Figure 3: Trend in Rates of Past-year Major Depressive Episodes among Missouri Residents



Data Source: SAMHSA: National Survey on Drug Use and Health.

According to NSDUH estimates, rates of past-year major depression among Missouri residents have generally been higher than U.S. rates. Similarly, the Behavioral Risk Factor Surveillance System (BRFSS) indicates that Missouri's rates for lifetime depressive disorder have consistently been higher than the national median. The Missouri rates are considerably higher for females than for males.

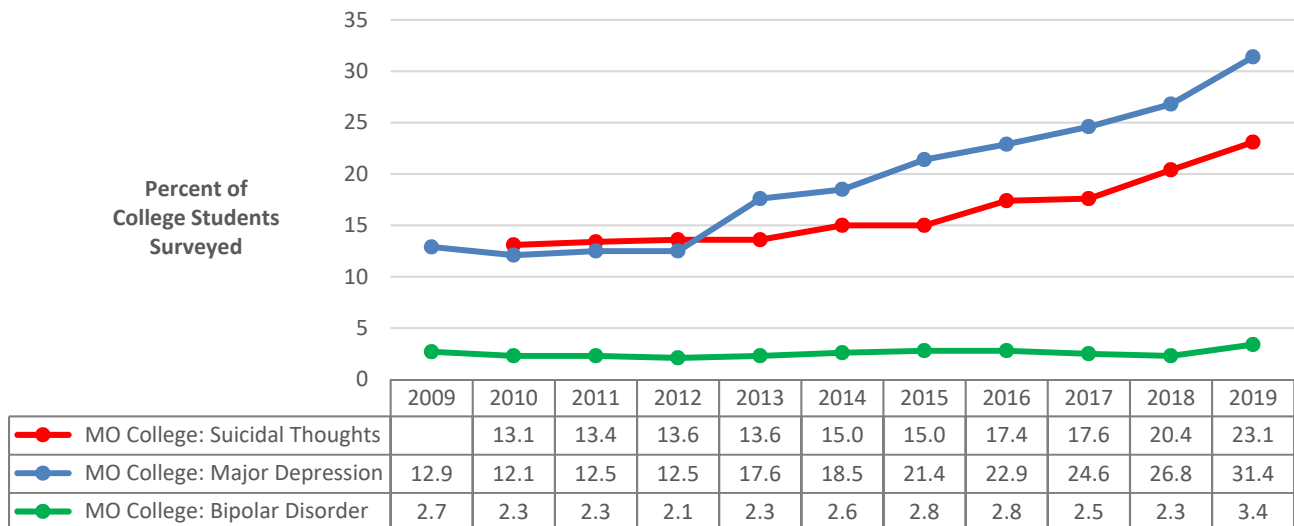
Figure 4: Trend in Rates of Past-year Major Depressive Episodes among Missouri Residents



Data Source: Centers for Disease Control and Prevention: Behavior Risk Factor Surveillance System.

In 2019, more than 31% of students completing the Missouri Assessment for College Health Behaviors (MACHB) survey experienced past-year major depression, compared to only 13% a decade earlier. Two-thirds of these students sought assistance for their depression. Almost one-fourth of the surveyed students indicated they had suicidal thoughts in the past year.

Figure 5: Trend in Rates of Past-year Mental Disorders among Missouri College Students

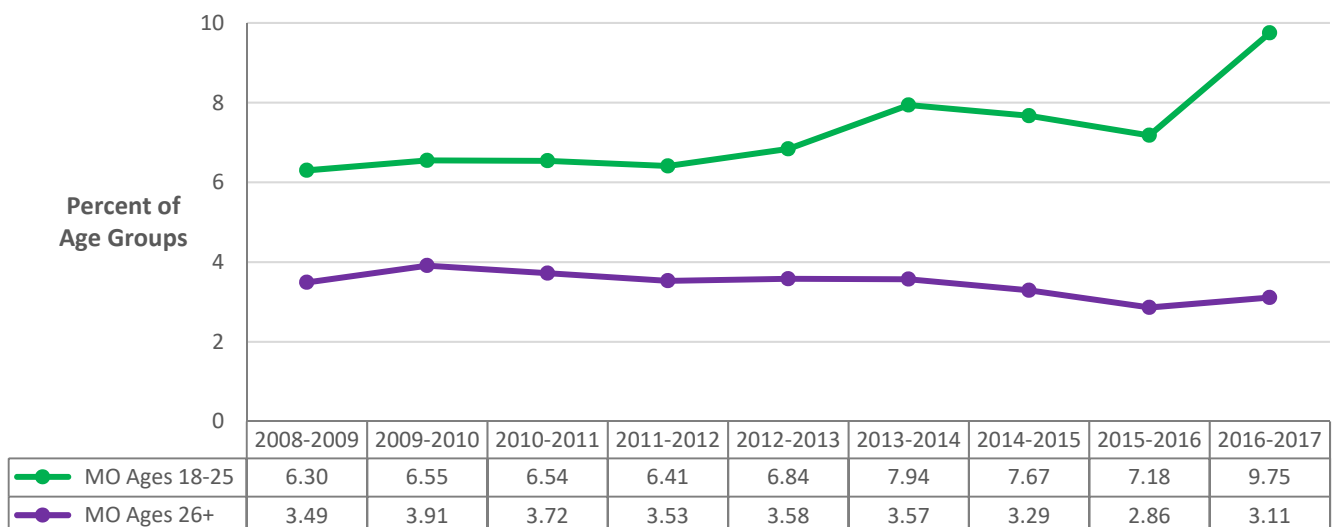


Source: Partners in Prevention Statewide Coalition, University of Missouri: Missouri Assessment of College Health Behaviors.

SUICIDE

An estimated 186,000 Missouri adults had serious suicidal thoughts in the past year. While rates of suicide ideation among older adults have remained below 4% during the past several years, rates for adults 18-25 years of age have increased to nearly 10% in the most recent survey.

Figure 6: Trend in Rates of Past-year Serious Thoughts of Suicide among Missouri Adults

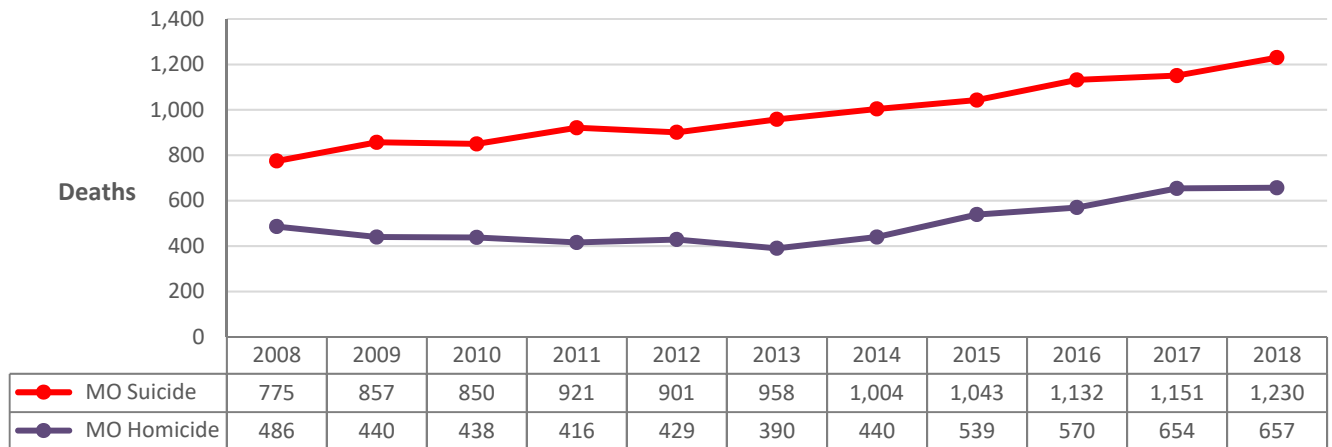


Data Source: SAMHSA: National Survey on Drug Use and Health.

In the 2018 Missouri Student Survey, 14% of youth in grades 6-12 reported they seriously considered suicide in the past year, 11% made a plan, and 6% actually made a suicide attempt. Among college students surveyed in the 2019 MACHB, 23% reported past-year suicidal thoughts and 1.8% attempted suicide.

During the past 10 years, the rate of Missouri deaths due to suicide increased from 13.1 per 100,000 population in 2008 to 20.1 per 100,000 in 2018. During that same period, the homicide rate increased from 8.2 to 10.7 per 100,000 population.

Figure 7: Trend in Deaths among Missouri Residents Due to Suicide and Homicide



Data Source: Missouri Department of Health and Senior Services.

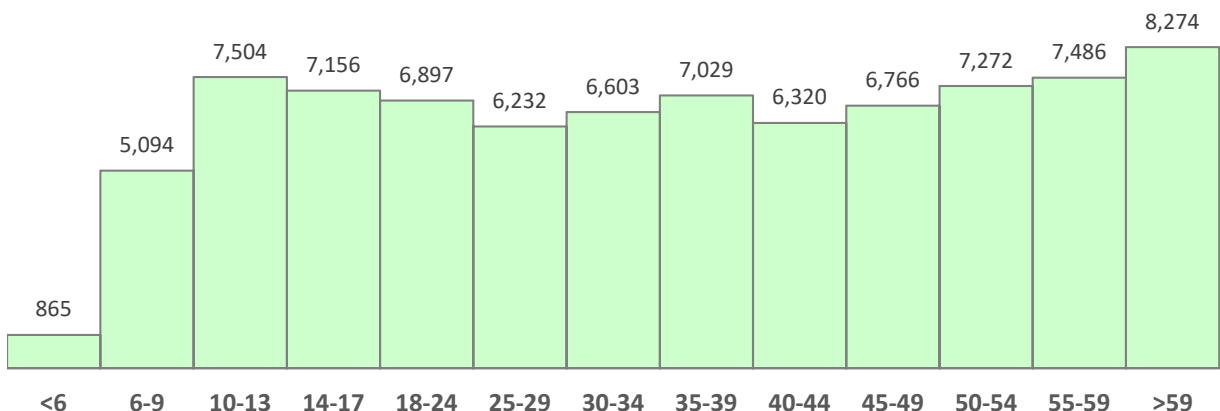
MENTAL HEALTH EMERGENCIES

In 2017, more than 66,000 Missouri residents who entered hospital emergency rooms had a mental disorder primary diagnosis according to medical coding. Among these were approximately 43,000 with a disorder classifiable as serious mental illness (SMI). Additionally, more than 284,000 individuals who received emergency room services in 2017 had a mental disorder secondary diagnosis.

SPECIALIZED TREATMENT FOR MENTAL HEALTH DISORDERS

In state fiscal year 2019, mental health centers funded by the Division of Behavioral Health (DBH) provided mental illness treatment services to more than 83,000 Missouri residents—approximately 43,000 females and 40,000 males. They included more than 20,000 children and adolescents and nearly 63,000 adults.

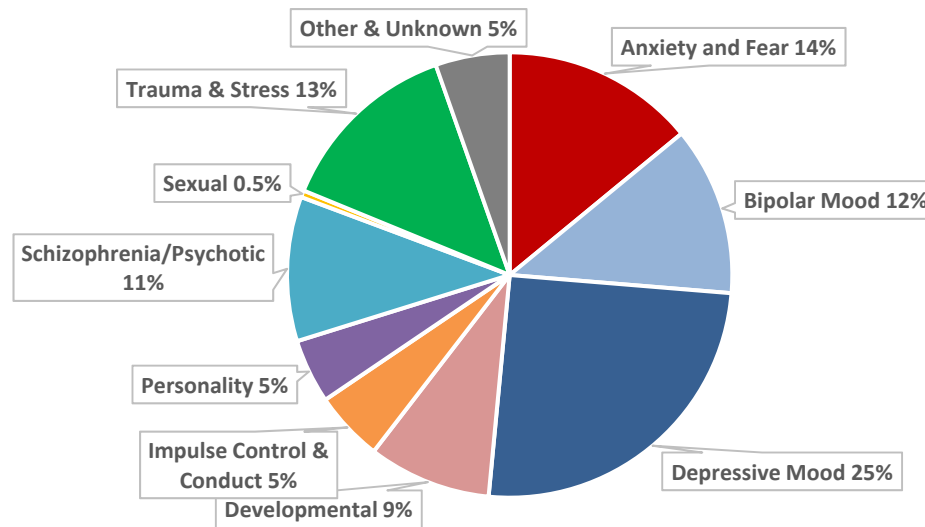
Figure 8: Mental Health Treatment Recipients by Age Group, Fiscal Year 2019



Data Source: Missouri Department of Mental Health: Customer Information Management, Outcomes & Reporting system.

The 83,000 individuals who received services in FY2019 had more than 142,000 diagnosed mental disorders. Mood disorders accounted for over one-third of the diagnoses.

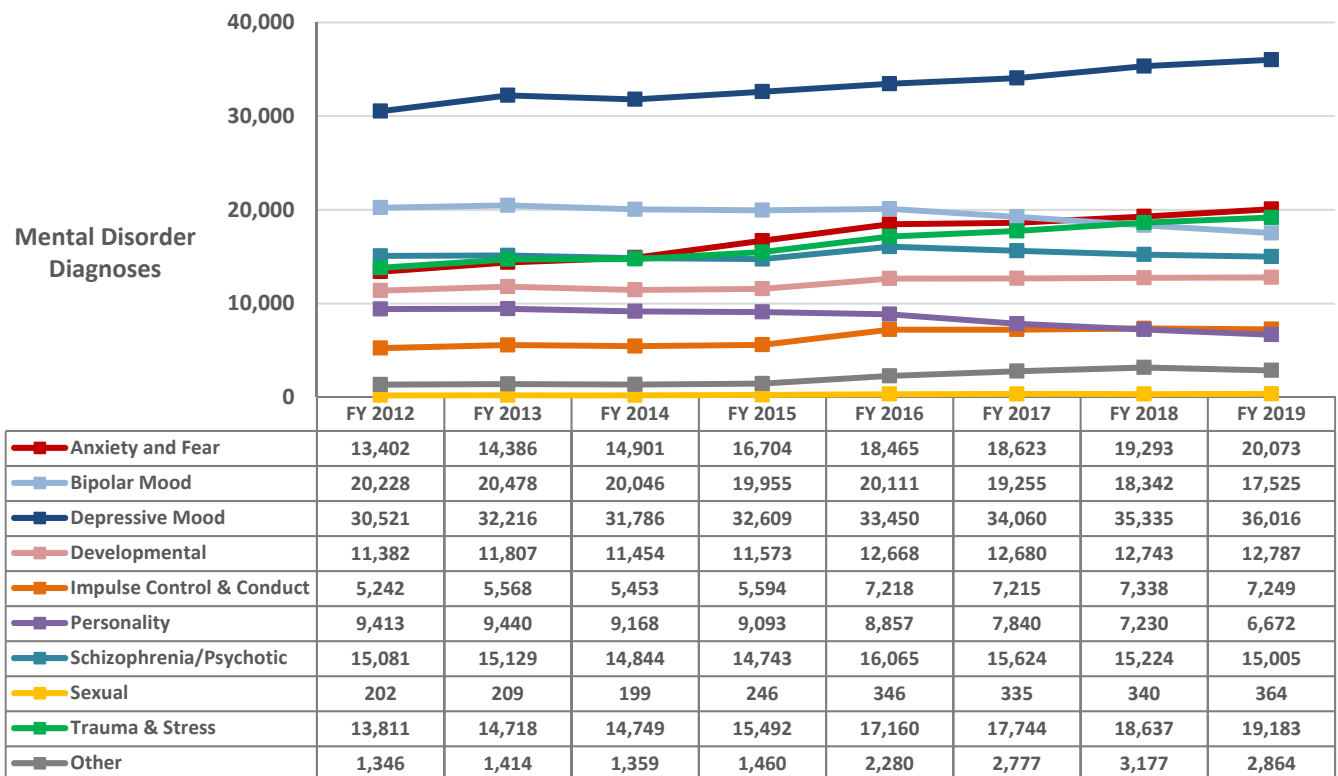
Figure 9: Diagnosis Categories of Individuals Treated for Mental Illness in DBH-Funded Programs in FY2019



Data Source: Missouri Department of Mental Health: Customer Information Management, Outcomes & Reporting system.

The number of individuals treated for anxiety and fear disorders increased 50% between state fiscal years 2012 and 2019. Other notable increases were the numbers treated for trauma and stress, impulse control and conduct, and depressive mood disorders.

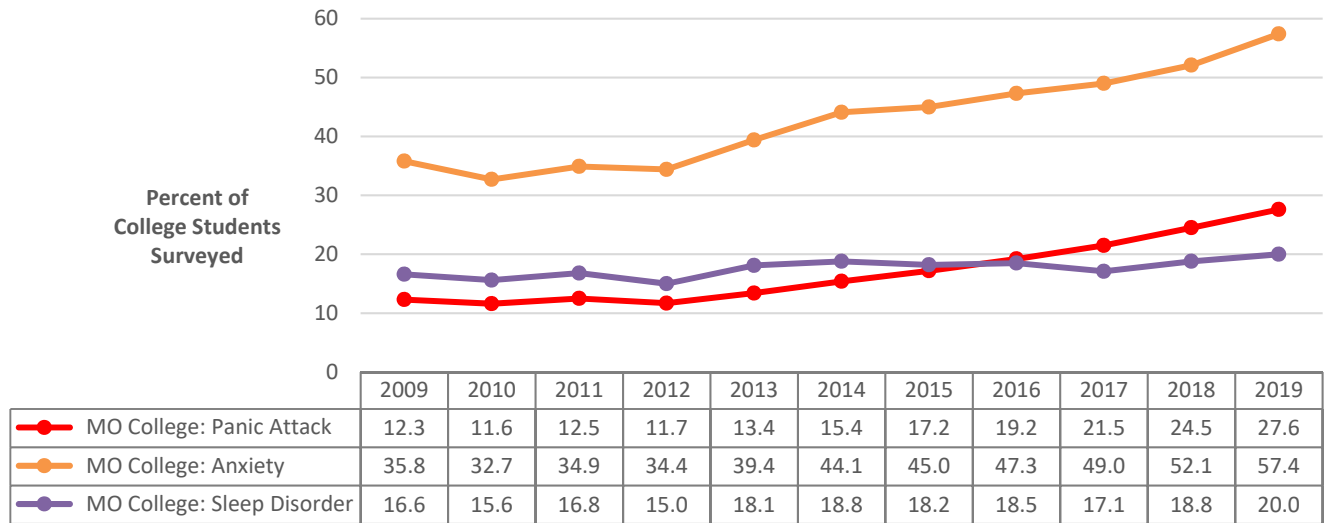
Figure 10: Trends in Disorders Treated in DBH-Funded Programs



Data Source: Missouri Department of Mental Health: Customer Information Management, Outcomes & Reporting system.

The percentage of Missouri college students who experienced past-year panic attacks more than doubled from 12.3% in 2009 to 27.6% in 2019.

Figure 11: Anxiety, Panic, and Sleep Disorders among Missouri College Students.



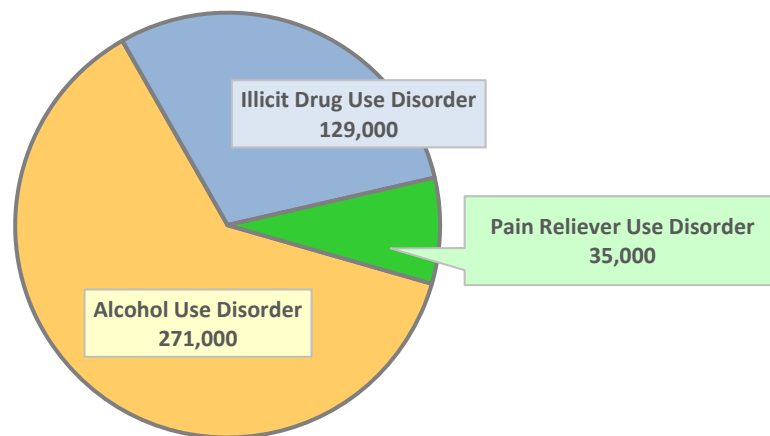
Data Source: Partners in Prevention Statewide Coalition, University of Missouri, Columbia, MO. Missouri Assessment of College Health Behaviors.

SUBSTANCE USE DISORDERS

Estimates from the NSDUH indicate more than 7% of Missouri’s population 12 years of age and older—371,000—had a past-year substance use disorder (SUD). As with mental disorders, substance use disorders negatively affect important life functions, responsibilities, safety, or health. Estimates are available for three categories of substance use disorders: alcohol, illicit drugs, and pain relievers. Alcohol use disorders are the chief substance disorder. The NSDUH estimates 271,000 residents had alcohol use disorders in the past year. Additionally, 129,000 Missouri residents had illicit drug use disorders and 35,000 had disorders resulting from pain reliever use. The three categories total more than the overall SUD estimate because some individuals have disorders involving more than one type of substance.

Figure 12: Estimated Number of Missouri Residents with Past-year Substance Use Disorders

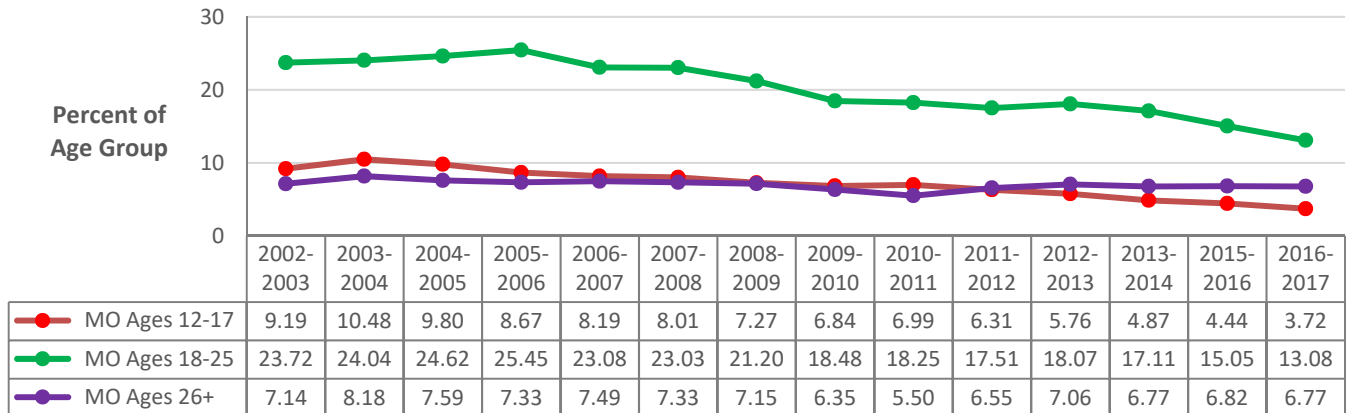
371,000 Missouri Residents with Substance Use Disorders



Data Source: SAMHSA: National Survey on Drug Use and Health, 2016-2017.

The estimated number of Missouri residents with a substance use disorder has gradually declined from the peak estimate of 499,000 in 2004. Most of this decline has been in the adolescent and young adult populations. The SUD estimate for adolescents decreased from 10.5% in the 2003-2004 NSDUH to 3.7% in 2016-2017. During that period, the rate for young adults dropped from 24% to about 13%. Among adults older than age 25, the SUD rate has hovered around 7% for longer than a decade.

Figure 13: Trend in Rates of Substance Use Disorders among Missouri Residents

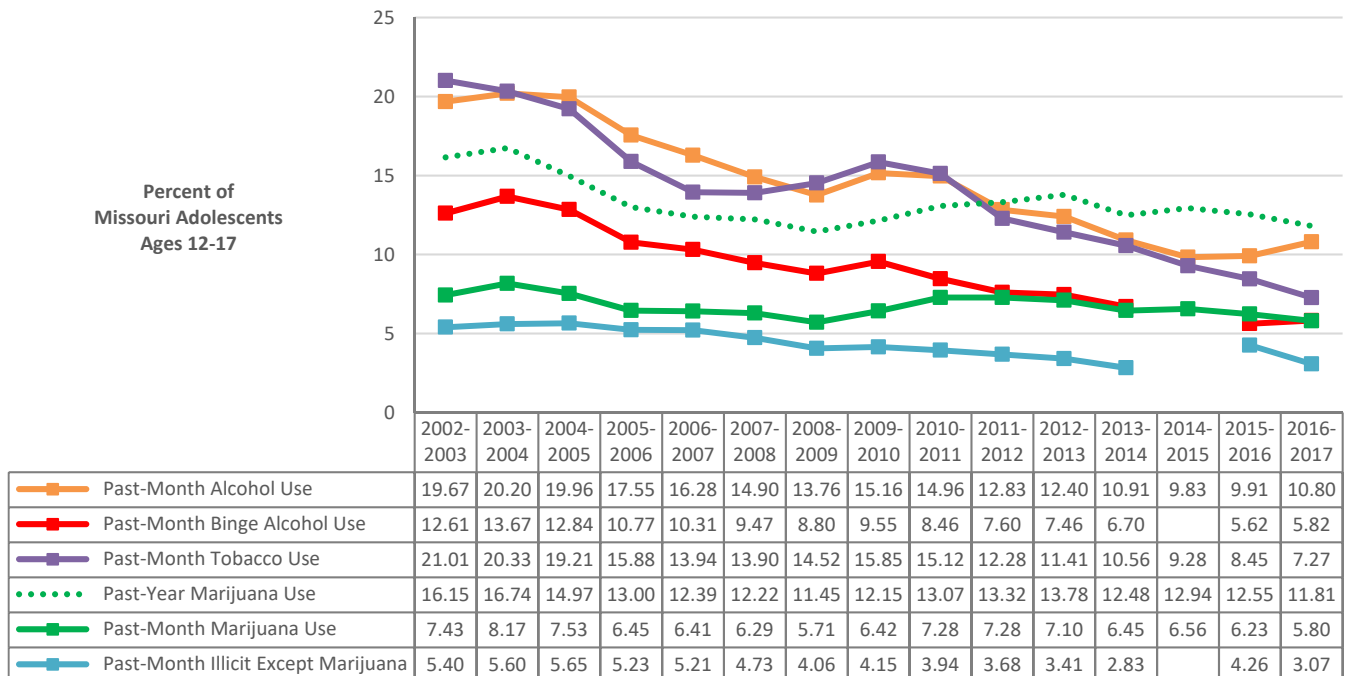


Data Source: SAMHSA: National Survey on Drug Use and Health.

SUBSTANCE USE AMONG ADOLESCENTS

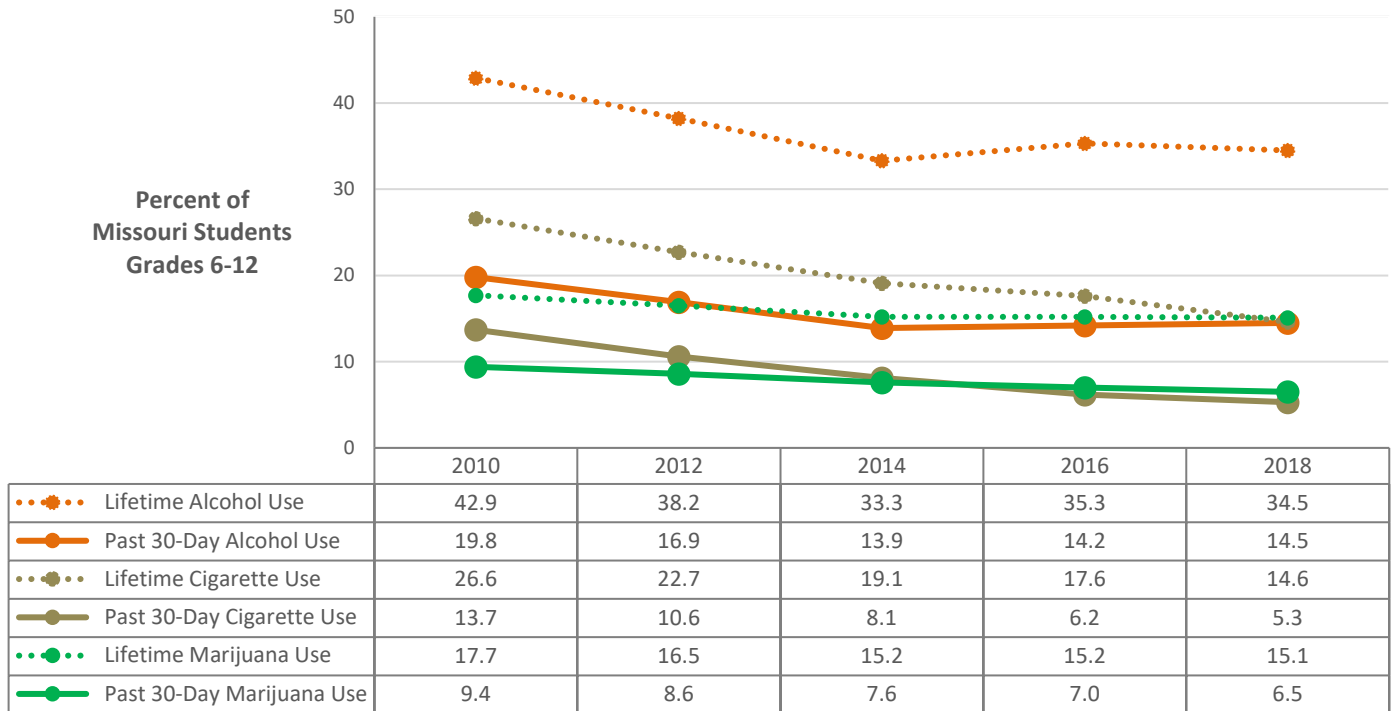
Over the past decade, the decrease in Missouri adolescent substance use disorders has included decreases in both alcohol and illicit drug use disorders. Rates for most substances have continued to decline. Past-month alcohol use appears to increase slightly in the 2016-2017 NSDUH and the 2018 Missouri Student Survey, while continuing to decline in the 2017 Youth Risk Behavior Survey.

Figure 14: Trend in Substance Use among Missouri Adolescents



Data Source: SAMHSA: National Survey on Drug Use and Health.

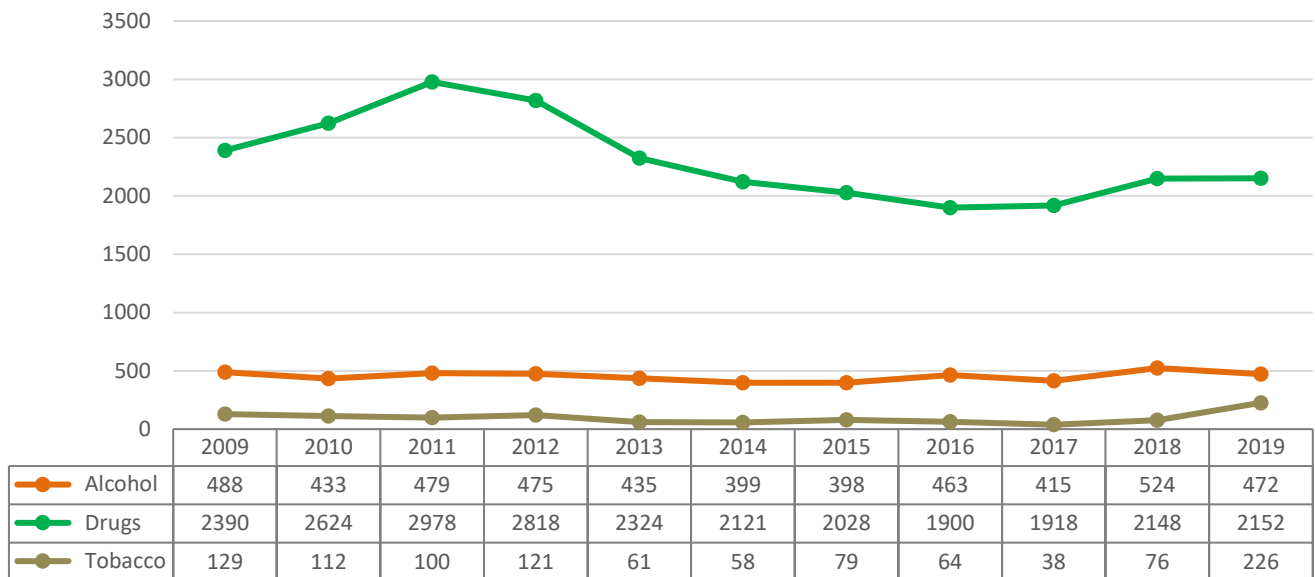
Figure 15: Trend in Substance Use among Missouri Secondary School Students



Data Source: Missouri Institute of Mental Health: Missouri Student Survey.

Despite the decline in the percentage of secondary school students who are using substances, Missouri public schools reported that more than 2,800 students were disciplined for violations of substance-related laws or school policies during the 2018-2019 school year. The number of drug discipline incidents has averaged 2,300 annually during the past 10 years while reported alcohol violations have averaged 450. Disciplinary action related to tobacco use has seen a recent upturn, presumably due to an increase in youth vaping.

Figure 16: Public School Discipline Incidents involving Substance Use

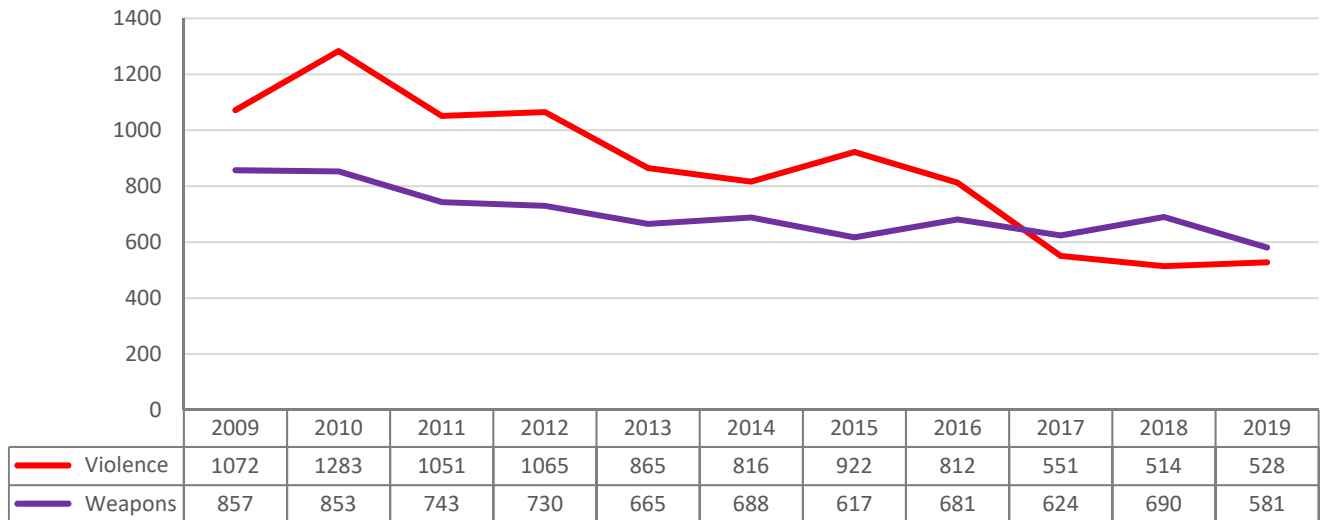


Data Source: Missouri Department of Elementary and Secondary Education.

STUDENT VIOLENCE

Schools discipline incidents related to violent behavior have declined 50% during the past 10 years, while weapons offenses have declined 30%.

Figure 17: Public School Discipline Incidents involving Weapons and Violence

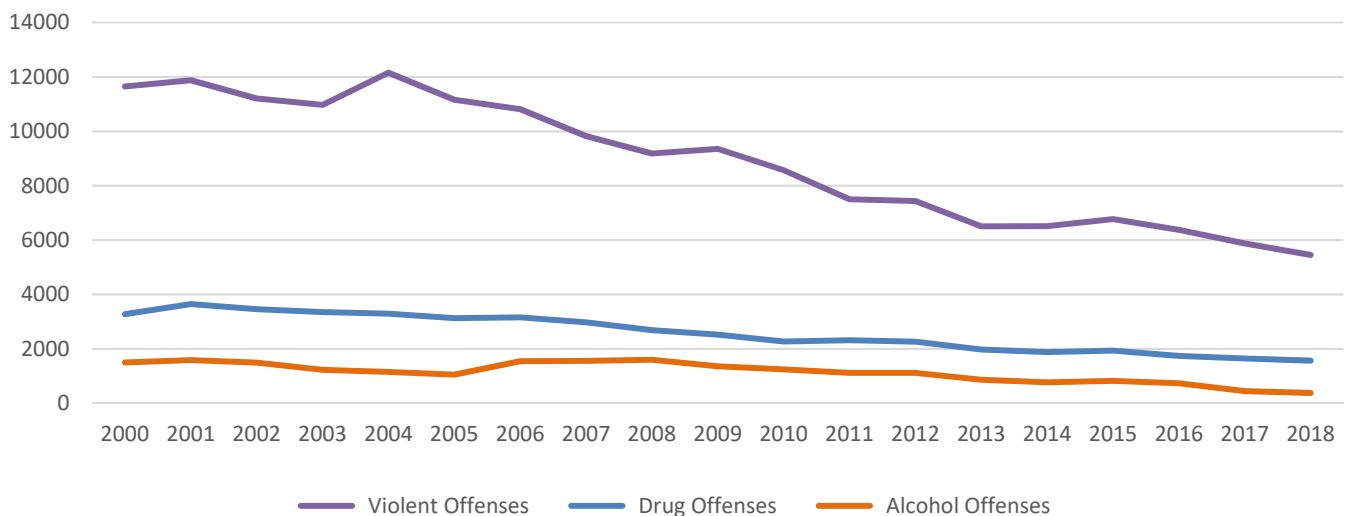


Data Source: Missouri Department of Elementary and Secondary Education.

JUVENILE COURT REFERRALS

The number of adolescents cited and referred to juvenile courts for alcohol and drug offenses has declined considerably during the past two decades. In 2018 there were 1,570 juvenile court referrals for drug offenses compared to 3,280 in the year 2000. During that same period, alcohol offense referrals dropped from 1,503 to 381. Court referrals for juvenile violent offenses declined from 11,648 in 2000 to 5,456 in 2018.

Figure 18: Referrals to Missouri Juvenile Courts for Selected Offenses

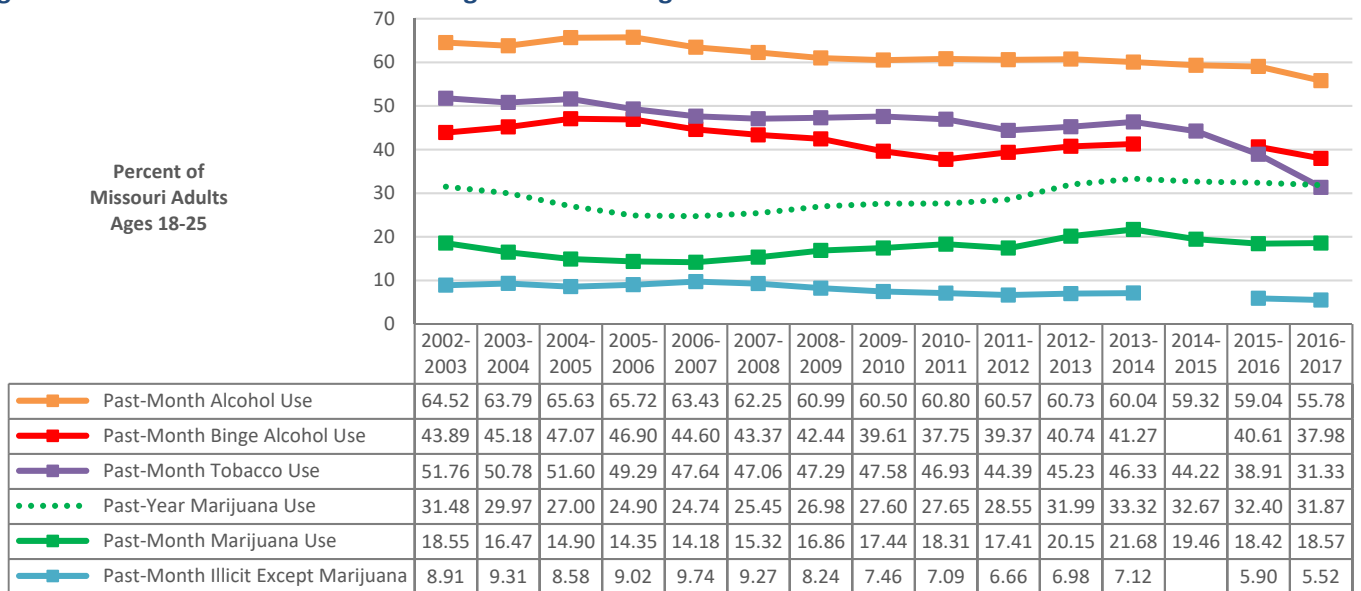


Data Source: Missouri Office of State Courts Administrator.

SUBSTANCE USE AMONG YOUNG ADULTS

Among Missouri adults 18-25 years, reductions in alcohol use disorders have been the chief factor in the decline in SUD rates. Alcohol use disorders in this young adult group have dropped from nearly 20% in 2003 to 9.5% in 2017. Alcohol use and binge drinking are trending downward. In contrast, illicit drug use disorders have only declined from 8.5% to 6.2% during the same period. While marijuana use in this age group has increased in recent years, past month use of other illicit drugs has dipped to under 6% after reaching 9% a decade ago.

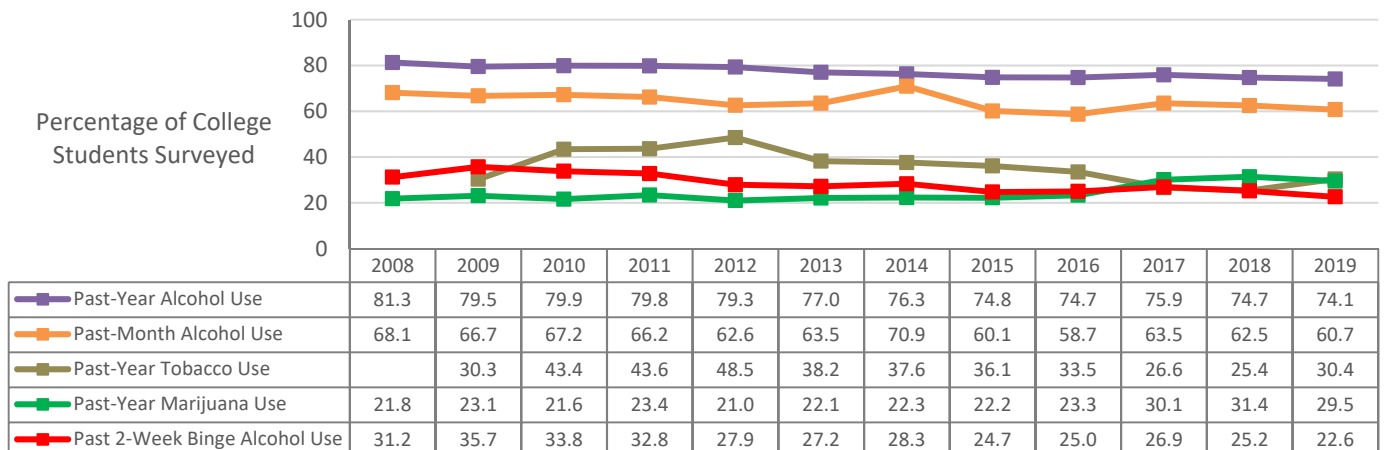
Figure 19: Trend in Substance Use among Missouri Young Adults



Data Source: SAMHSA: National Survey on Drug Use and Health.

Nearly 61% of students who completed the 2019 Missouri Assessment of College Health Behaviors survey reported past-month alcohol use—a reduction of six percentage points from the 67% a decade earlier. Although cigarette use continues to decline, overall tobacco use took an upturn in 2019. About 30% of Missouri college students have used marijuana during the past year, consistent with the 32% NSDUH estimate for young adults ages 18-25. More than 5% of college students have used illicit stimulants in the past year, and 4% have used cocaine.

Figure 20: Trend in Substance Use among Missouri Young Adults

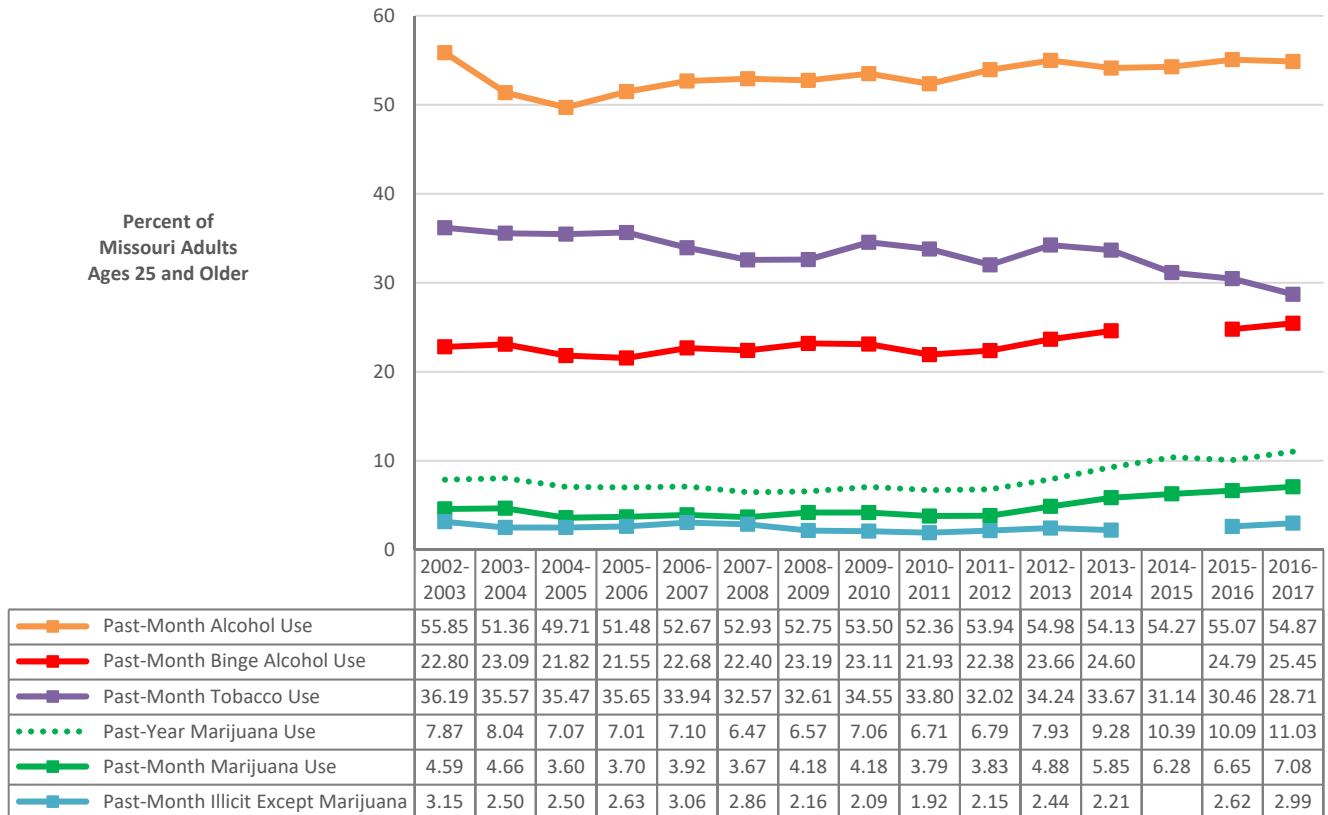


Data Source: Partners in Prevention Statewide Coalition, University of Missouri, Columbia, MO. Missouri Assessment of College Health Behaviors.

SUBSTANCE USE AMONG OLDER ADULTS

Seven percent of Missouri adults older than age 25 have substance use disorders. This rate has shown little fluctuation during the past 14 years. About 5% of these older adults have alcohol use disorders and 2% have illicit drug use disorders. In the most recent NSDUH surveys, 55% of Missouri’s older adults were past-month alcohol users including 25% who were past-month binge drinkers. The estimated rates of binge drinking for this age group have been increasing since 2010. Past-month illicit drug use is also increasing, reaching 9% of adults older than 25. Marijuana use—at 7%—accounts for most of this increase. Past-year marijuana use among older adults has increased to 11%, compared to 7% ten years ago. Approximately 1% of the over-25 age group are past-year users of cocaine and methamphetamine, and about one-third of a percent are using heroin. Tobacco use has declined to 29% in this age group, and cigarette smoking to 23%. Missouri adult males have considerably higher rates of past-month binge drinking than adult females, according to the Behavioral Risk Factor Survey.

Figure 21: Trend in Substance Use among Missouri’s Older Adults



Data Source: SAMHSA: National Survey on Drug Use and Health.

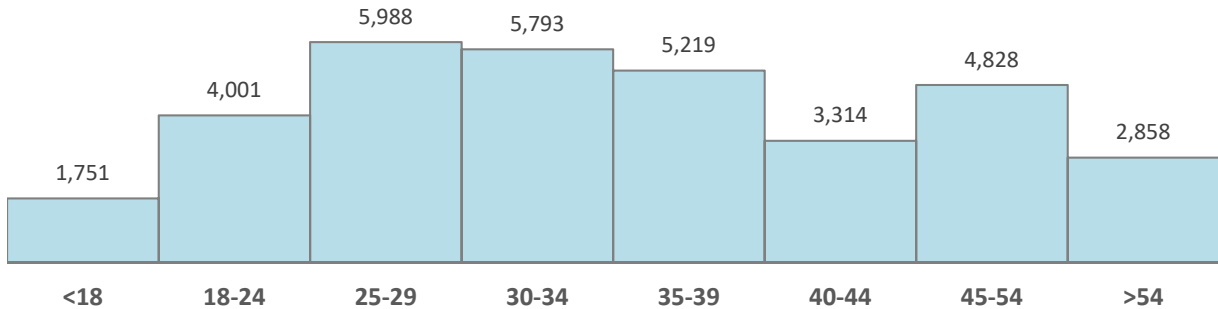
SUBSTANCE USE EMERGENCIES

In 2017, more than 42,000 Missouri residents entered hospital emergency rooms with a substance use disorder primary diagnosis. They included 24,000 with an alcohol use disorder and 18,000 with a drug use disorder. Emergency rooms discharged more than 33,000 after providing emergency services but admitted 9,000 to hospitals for further medical treatment. Emergency rooms also treated 50,000 Missouri residents with secondary alcohol disorders and 64,000 with secondary drug disorders.

SPECIALIZED TREATMENT FOR SUBSTANCE USE DISORDERS

In state fiscal year 2018, behavioral health treatment centers funded by the Division of Behavioral Health admitted more than 50,000 Missouri residents for substance disorder services. Admissions included more than 33,000 for substance disorder treatment and 17,000 for substance-related traffic offender assessments and services. Among those admitted for treatment were 21,000 males and nearly 13,000 females.

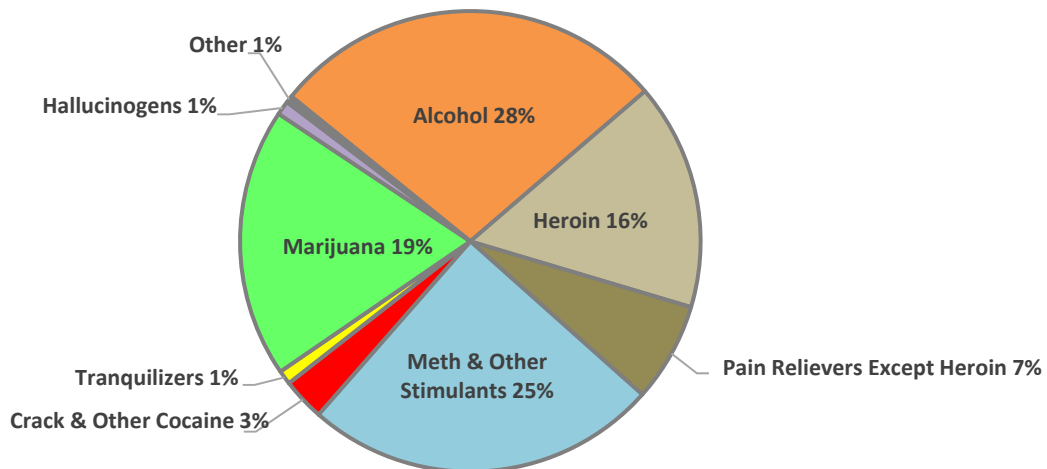
Figure 22: Substance Use Disorder Treatment Recipients by Age Group, Fiscal Year 2018



Data Source: Missouri Department of Mental Health: Customer Information Management, Outcomes & Reporting system.

Alcohol use was the primary concern in nearly 10,000 of the substance treatment admissions. Stimulant use—mainly methamphetamines—accounted for more than 8,000 admissions. Nearly 8,000 treatment admissions involved heroin and other pain reliever use. Marijuana—with over 6,000 admissions—and cocaine with 1,000 accounted for most of the remainder.

Figure 21: Primary Drug Problem among Individuals Admitted for Substance Use Treatment, FY2018

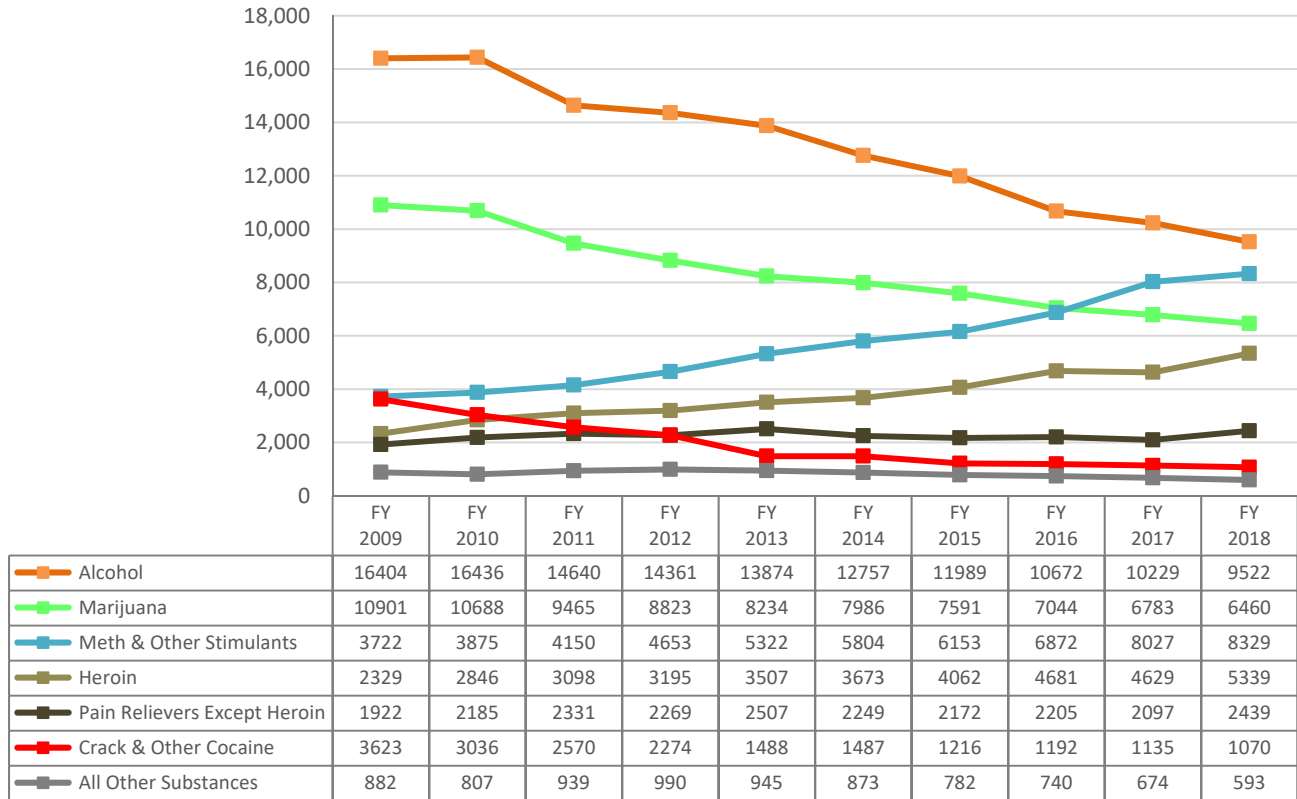


Data Source: Missouri Department of Mental Health: Customer Information Management, Outcomes & Reporting system.

TRENDS IN TREATMENT OF SUBSTANCE USE DISORDERS

Considerable changes have occurred during the past decade in the substances identified in treatment admissions. In FY2009, two-thirds of the treatment admissions were for alcohol or marijuana. Heroin and other pain relievers, methamphetamine and other stimulants, and crack and other cocaine each accounted for about one-tenth of the admissions. Since then, there have been increases in treatment admissions for meth and heroin use and declines in admissions for alcohol, marijuana, and cocaine.

Figure 23: Trend in Primary Drug Problem among Individuals Admitted for Substance Use Treatment

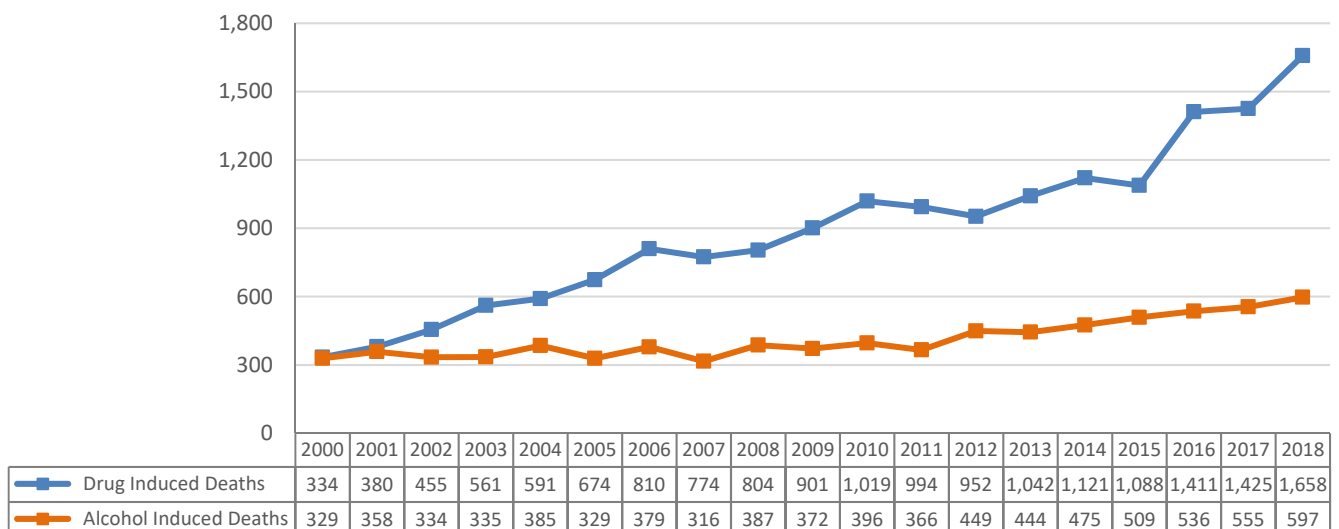


Data Source: Missouri Department of Mental Health: Customer Information Management, Outcomes & Reporting system.

DEATHS RESULTING FROM SUBSTANCE USE

While deaths attributable to cigarette smoking are slowly declining after reaching a peak of 10,300 in 2015, deaths with an underlying cause of alcohol and drug use continue to climb. Opioids account for most of the drug-induced deaths in Missouri. In 2018, heroin and other opioid overdose deaths reached 1,132.

Figure 24: Trend in Missouri Substance Induced Deaths

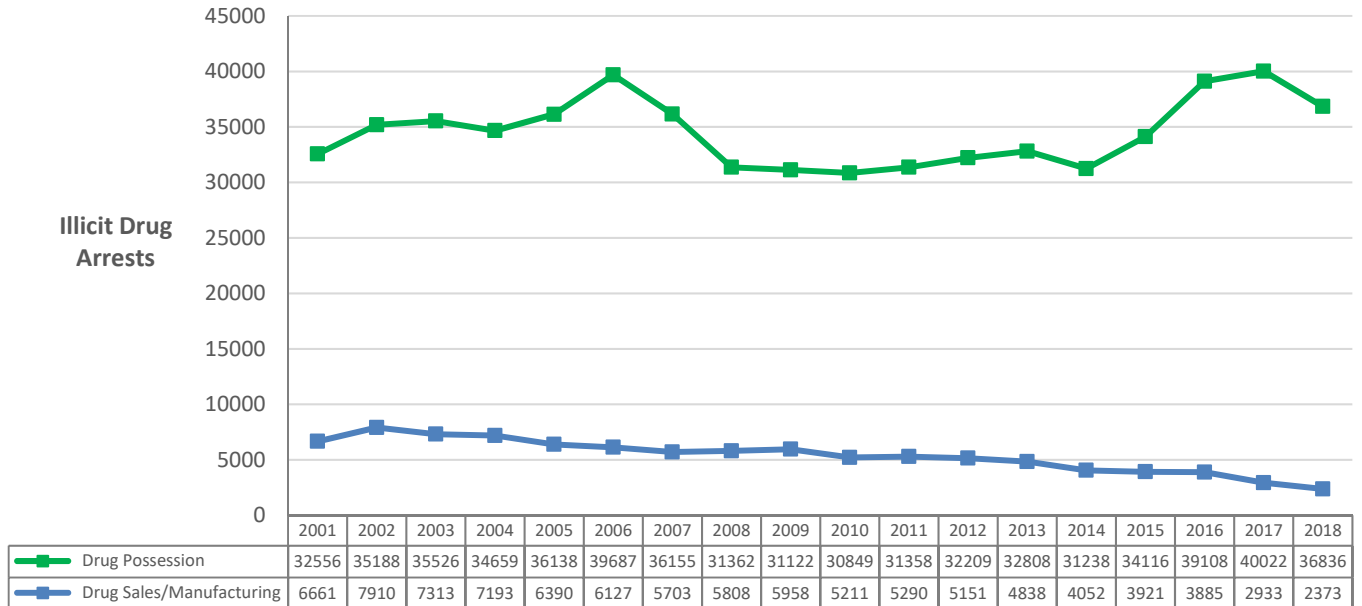


Data Source: Missouri Department of Health and Senior Services.

DRUG ARRESTS

Arrests for illicit drug possession plateaued at 40,000 arrests in Missouri in 2017, then declined to about 37,000 in 2018. Arrests for illicit drug selling or manufacturing have declined from 7,910 arrests in 2002 to 2,373 in 2018—a 70% reduction.

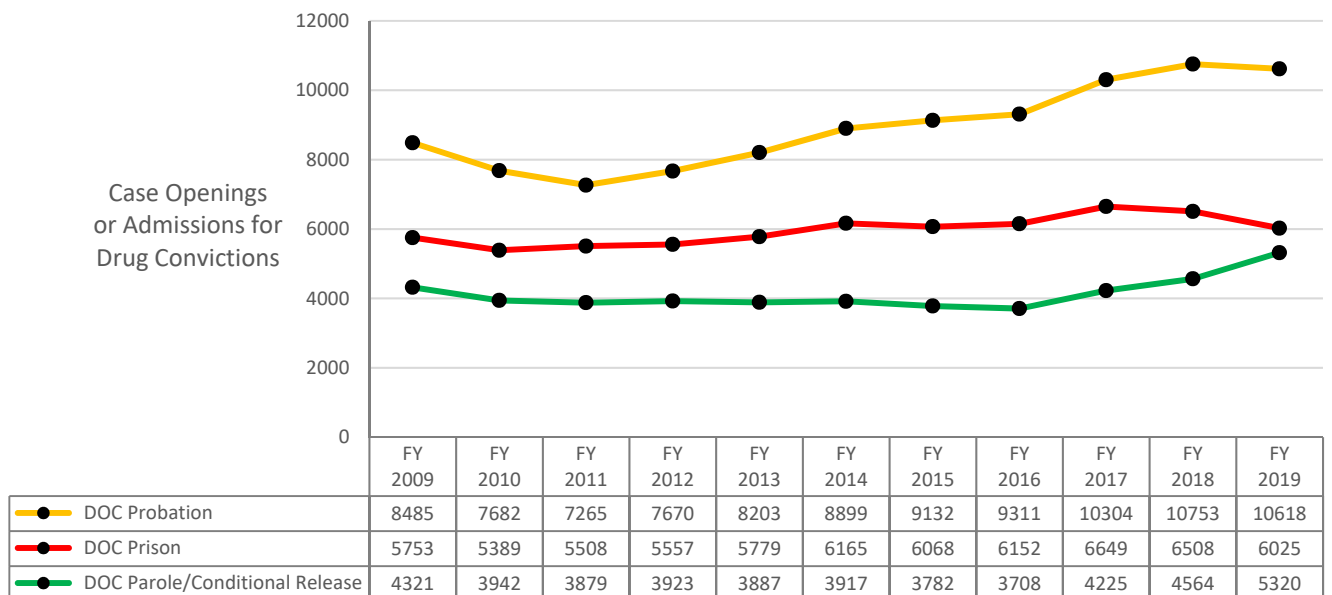
Figure 25: Missouri Arrests for Possession and Sale/Manufacturing of Illicit Drugs



Data Source: Missouri State Highway Patrol, Statistical Analysis Center. Uniform Crime Reports (UCR).

Prison admissions for drug convictions have also begun to level off yet remain at 6,000 new incarcerations per year. More than 10,000 individuals per year are placed on probation for drug violations.

Figure 26: Disposition of Missouri Drug Convictions

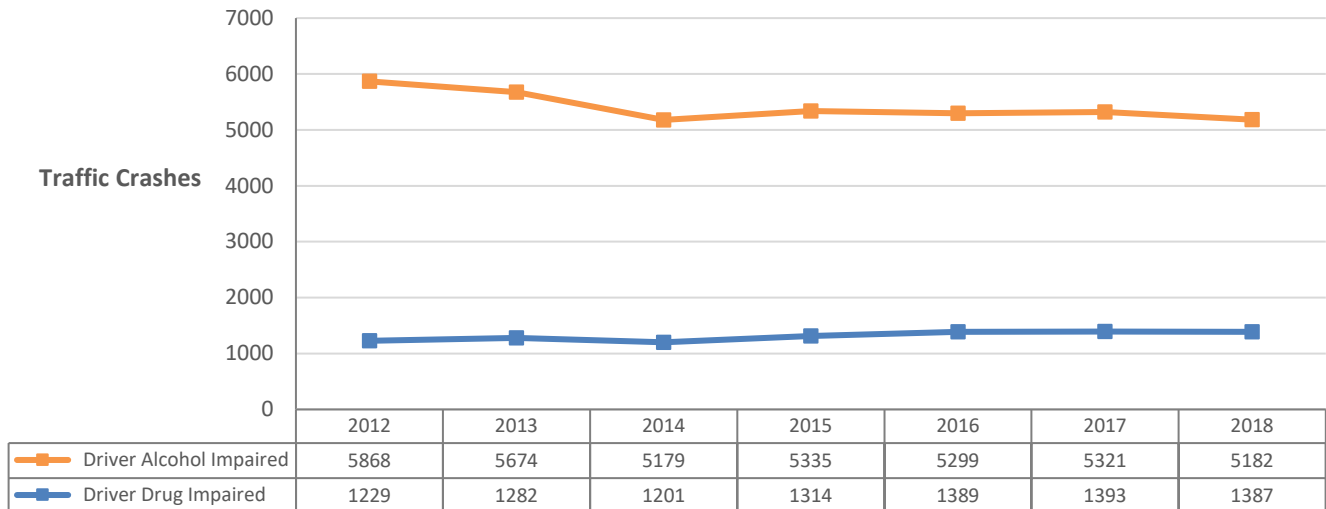


Data Source: Missouri Department of Corrections.

IMPAIRED DRIVING

Substance-impaired driving contributes to more than 6,000 traffic crashes every year in Missouri. In 2018, 253 individuals died in crashes caused by alcohol or drug impaired drivers.

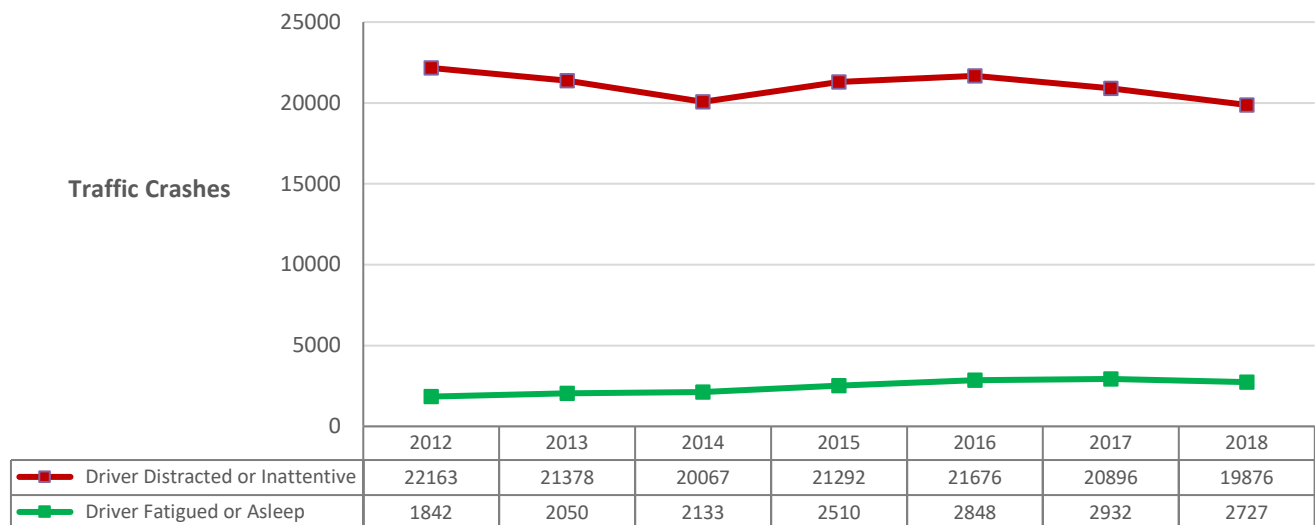
Figure 27: Traffic Crashes Attributed to Substance Impairment



Data Source: Missouri State Highway Patrol, Statistical Analysis Center. Missouri Traffic Safety Compendium: 2018.

Distracted or inattentive driving is a factor in 20,000 crashes annually, and driver fatigue or falling asleep is a factor in nearly 3,000 more.

Figure 28: Traffic Crashes Attributed to Inattention

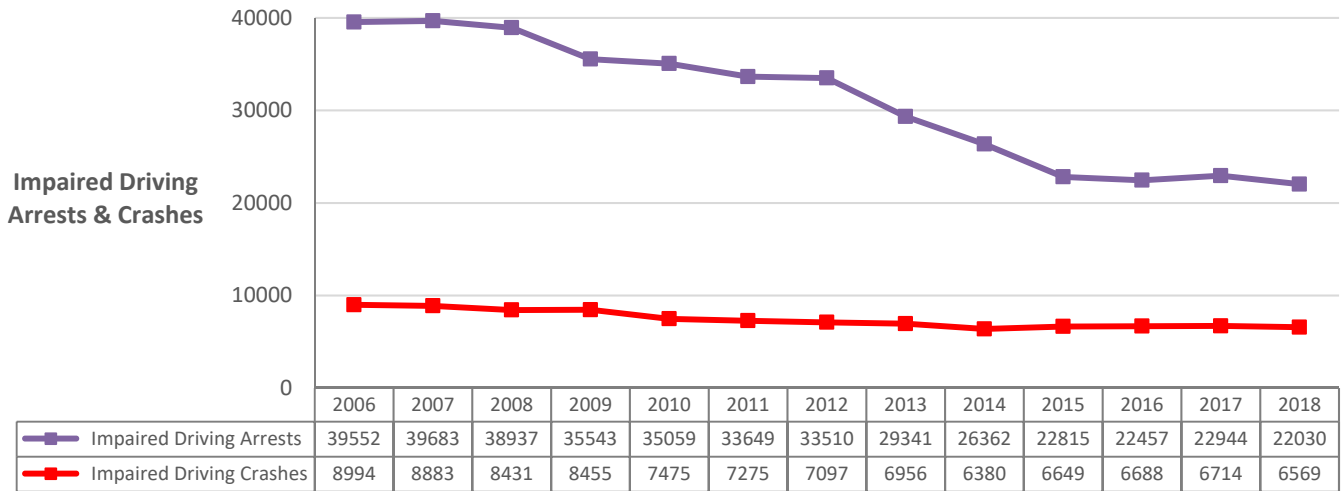


Data Source: Missouri State Highway Patrol, Statistical Analysis Center. Missouri Traffic Safety Compendium: 2018.

INTERVENTIONS FOR IMPAIRED DRIVING

Arrests for substance-impaired driving are declining. Data from the Missouri DWI Tracking System (DWITS) indicates that arrests for driving under the influence of alcohol or drugs have decreased from 39,552 in 2006 to 22,030 in 2018—a 44% reduction.

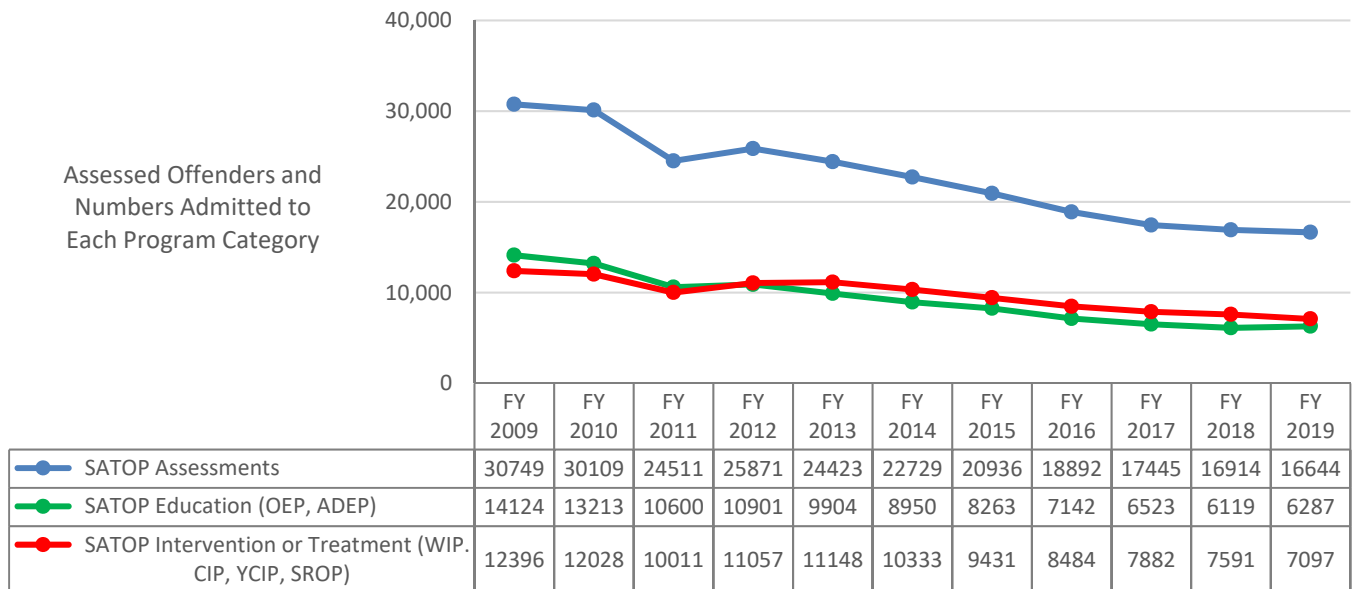
Figure 29: Missouri Arrests for Driving Under the Influence of Alcohol or Drugs, and Traffic Crashes Involving Driver Under the Influence of Alcohol or Drugs



Data Source: Missouri State Highway Patrol, Statistical Analysis Center. DWI Tracking System (DWITS) and Uniform Crime Reports (UCR).

The number of individuals clinically assessed in the Substance Awareness Traffic Offender Program (SATOP) has likewise declined—from 30,749 in FY 2009 to 16,644 in FY 2019. Based on their assessments, traffic offenders are referred to education, intervention, or treatment services. Every year, 40% to 45% of the assessed offenders are admitted to SATOP intervention or clinical treatment programs (WIP, CIP, YCIP, or SROP).

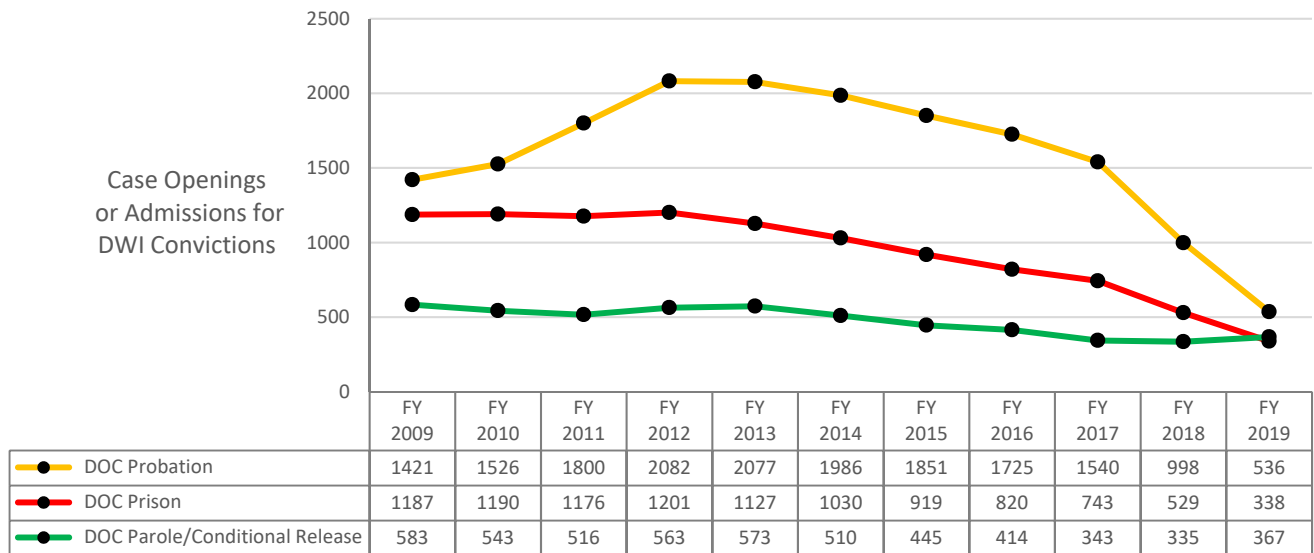
Figure 30: SATOP Assessments and Program Admissions by Fiscal Year



Data Source: Missouri Department of Mental Health: Customer Information Management, Outcomes & Reporting system.

Aside from SATOP, some DWI offenders—particularly prior and persistent offenders—are placed on probation or sentenced to jail or prison. State incarcerations and probation openings have followed the downward trend of impaired driving arrests.

Figure 31: Disposition of Missouri DWI Convictions

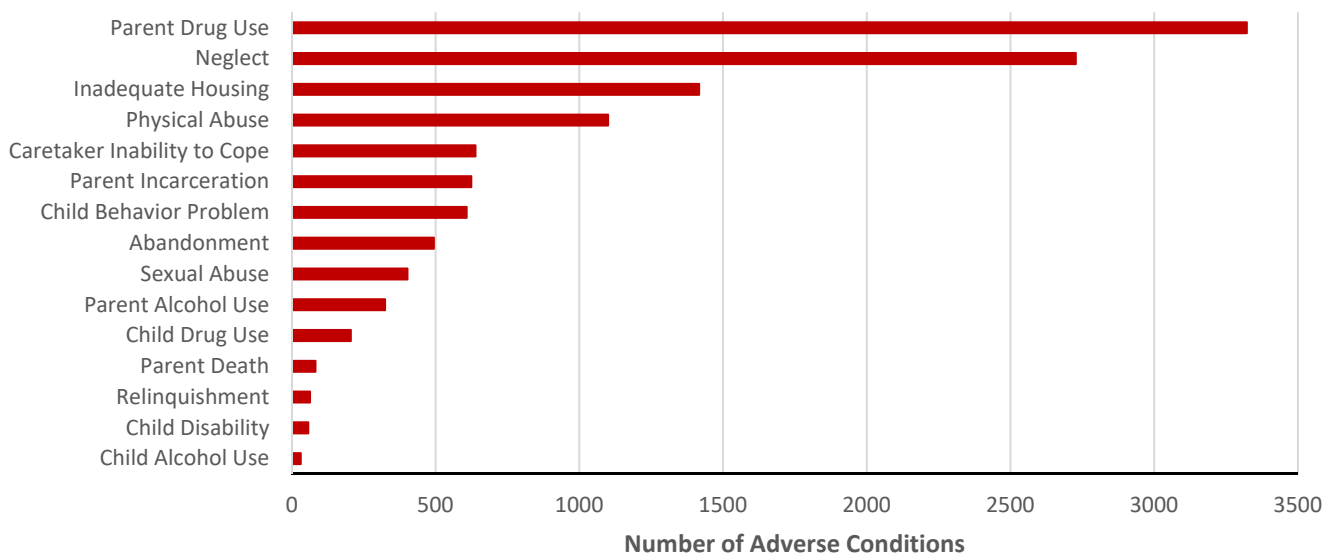


Data Source: Missouri Department of Corrections.

OUT-OF-HOME JUVENILE PLACEMENTS

Children may be removed from their homes by juvenile authorities and placed in alternate care when unfavorable conditions are present in the home. In 2018, nearly 7,000 children were removed from their homes. Over 12,000 conditions were documented in the placements, with some cases involving more than one adverse condition. Every year, parental drug use tops the list of removal conditions.

Figure 32: Conditions Present in Removal of Children from Homes by Juvenile Authorities



Data Source: Missouri Department of Social Services, Children’s Division.