

Alcohol, Tobacco, and Other Drugs: Consumption and Consequences in Alabama Communities

Substance Abuse Planning Regions



Alabama Epidemiological Outcomes Workgroup

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List of Abbreviations

ACJIC	Alabama Criminal Justice Information Center
ATOD	Alcohol, Tobacco, and Other Drugs
BAC	Blood Alcohol Concentration
CDC WONDER	Centers for Disease Control and Prevention Wide-ranging OnLine Data for Epidemiologic Research
CLRD	Chronic Lower Respiratory Diseases
DHR	Alabama Department of Human Resources
DMH	Alabama Department of Mental Health
DOE	Alabama Department of Education
DPS	Alabama Department of Public Safety
DSM-IV	Diagnostic and Statistical Manual of Mental Disorders, 4 th edition
DUI	Driving under the influence
DYS	Alabama Department of Youth Services
FARS	Fatality Analysis Reporting System
ICD-10	International Classification of Diseases, 10 th Revision
NSDUH	National Survey on Drug Use and Health
SEER	Surveillance, Epidemiology, and End Results
UCR	Uniform Crime Reports

Introduction

This community-level epidemiological profile assesses trends in the consequences and consumption of alcohol, tobacco, and other drugs among youth and adults in Alabama by state planning region. The state of Alabama has 4 planning regions that are divided based on geographic location: Region 1 includes 18 counties in northern Alabama; Region 2 includes 14 counties in north-central Alabama; Region 3 includes 19 counties in south-central Alabama; and Region 4 includes 16 counties in southern Alabama.

This profile is divided into sections according to the substance evaluated: 1) alcohol; 2) tobacco; and 3) other drugs. For each substance, data on consequences and consumption are presented. Consequences include data on substance-related morbidity, mortality, arrests, and treatment needs. Consumption includes data on current use, age at first use, and risky behaviors. Data from multiple national and state sources are included in this profile to assess the consequences and consumption of alcohol, tobacco, and other drugs within the 4 state planning regions. Additionally, data from state agencies is included such as substance-related child abuse/neglect investigations and youth referrals for substance use treatment.

The findings in this profile will be used to guide the development of the strategic plan for substance use prevention in Alabama, monitor the impact of state and local policies, and inform programmatic responses to identified needs related to alcohol, tobacco, and other drugs within the state planning regions in Alabama.

Executive Summary

This community-level epidemiological profile of substance use evaluates the consumption and consequences of alcohol, tobacco, and other drugs in Alabama by planning region. The Department of Mental Health uses four planning regions to allocate substance abuse block grant funds from the Substance Abuse and Mental Health Services Administration and identify priority areas for services.

Alcohol

- ❖ The use of alcohol in Alabama was below the national average.
- ❖ Overall, alcohol consumption during the past month, alcohol consumption by friends, and binge drinking increased among Alabama youth as grade in school increased.
- ❖ Among youth 12-20 years old in Alabama, 24.4% reported consuming alcohol during the past month and 15.0% reported binge drinking.
- ❖ Among individuals 12 years and older in Alabama, 6.1% abuse or are dependent on alcohol and 5.7% needed but did not receive treatment for alcohol abuse or dependence.

Tobacco

- ❖ The use of tobacco in Alabama was above the national average.
- ❖ Overall, tobacco use during the past month and tobacco use by friends increased among Alabama youth as grade in school increased.
- ❖ Among individuals 12 years and older in Alabama, 28.4% reported smoking cigarettes during the past month and 34.4% reported using any tobacco products during the previous month.
- ❖ The age-adjusted incidence rate for lung and bronchus cancers was higher for Alabama compared to the national average. The mortality rates for lung and bronchus cancers and chronic lower respiratory diseases were also higher for Alabama compared to the national average.

Other Drugs

- ❖ The use of illicit drugs in Alabama was comparable to national averages.
- ❖ Marijuana use and current use of any other drugs increased as grade in school increased.
- ❖ Non-medical use of prescription drugs also increased as grade in school increased.
- ❖ Among individuals 12 years and older in Alabama, 8.0% reported marijuana use during the past year; 5.6% reported non-medical use of prescription pain relievers during the past year; and 1.9% reported cocaine use during the past year.
- ❖ Among individuals 12 years and older in Alabama, 3.0% abuse or are dependent on illicit drugs and 2.5% needed but did not receive treatment for illicit drug abuse or dependence.

Methodology Summary

The sources for alcohol, tobacco, and other drug consumption and consequence data at the regional level are the Alabama Pride Survey (2009-2010), the National Survey on Drug Use and Health (NSDUH) (2006-2008), and state agencies. Because this profile evaluates data at the sub-state level (state planning regions), the sample size is small for many indicators and the estimates are less precise which limits the statistical power to detect differences across groups or regions.

The Alabama Pride Survey is a census-based survey of students in grades 6-12 that is conducted annually in public schools in Alabama. The survey collects data from approximately 300,000 students every year to identify patterns of alcohol, tobacco, and other drug use among youth in Alabama. The sub-state estimates in this profile reflect data collected for the 2009-2010 school year.

Table 1—Sample size for Alabama Pride Survey by grade and planning region, 2009-2010

	Grade							Total
	6th	7th	8th	9th	10th	11th	12th	
Region 1	13,776	13,603	12,857	12,439	11,375	9,657	7,742	81,449
Region 2	15,273	14,477	13,950	12,505	11,569	10,547	8,473	86,794
Region 3	8,590	8,180	7,678	6,770	6,340	5,638	4,529	47,725
Region 4	11,004	10,241	10,072	9,455	8,612	7,107	5,976	62,467
	Grand Total							278,435

The NSDUH is a nationwide survey conducted annually that involves computerized interviews with approximately 70,000 randomly selected individuals aged 12 and older. Data from NSDUH is used to provide national and state-level estimates of past month, past year, and lifetime use of alcohol, tobacco, other drugs, and non-medical use of prescription drugs. NSDUH uses survey-weighted hierarchical Bayes methodology to produce sub-state estimates by planning region in Alabama. This methodology is described in detail by Folsom, Shah, and Vaish (1999)¹ and provides small area estimates that are design consistent (i.e., for substates with large sample sizes, the small area estimates are close to the robust design-based estimates). The sub-state estimates in this profile reflect data combined from 2006-2008 due to small numbers.

Additional information on indicators and inclusion criteria is presented in Appendix C.

Alabama Overview

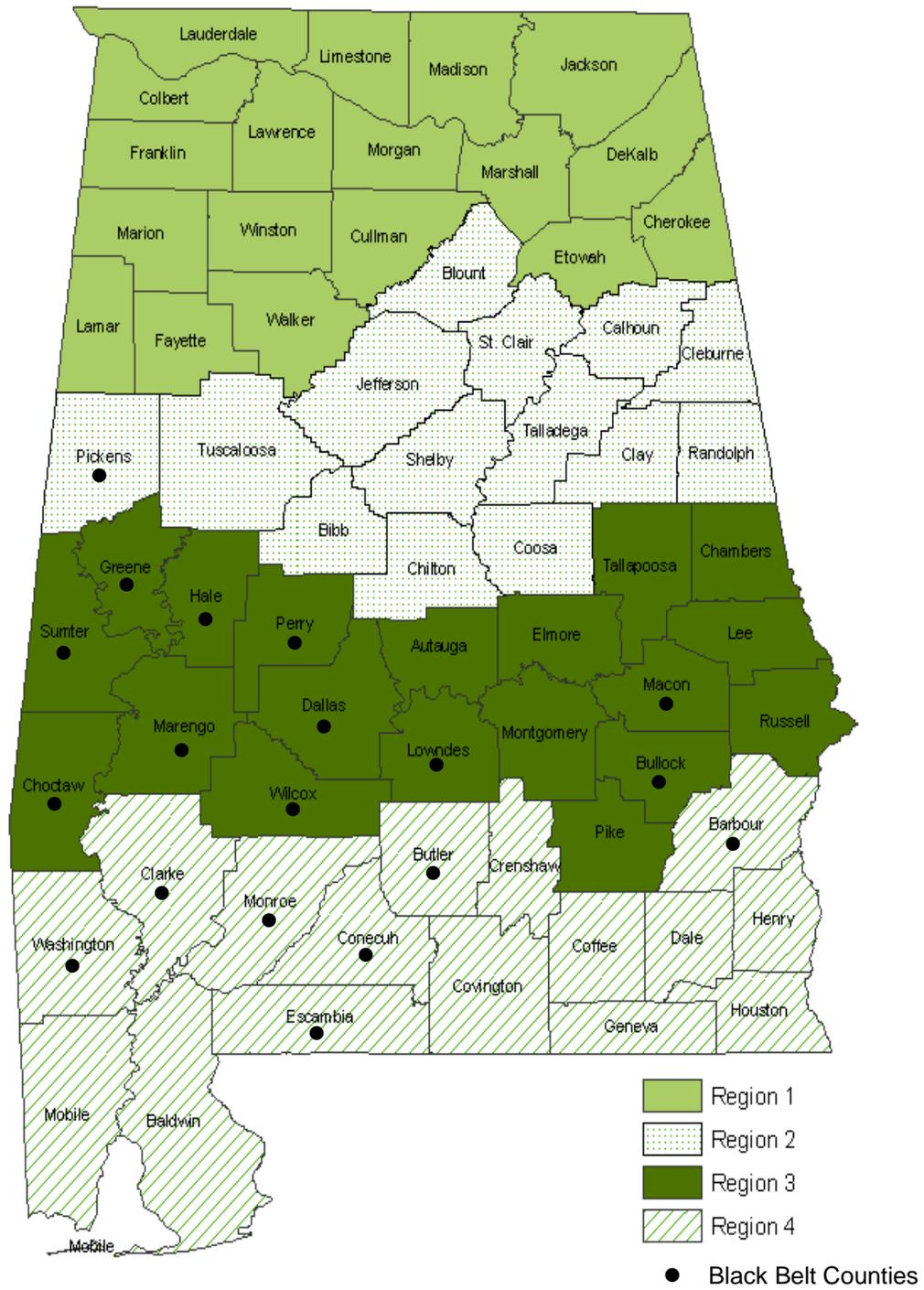
The State of Alabama, named after a southern Indian tribe, has been a central figure in the historical events that have shaped the modern-day United States. Alabama was admitted to the Union as the 22nd state in 1819, seceded in 1861 during which time Montgomery, Alabama was named as the capital of the Confederacy, and was re-admitted in 1868 following the end of the Civil War. Almost a century later, defining moments of the Civil Rights Movement would take place in Alabama, specifically the Montgomery Bus Boycott in 1955, Dr. Martin Luther King's Letter from a Birmingham Jail in 1963, and the Selma to Montgomery "Bloody Sunday" March in 1965.²

Alabama is located in the southeastern United States, bordered by the states of Florida, Georgia, Mississippi, and Tennessee. The capital city of Alabama is Montgomery (located in Montgomery County) and the most populous city is Birmingham (located in Jefferson County). Alabama had an estimated population of 4,779,736 in 2010 in its 67 counties.

The majority of Alabama residents are white (68.5%) and African-Americans represent the largest minority group in the state (26.2%) followed by Asians (1.1%) and American Indian/Alaska Native (0.6). Urban and rural areas of Alabama have different socio-demographic profiles, with rural areas being less advantaged than urban areas. In 2009, the state's overall poverty rate was 17.5% with rural areas having a higher poverty level (21.0%) than urban areas (16.2%). Similarly, residents in rural Alabama had a higher unemployment rate (11.9%) compared with residents in urban Alabama (9.1%).³

Approximately 28.5% of Alabama residents live in rural areas.³ Alabama's Black Belt, its name originating from its agricultural history and rich soil but now indicative of its majority African-American presence, is a predominately rural region concentrated in the southwest and central areas of the state that consists of 19 counties: Barbour, Bullock, Butler, Choctaw, Clarke, Conecuh, Dallas, Escambia, Greene, Hale, Lowndes, Macon, Marengo, Monroe, Perry, Pickens, Sumter, Washington, and Wilcox. Similar to other rural counties in Alabama, these counties are less advantaged than urban areas; however, these counties have even harsher economic conditions characterized by declining populations, lack of health care access, high unemployment rates, and high poverty rates as they are among the poorest counties in the state.⁴ Of the 10 poorest counties in Alabama, 9 of these counties are located in the Black Belt.

Figure 1—Alabama Department of Mental Health Planning Regions



Planning Region 1

Planning region 1 includes 18 counties located in the northern part of the state: Cherokee, Colbert, Cullman, DeKalb, Etowah, Fayette, Franklin, Jackson, Lamar, Lauderdale, Lawrence, Limestone, Madison, Marion, Marshall, Morgan, Walker, and Winston. Madison County is the most populous county in Region 1 and is home to Redstone Arsenal and Marshall Space Flight Center.

Table 2—County* populations for Region 1, Alabama

County	Population, 2010 Estimate
Alabama	4,779,736
Cherokee County	25,989
Colbert County	54,428
Cullman County	80,406
DeKalb County	71,109
Etowah County	104,430
Fayette County	17,241
Franklin County	31,704
Jackson County	53,227
Lamar County	14,564
Lauderdale County	92,709
Lawrence County	34,339
Limestone County	82,782
Madison County	334,811
Marion County	30,776
Marshall County	93,019
Morgan County	119,490
Walker County	67,023
Winston County	24,484

Source: US Census Bureau Alabama Quick Facts⁵
 *No Black Belt Counties in Region 1

Planning Region 2

Planning region 2 includes 14 counties located in the north-central part of the state: Bibb, Blount, Calhoun, Chilton, Clay, Cleburne, Coosa, Jefferson, Pickens, Randolph, St. Clair, Shelby, Talladega, and Tuscaloosa. Jefferson County is the most populous county in the state and its largest employer is the University of Alabama at Birmingham.

Table 3—County populations for Region 2, Alabama

County	Population, 2010 Estimate
Alabama	4,779,736
Bibb County	22,915
Blount County	57,322
Calhoun County	118,572
Chilton County	43,643
Clay County	13,932
Cleburne County	14,972
Coosa County	11,539
Jefferson County	658,466
*Pickens County	19,746
Randolph County	22,913
St. Clair County	83,593
Shelby County	195,085
Talladega County	82,291
Tuscaloosa County	194,656

Source: US Census Bureau Alabama Quick Facts⁵

*Black Belt County

Planning Region 3

Planning region 3 includes 19 counties located in the south-central part of the state: Autauga, Bullock, Chambers, Choctaw, Dallas, Elmore, Greene, Hale, Lowndes, Lee, Macon, Marengo, Montgomery, Pike, Perry, Russell, Sumter, Tallapoosa, and Wilcox. Montgomery County is the most populous county in Region 3 and its largest employers are Maxwell-Gunter Air Force Base and the State of Alabama.

Table 4—County populations for Region 3, Alabama

County	Population, 2010 Estimate
Alabama	4,779,736
Autauga County	54,571
*Bullock County	10,914
Chambers County	34,215
*Choctaw County	13,859
*Dallas County	43,820
Elmore County	79,303
*Greene County	9,045
*Hale County	15,760
Lee County	140,247
*Lowndes County	11,299
*Macon County	21,452
*Marengo County	21,027
Montgomery County	229,363
*Perry County	10,591
Pike County	32,899
Russell County	52,947
*Sumter County	13,763
Tallapoosa County	41,616
*Wilcox County	11,670

Source: US Census Bureau Alabama Quick Facts⁵
 *Black Belt Counties

Planning Region 4

Planning region 4 includes 16 counties located in the southern part of the state: Baldwin, Barbour, Butler, Clarke, Coffee, Conecuh, Covington, Crenshaw, Dale, Escambia, Geneva, Henry, Houston, Mobile, Monroe, and Washington. Mobile County is the most populous county in Region 4 and is Alabama's major seaport.

Table 5—County populations for Region 4, Alabama

County	Population, 2010 Estimate
Alabama	4,779,736
Baldwin County	182,265
*Barbour County	27,457
*Butler County	20,947
*Clarke County	25,833
Coffee County	49,948
*Conecuh County	13,228
Covington County	37,765
Crenshaw County	13,906
Dale County	50,251
*Escambia County	38,319
Geneva County	26,790
Henry County	17,302
Houston County	101,547
Mobile County	412,992
*Monroe County	23,068
*Washington County	17,581

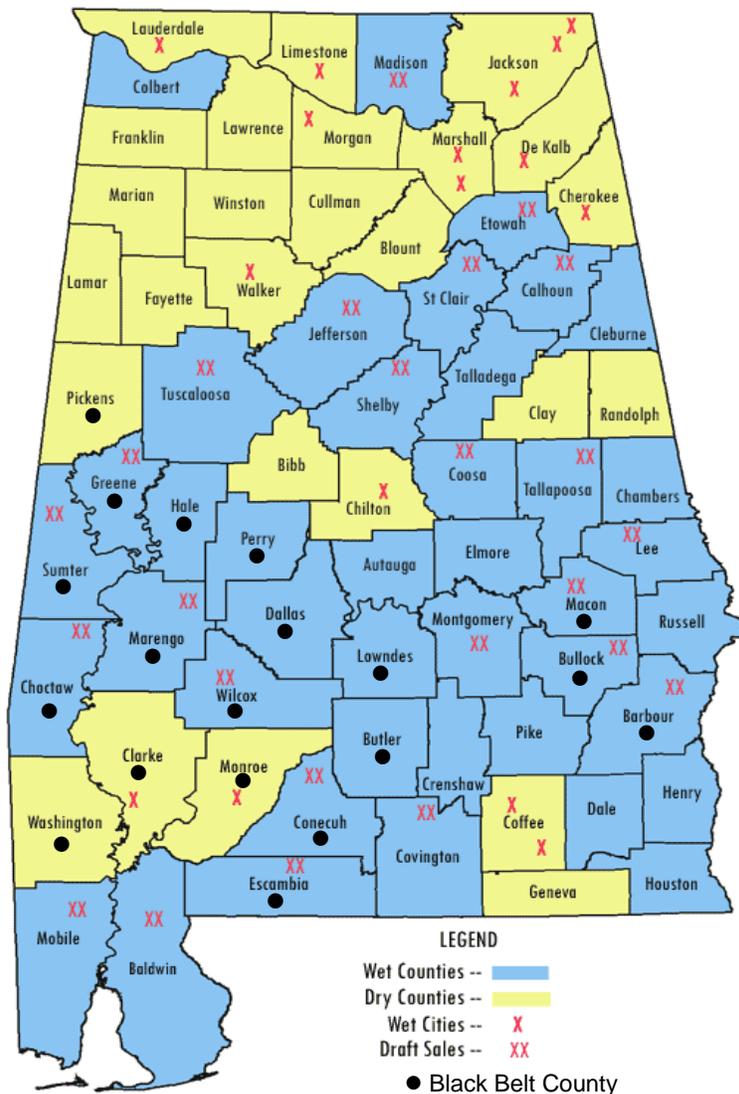
Source: US Census Bureau Alabama Quick Facts⁵
 *Black Belt Counties

Alcohol

Alcohol

- The minimum legal age to purchase, use, possess, or transport alcoholic beverages in Alabama is 21 years.
- Alcohol sales are regulated by the Alabama Alcoholic Beverage Control Board, which is responsible for the distribution of alcohol, licensing of retail outlets, and enforcement of policies.
- The wet and dry counties are presented in Figure 2. Region 1 has the highest percentage of dry counties (89%), followed by Region 2 (43%) and Region 4 (31%). All of the counties in Region 3 are wet counties.

Figure 2—Wet and dry counties and cities in Alabama



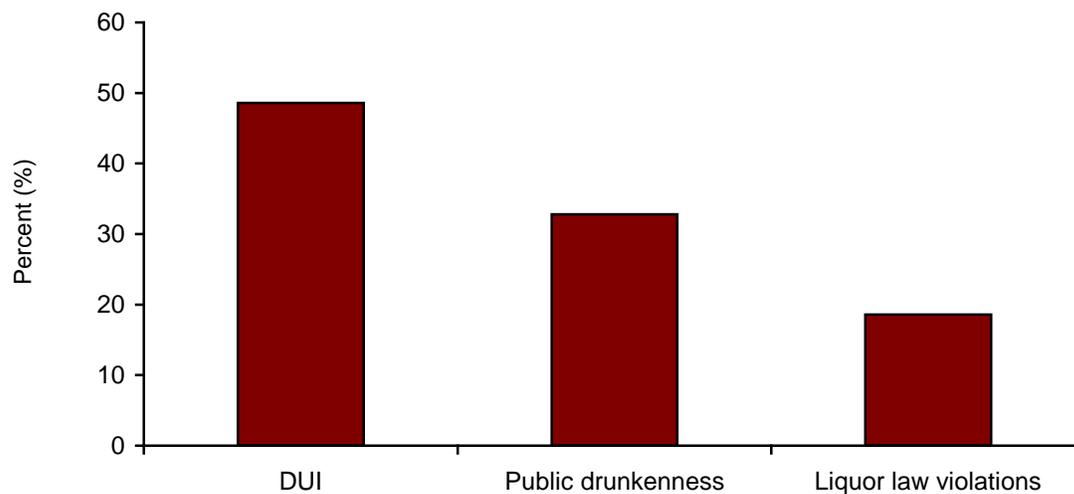
Source: Alabama Alcoholic Beverage Control Board

Alcohol Consequences

Alcohol-Related Arrests

- Alcohol-related arrests, such as driving under the influence (DUI), liquor law violations (e.g. bootlegging, selling to minors), and public drunkenness, may result from alcohol use and abuse.
- In 2009, there were 29,291 arrests in Alabama for alcohol-related offenses. DUI accounted for 48.6% of those offenses, followed by public drunkenness (32.8%), and liquor law violations (18.6%) (Figure 3).

Figure 3—Alcohol-related arrests in Alabama by type of offense, 2009

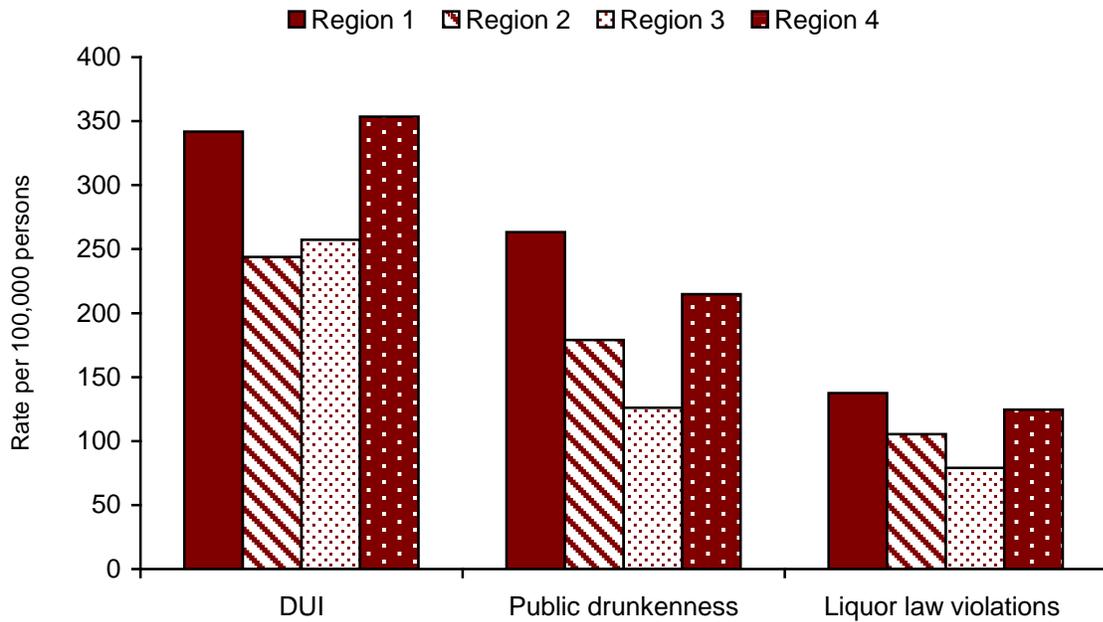


Source: ACJIC

*Data may include duplicate counts and may be affected by resources available to enforce laws.

- In each region, DUI was the most common offense for an alcohol-related arrest followed by public drunkenness and liquor law violations.
- In 2009, the rate of alcohol-related arrests varied by region, with regions 1 and 4 having the highest arrest rates for DUI, public drunkenness, and liquor law violations (Figure 4).

Figure 4—Alcohol-related arrest rate per 100,000 persons in Alabama by region and type of offense, 2009



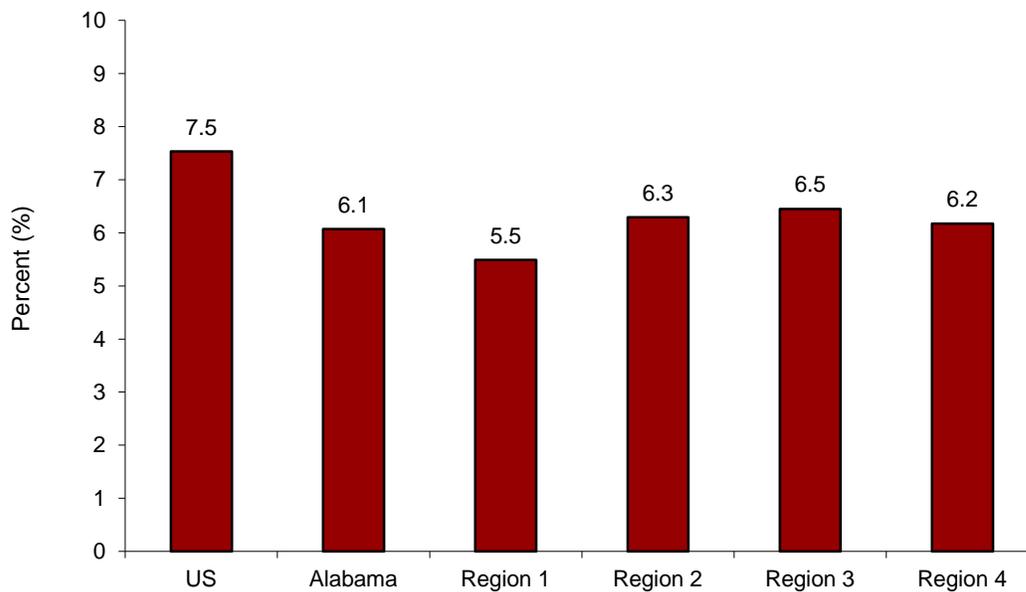
Source: ACJIC

*Data may include duplicate counts and may be affected by resources available to enforce laws.

Alcohol Abuse and Dependence

- In 2006-2008, the percent of persons 12 years and older in Alabama with alcohol abuse or dependence (6.1%) was less than the national average (7.5%) (Figure 5).
- Alcohol abuse or dependence was comparable across regions. Region 3 had the highest percent of persons reporting alcohol abuse or dependence (6.5%) while Region 1 had the lowest percent (5.5%); however, these differences were not statistically significant (Figure 5).

Figure 5—Percent of persons 12 years and older in Alabama with alcohol abuse or dependence by region, 2006-2008



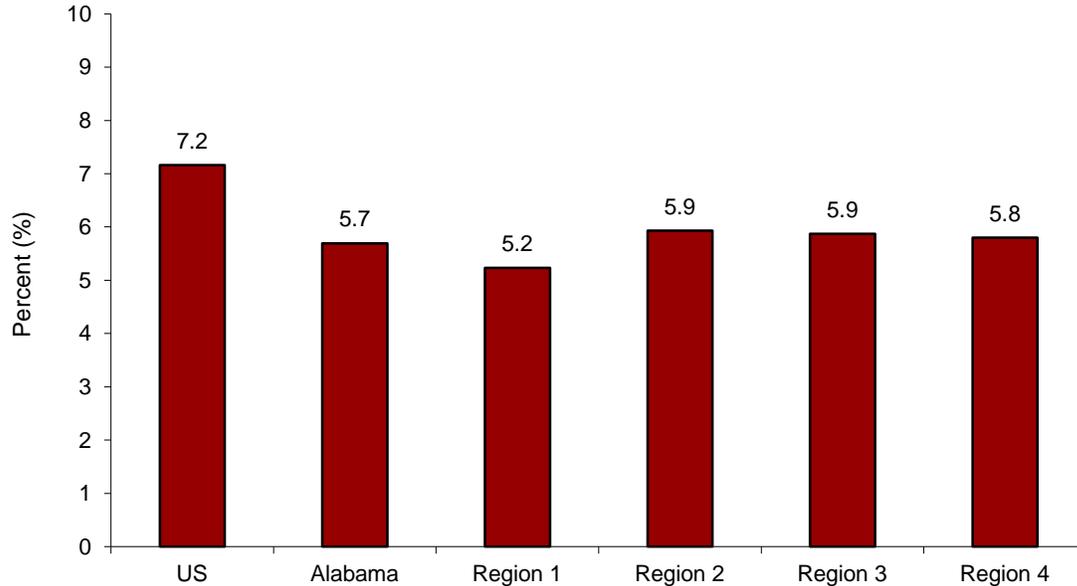
Source: NSDUH

Data combined across multiple years due to small sample size.

Need Treatment for Alcohol Abuse or Dependence

- In 2006-2008, the percent of persons 12 years and older in Alabama who needed but did not receive treatment for alcohol abuse or dependence (5.7%) was less than the national average (7.2%) (Figure 6).
- The percent of Alabama residents needing treatment for alcohol abuse or dependence was comparable across regions (Figure 6).

Figure 6—Percent of persons 12 years and older in Alabama who needed but did not receive treatment for alcohol abuse or dependence by region, 2006-2008



Source: NSDUH

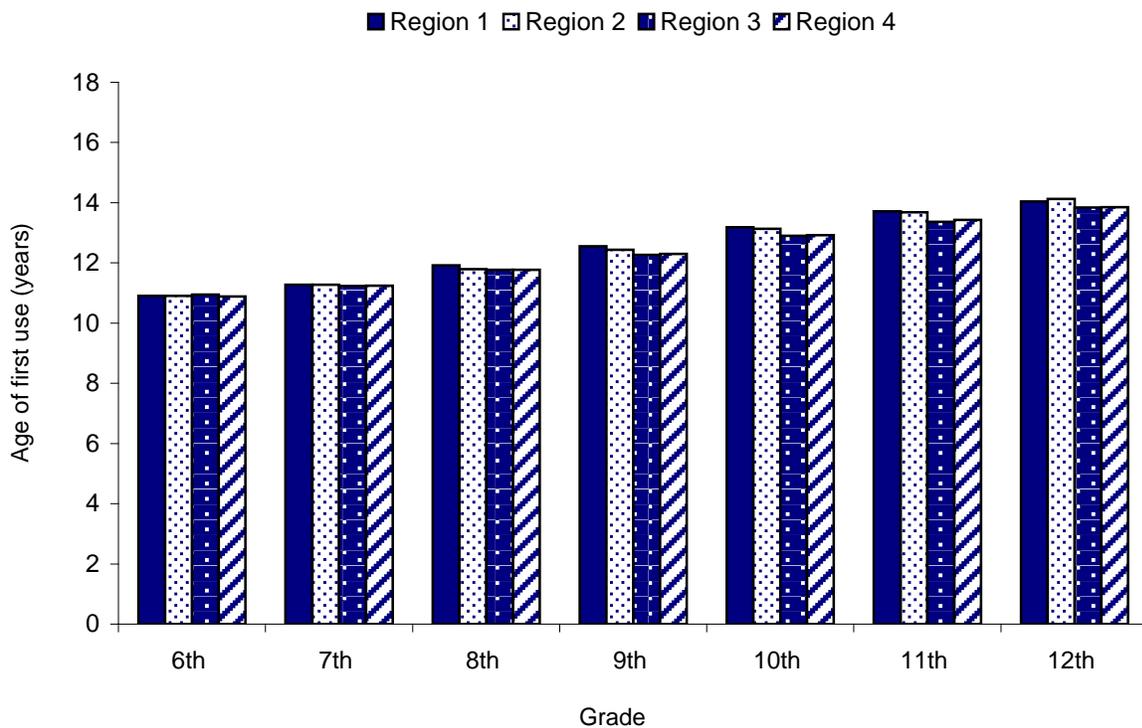
Data combined across multiple years due to small sample size.

Alcohol Consumption

Youth—Age at First Use of Alcohol

- In 2009-2010, the average age at first use of alcohol among Alabama youth was 11 years old for 6th graders and 14 years old for 12th graders.
- In each region, age at first use of alcohol increased as school grade increased, with youth in higher grades having later ages at first use compared with youth in lower grades (Figure 7).

Figure 7—Age at first use of alcohol by grade and region among youth in Alabama, 2009-2010

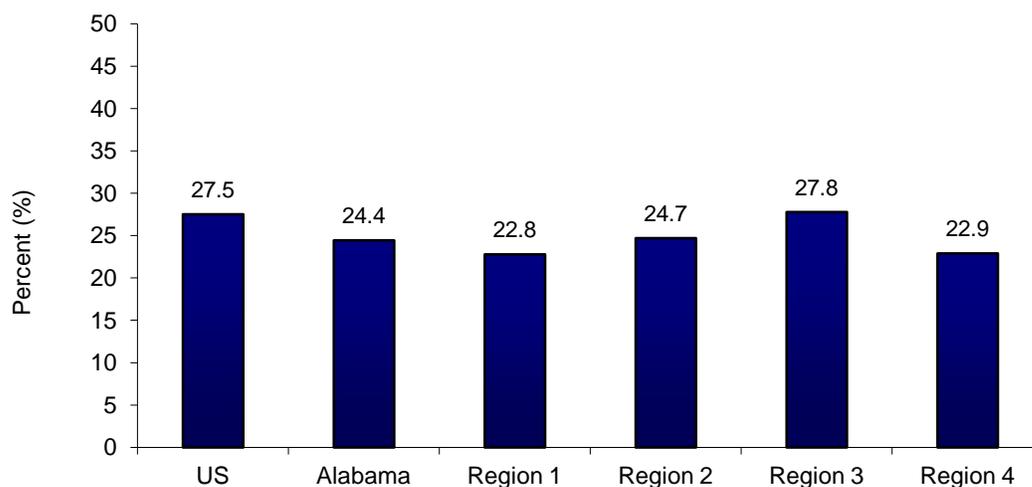


Source: Alabama Pride Survey

Youth—Current Alcohol Use

- In 2006-2008, alcohol use among youth in Alabama was slightly lower (24.4%) than the national average (27.5%) (8).
- Alcohol use among youth was comparable across regions in Alabama. Region 3 had the highest percent of youth reporting alcohol use during the past month (27.8%) while Region 1 had the lowest percent (22.8%); however, these differences were not statistically significant (Figure 8).

Figure 8—Percent of youth (ages 12 to 20 years) in Alabama who reported alcohol use during the past month by region, 2006-2008

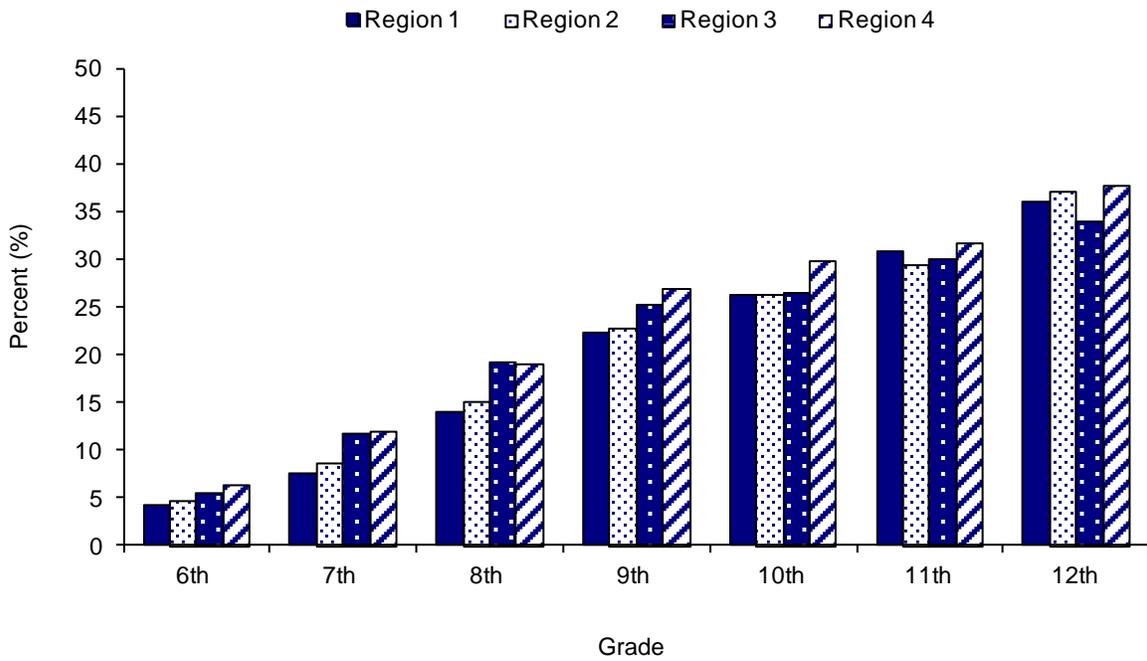


Source: NSDUH

Data combined across multiple years due to small sample size.

- As school grade increased, the percent of students in Alabama who reported using alcohol during the past month increased for all regions (Figure 9). Alcohol use by school grade was comparable across regions.

Figure 9—Percent of youth in Alabama who reported using alcohol during the past month by school grade and region, 2009-2010

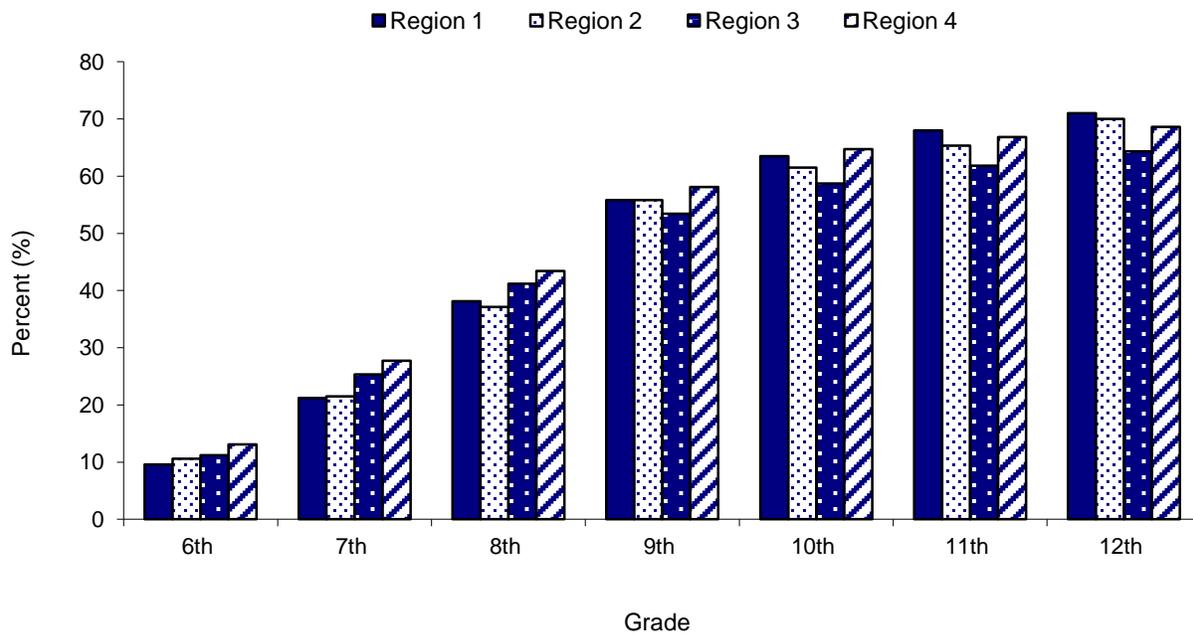


Source: Alabama Pride Survey

Youth—Alcohol Use by Friends

- As school grade increased, the percent of students in Alabama who reported that their friends use alcohol also increased (Figure 10). Alcohol use by friends was comparable across regions, with a slightly lower percent of youth in 9th-12th grades in Region 3 reporting that their friends use alcohol.

Figure 10—Percent of youth in Alabama who reported their friends use alcohol, by grade and region, 2009-2010

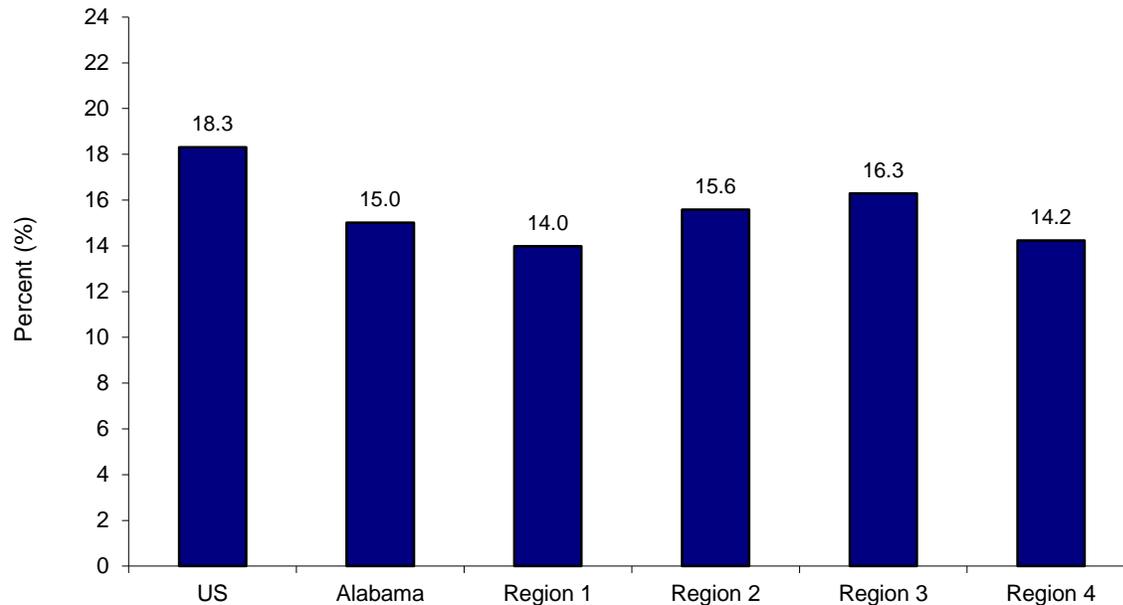


Source: Alabama Pride Survey

Youth—Excessive Use of Alcohol

- In 2006-2008, binge drinking, defined as 5 or more alcoholic beverages within a few hours, among youth in Alabama was slightly lower (15.0%) than the national average (18.3%) (Figure 11).
- Binge drinking among youth was comparable across regions. Region 3 had the highest percent of youth reporting binge drinking (16.3%) while Region 1 had the lowest percent (14.0%); however, these differences were not statistically significant (Figure 11).

Figure 11—Percent of youth (ages 12-20 years) in Alabama who reported binge drinking (5 or more alcoholic beverages within a few hours) by region, 2006-2008

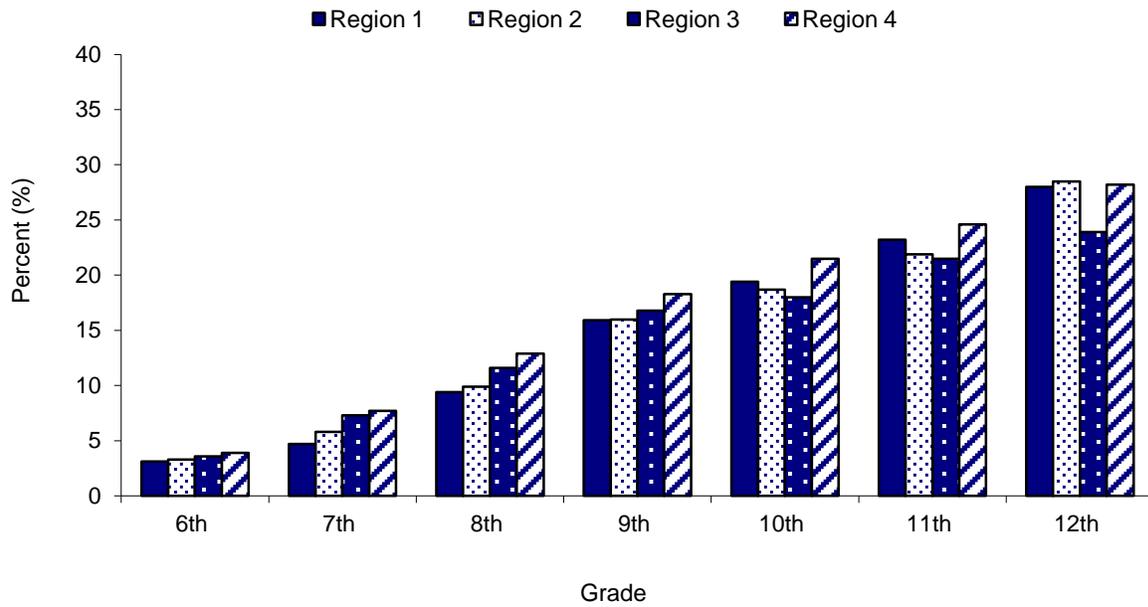


Source: NSDUH

Data combined across multiple years due to small sample size.

- The percent of youth in Alabama who reported binge drinking increased as school grade increased (Figure 12).
- Binge drinking was comparable across regions, with a slightly higher percent of youth in 6th-11th grades in Region 4 reporting binge drinking compared with the other regions (Figure 12).

Figure 12—Percent of youth in Alabama who reported binge drinking (5 or more alcoholic beverages within a few hours) by grade and region, 2009-2010

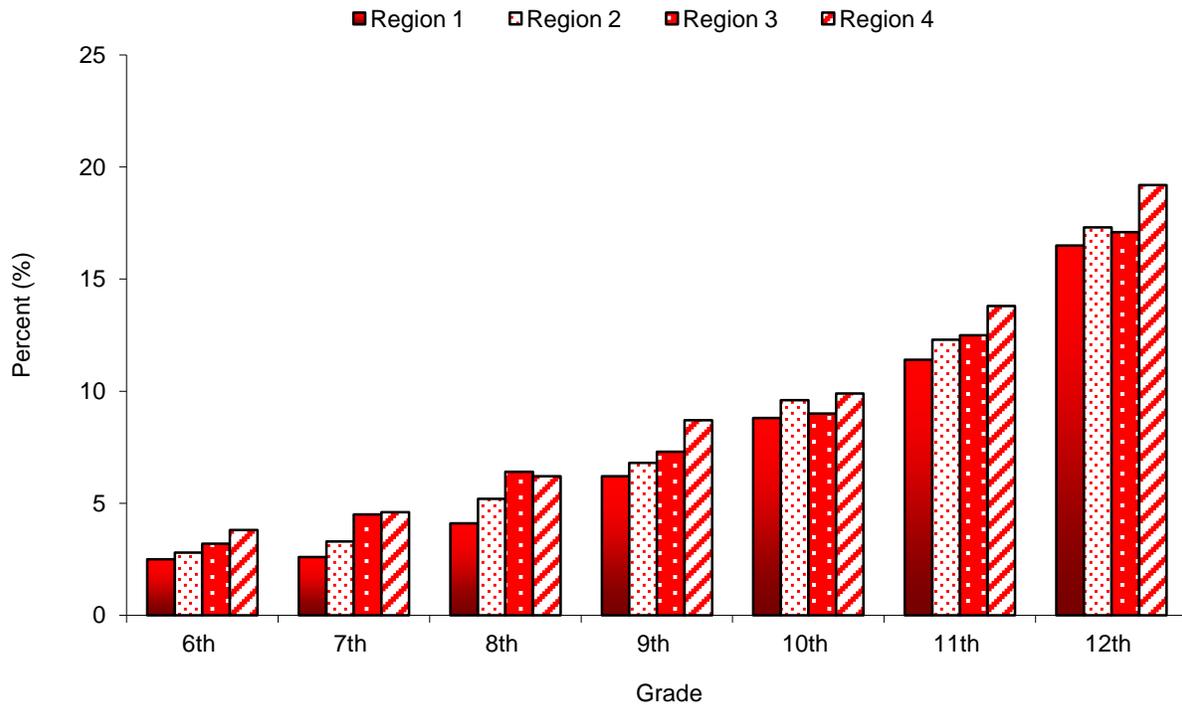


Source: Alabama Pride Survey

Youth—Alcohol-Related Risky Behaviors

- The percent of youth in Alabama who reported driving a car after or while drinking increased as school grade increased (Figure 13).
- Drinking and driving among youth was comparable across regions, although region 4 had a higher percent of youth in 9th-12th grades who reported drinking and driving compared with the other regions (Figure 13).

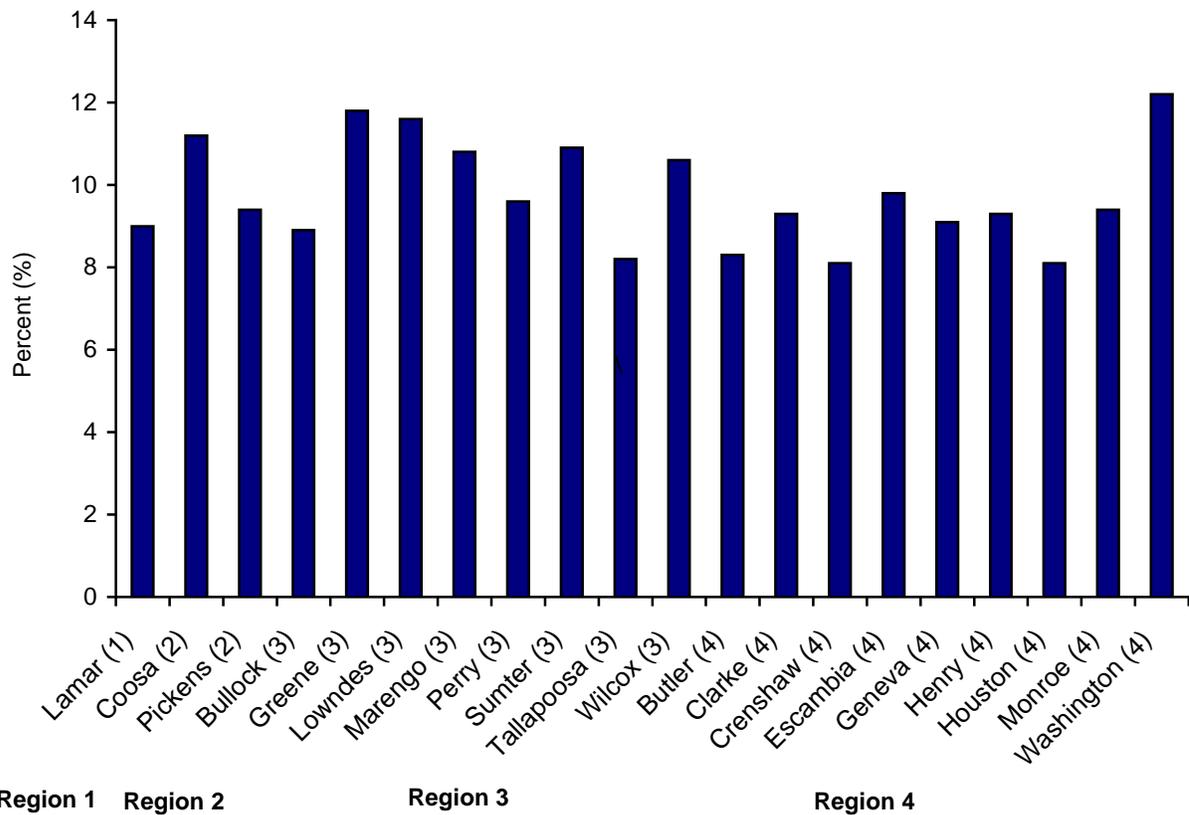
Figure 13—Percent of youth in Alabama who reported driving a car after or while drinking alcohol by grade and region, 2009-2010



Source: Alabama Pride Survey

- Of the top 20 counties in Alabama with the highest percent of youth who reported driving under the influence of alcohol, 13 were located in the Black Belt.
- Region 4 had the most counties in the top 20 (n=9), followed by region 3 (n=8), region 2 (n=2), and region 1 (n=1).

Figure 14—Top 20 counties in Alabama with highest percent of youth who reported driving a car after or while drinking alcohol by county and region, 2009-2010

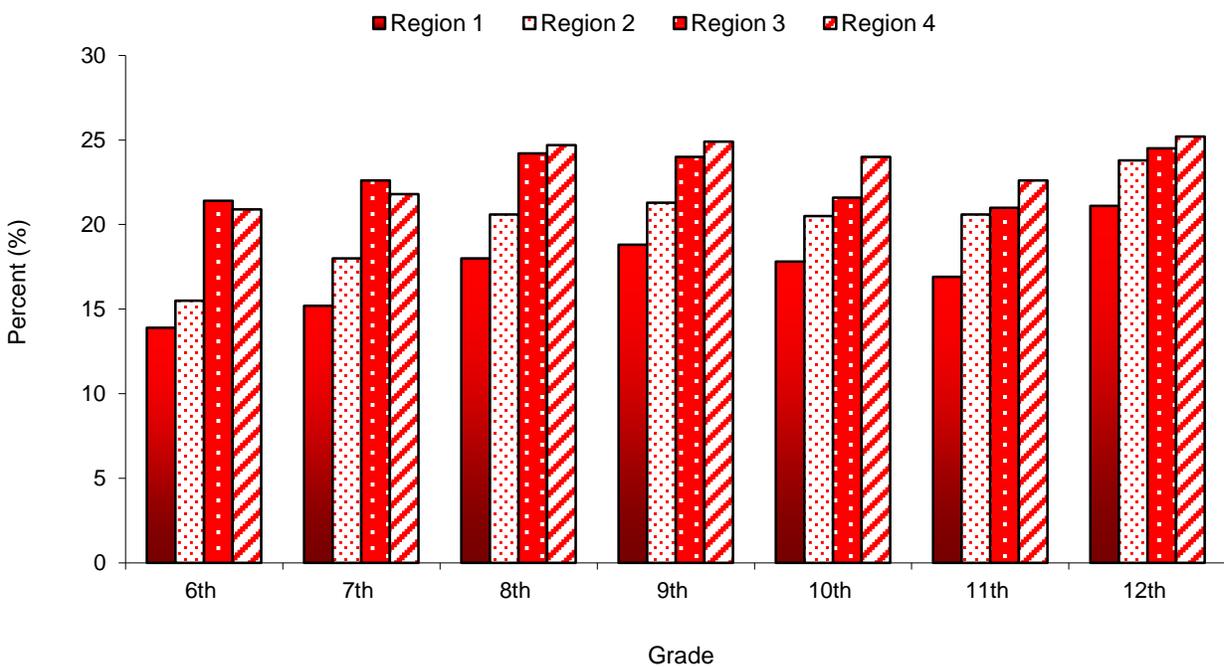


Source: Alabama Pride Survey

*Region in parentheses

- The percent of youth in Alabama who reported riding in a car with a driver who had been drinking alcohol was comparable among 6th through 12th graders (Figure 15).
- Overall, the percent of youth who reported riding in a car with a driver who had been drinking alcohol was lowest in region 1 and highest in region 4 (Figure 15).

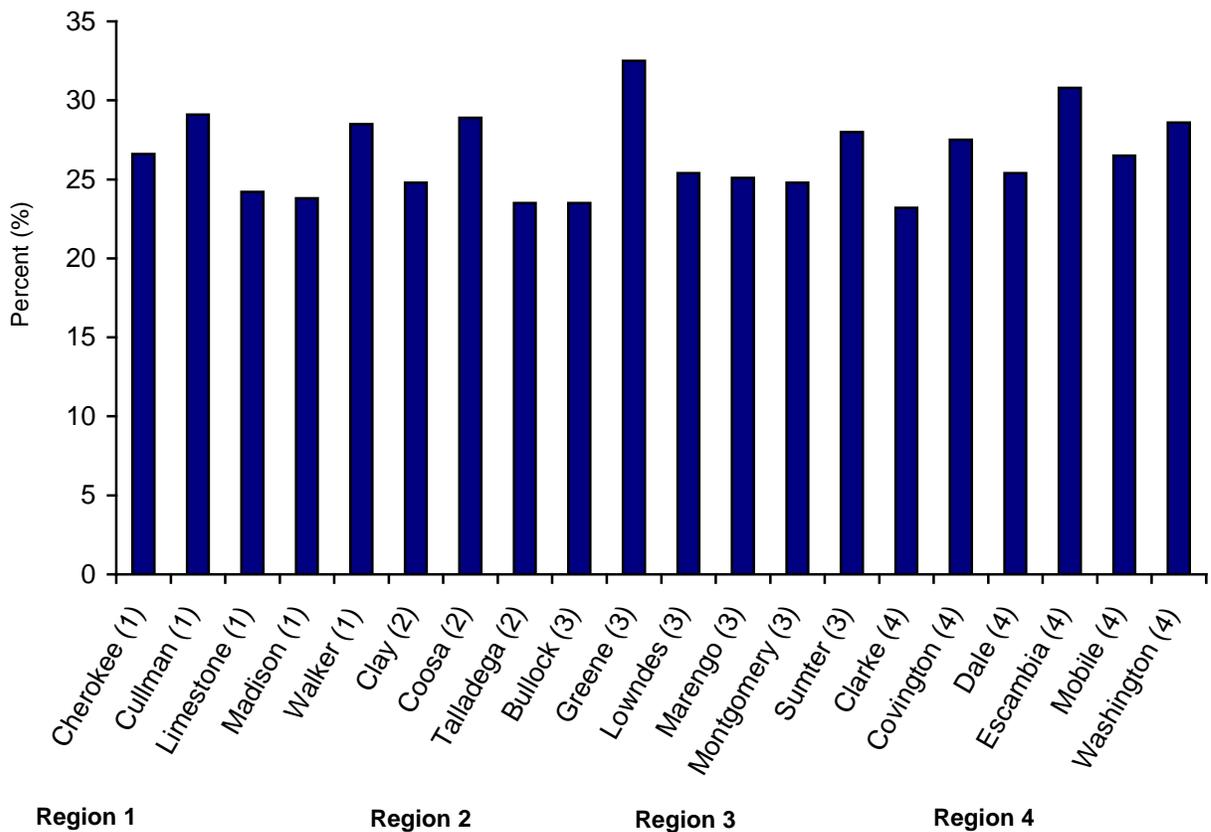
Figure 15—Percent of youth in Alabama who reported riding in a car with a driver who had been drinking alcohol by grade and region, 2009-2010



Source: Alabama Pride Survey

- Of the top 20 counties in Alabama with the highest percent of youth who reported riding in a car with a driver who was under the influence of alcohol, Regions 3 and 4 had 6 counties each followed by 5 counties in Region 1 and 3 counties in Region 2 (Figure 16).

Figure 16—Top 20 counties in Alabama with highest percent of youth who reported riding in a car with a driver who had been drinking alcohol by county and region, 2009-2010



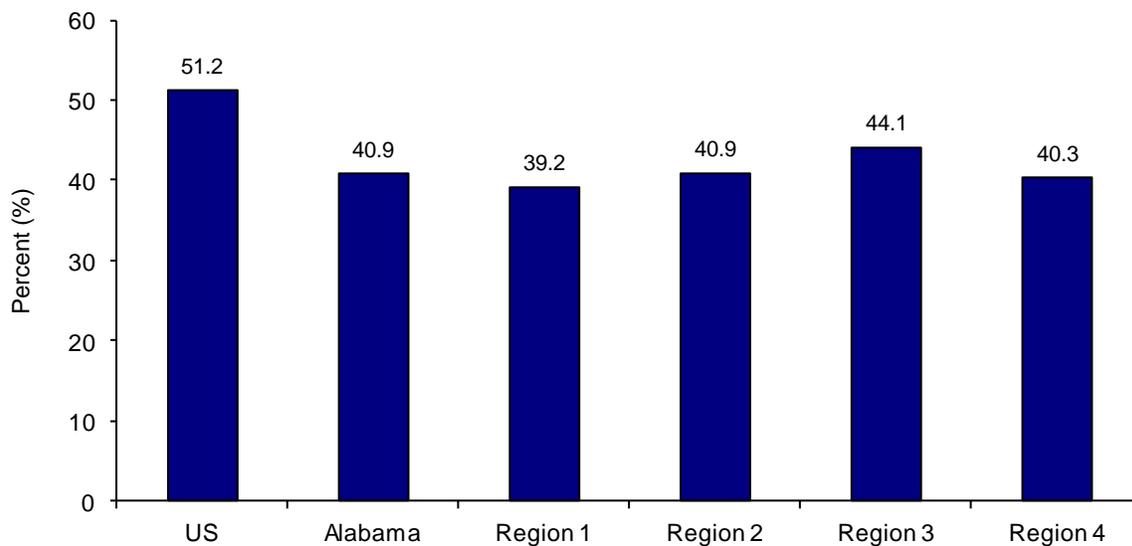
Source: Alabama Pride Survey

*Region in parentheses

Adults and Youth Combined—Current Alcohol Use

- Alcohol consumption during the past month among individuals ages 12 years and older in Alabama (40.9%) was less than the national average (51.2%) (Figure 17).
- Region 1 had the lowest percent of alcohol consumption during the past month (39.2%) while Region 3 had the highest percent (44.1); however, these differences were not statistically significant.

Figure 17—Alcohol use in past month among individuals ages 12 years and older in Alabama by region, 2006-2008



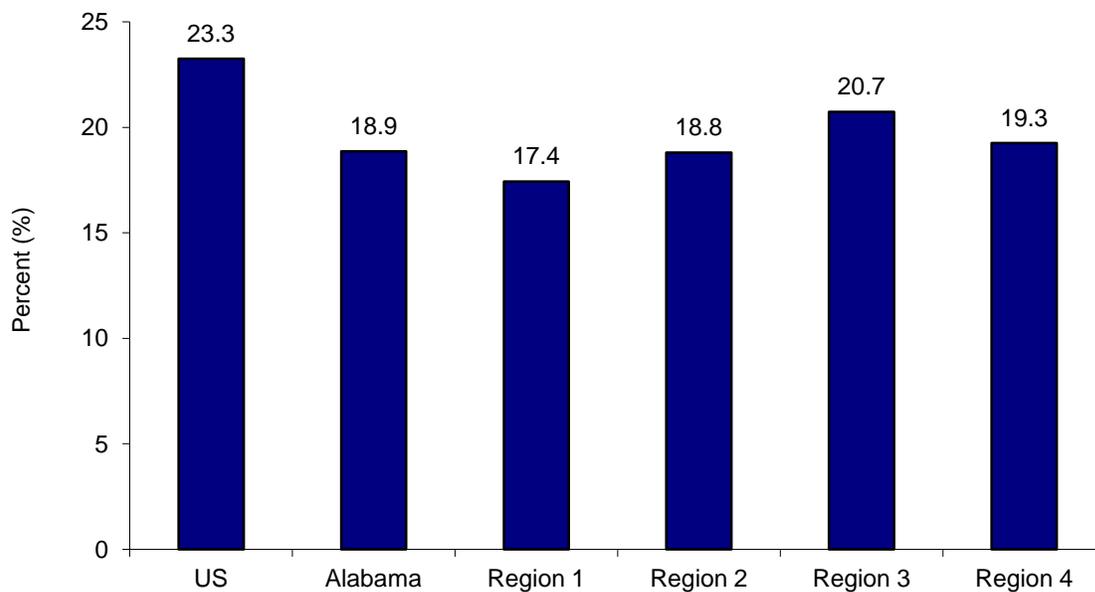
Source: NSDUH

Data combined across multiple years due to small sample size.

Adults and Youth Combined—Excessive Use of Alcohol

- Binge alcohol drinking during the past month among individuals, ages 12 years and older in Alabama, (18.9%) was less than the national average (23.3%) (Figure 18).
- Region 1 had the lowest percent of individuals who reported binge alcohol drinking during the past month (17.4%) while Region 3 had the highest percent of individuals who reported binge drinking (20.7%); however, these differences were not statistically significant (Figure 18).

Figure 18—Percent of Alabama individuals (ages 12 years and older) who reported binge drinking (5 or more alcoholic drinks within a couple of hours) during past month by region, 2006-2008



Source: NSDUH

Data combined across multiple years due to small sample size.

Tobacco

Tobacco

- The minimum legal age to purchase, use, possess, or transport tobacco products in Alabama is 19 years.
- Alabama ranks 46th out of all 50 states plus the District of Columbia for its tax rate on cigarettes, which is 42.5¢ per pack; however, cities and counties may impose an additional tax.
- The Alabama Alcoholic Beverage Control (ABC) Board is responsible for issuing tobacco permits, vendor education programs, and enforcement. The number of tobacco inspections, compliance checks, and citations issued increased between fiscal year 2003-04 and 2009-10 (Table 6).

Table 6—Number of tobacco inspections and compliance checks completed and citations issued by the Alabama ABC Board by fiscal year, 2004-2010

	FY 2004- 2005	FY 2005- 2006	FY 2006- 2007	FY 2007- 2008	FY 2008- 2009	FY 2009- 2010
Tobacco inspections	2,814	6,306	9,030	11,265	12,559	11,727
Tobacco compliance checks	2,069	2,470	3,596	3,229	3,397	3,362
Tobacco citations	245	298	388	333	302	324

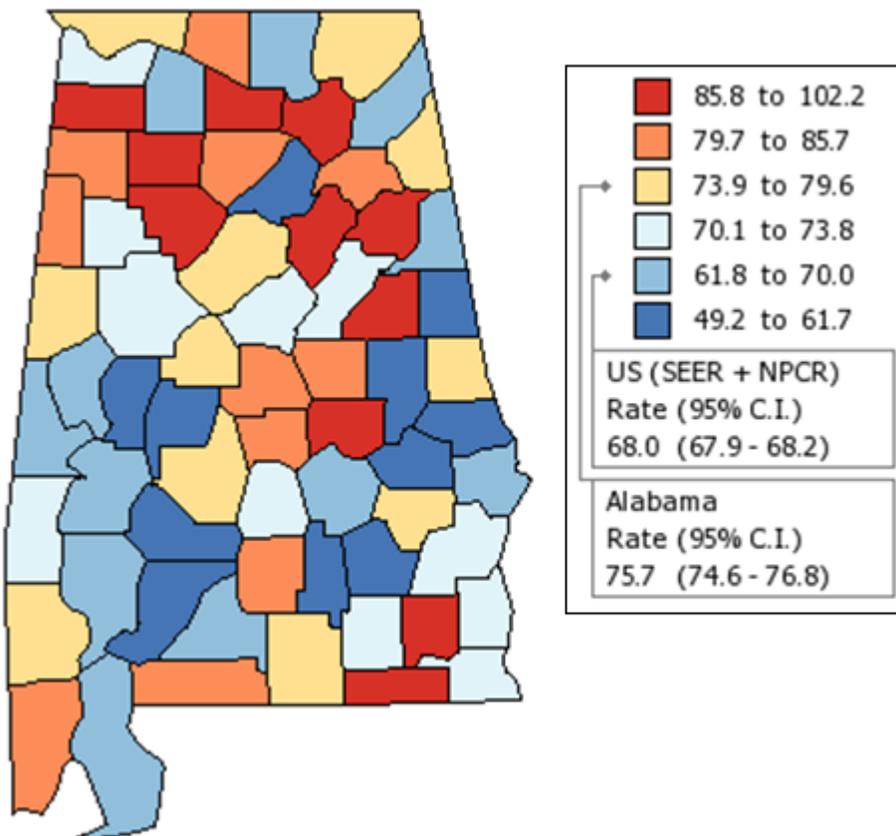
Source: Alabama ABC Board

Tobacco Consequences

Tobacco-Related Morbidity

- Tobacco use is associated with an increased risk of morbidity.
- In 2003-2007, the age-adjusted incidence rate for lung and bronchus cancers was higher for Alabama (75.7 per 100,000 persons) compared with the national average (68.0 per 100,000 persons) (Figure 19).
- Five of the eleven counties with the highest incidence rates (85.8 to 102.2 per 100,000 persons) were located in Region 1 in Alabama.

Figure 19—Age-adjusted incidence rate (per 100,000) for lung and bronchus cancers in Alabama by county, 2003-2007

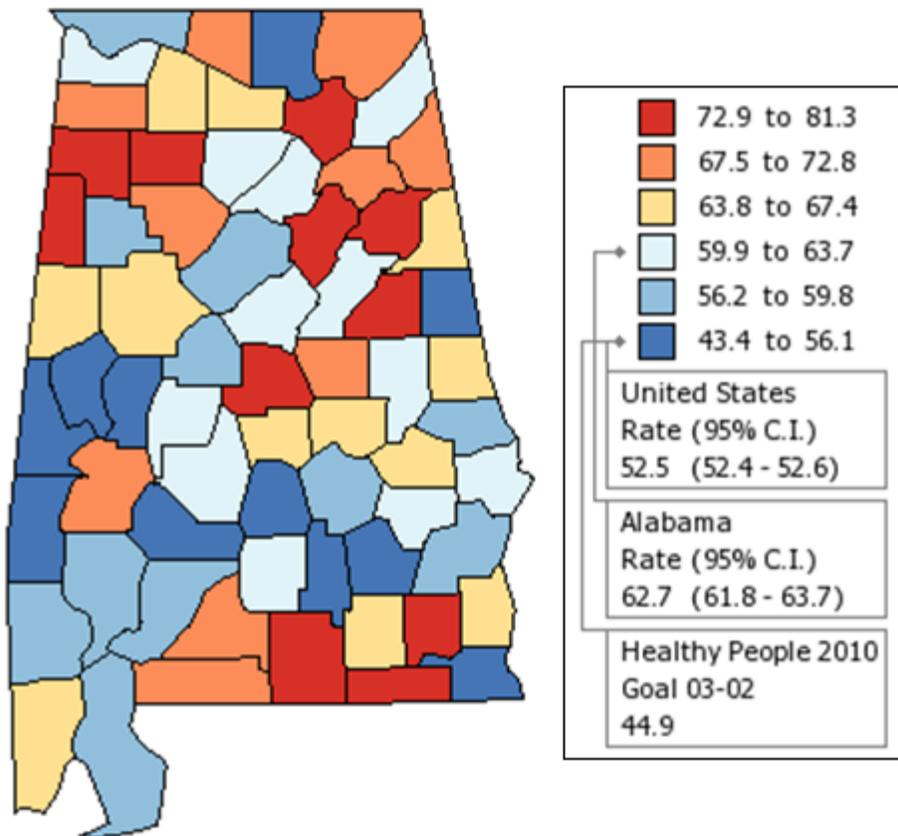


Source: <http://statecancerprofiles.cancer.gov>

Tobacco-Related Mortality

- In 2003-2007, the age-adjusted mortality rate for lung and bronchus cancers was higher for Alabama (62.7 per 100,000 persons) compared with the national average (52.5 per 100,000 persons) (Figure 20).
- The mortality rate for lung and bronchus cancers was higher in the northern part of the state, with 12 of the 18 counties in Region 1 having an age-adjusted mortality rate higher than the state average (Figure 20).

Figure 20—Age-adjusted mortality rate (per 100,000) for lung and bronchus cancers in Alabama by county, 2003-2007



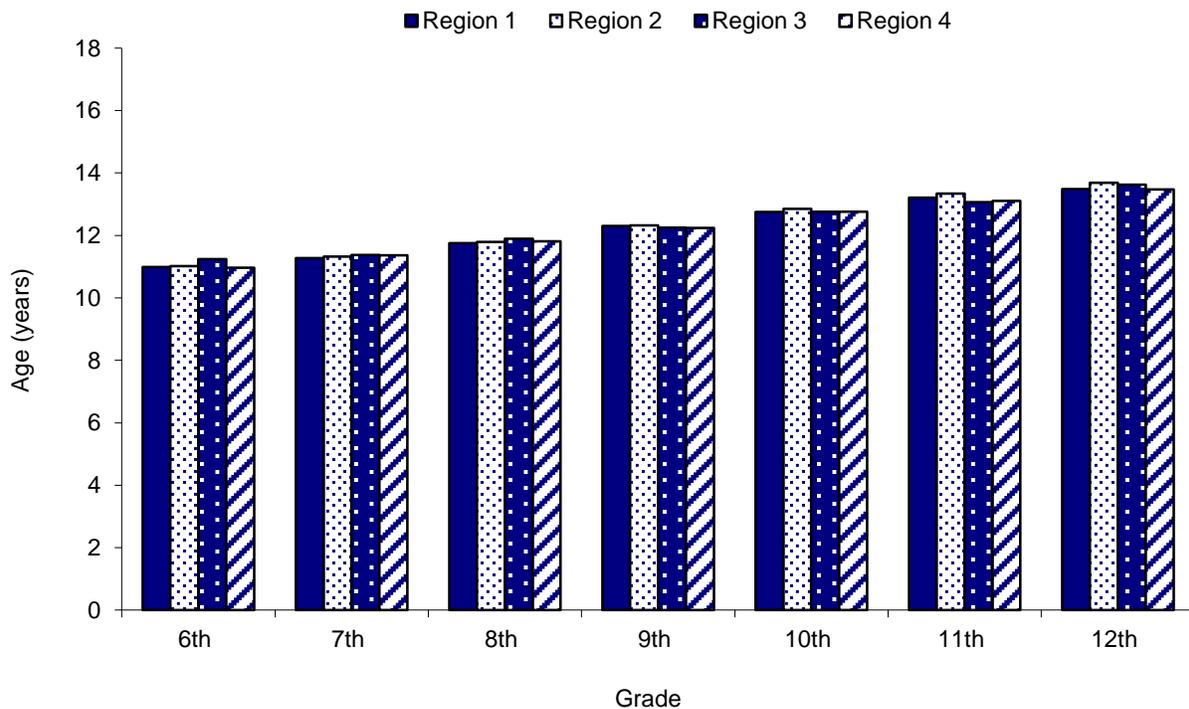
Source: <http://statecancerprofiles.cancer.gov>

Tobacco Consumption

Youth—Age at First Use of Tobacco

- During 2009-2010, the average age at first use of tobacco increased as grade increased for each region (Figure 21).
- The average age at first use of tobacco was comparable across regions within each school grade (Figure 21).

Figure 21—Average age at first use of tobacco by youth in 6th-12th grades in Alabama, 2009-2010

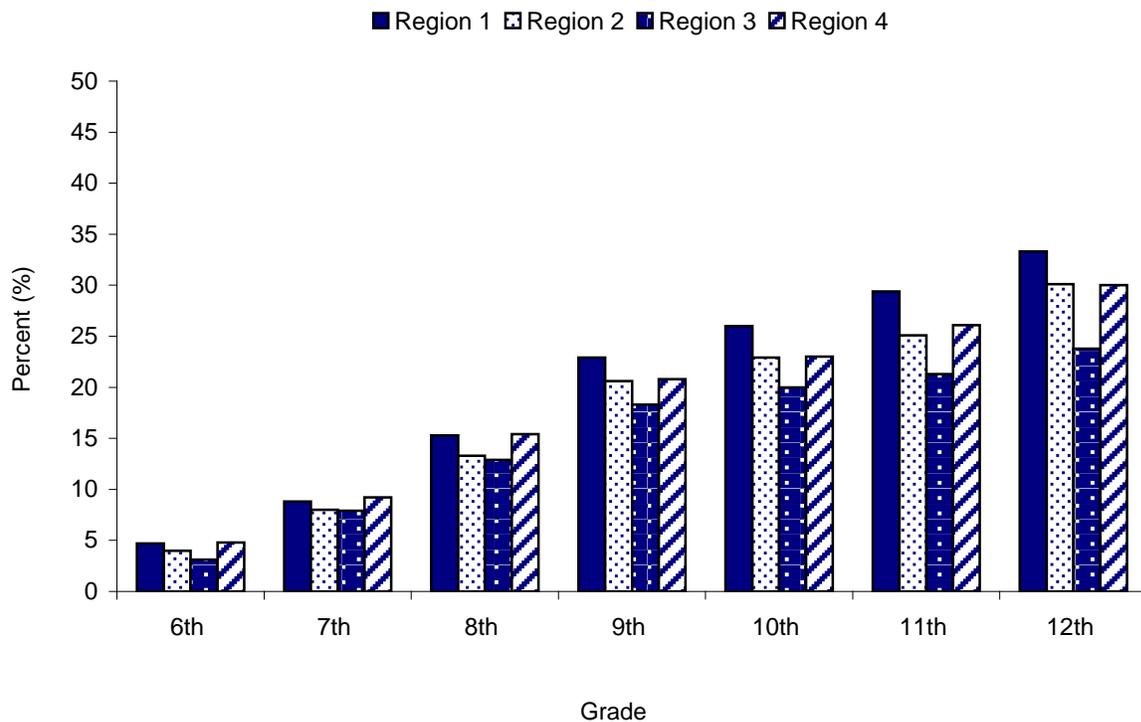


Source: Alabama Pride Survey

Youth—Current Tobacco Use

- The percent of students who reported tobacco use during the past month increased as school grade increased for each region (Figure 22).
- Within each school grade, Region 1 had the highest percent of youth who reported tobacco use during the past month while Region 3 had the lowest percent who reported tobacco use during the past month (Figure 22).

Figure 22—Percent of youth in Alabama who reported tobacco use during the past month by school grade and region, 2009-2010

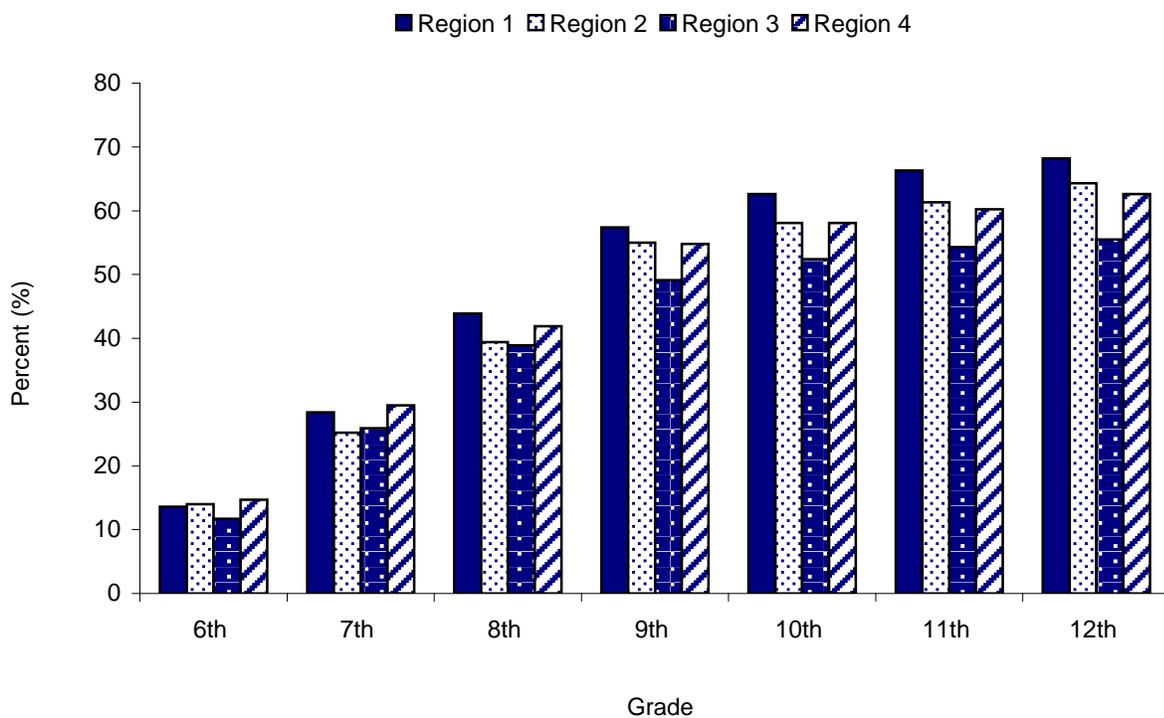


Source: Alabama Pride Survey

Youth—Tobacco Use by Friends

- The percent of youth who reported that their friends use tobacco also increased as grade increased (Figure 23).
- Region 1 had the highest percent of youth who reported that their friends use tobacco while Region 3 had the lowest percent who reported that their friends use tobacco use (Figure 23).

Figure 23—Percent of youth in Alabama who reported that their friends use tobacco by school grade and region, 2009-2010

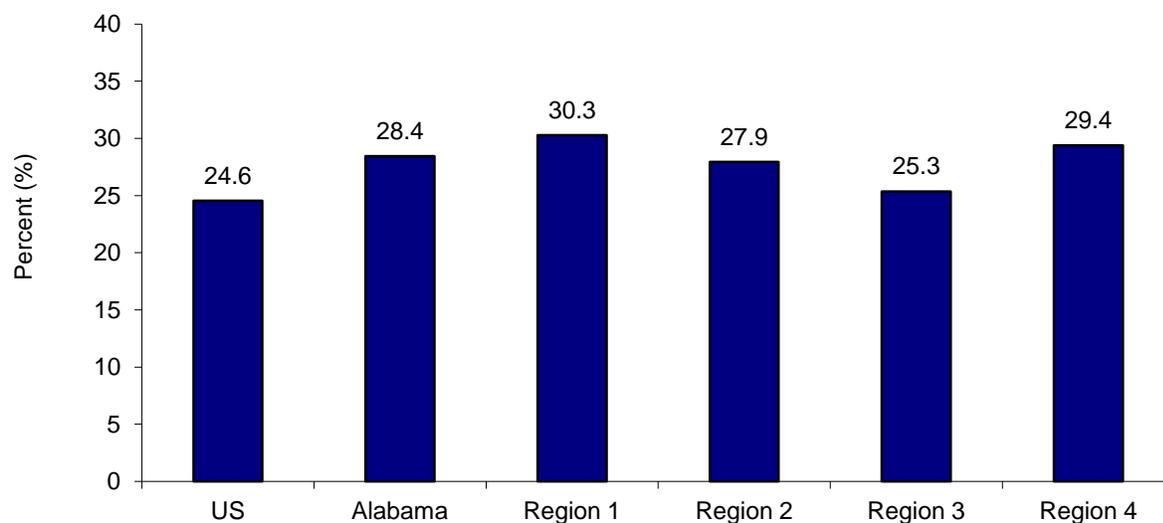


Source: Alabama Pride Survey

Adults and Youth Combined—Current Tobacco Use

- Cigarette smoking during the past month among individuals 12 years and older in Alabama was higher (28.4%) than the national average (24.6%) (Figure 24).
- Cigarette smoking was comparable across regions. Region 1 had the highest percent of individuals who reported smoking cigarettes during the past month (30.3%) while Region 3 had the lowest percent (25.3%); however, these differences were not statistically significant.

Figure 24—Percent of individuals ages 12 years and older in Alabama who reported smoking cigarettes during the past month by region, 2006-2008

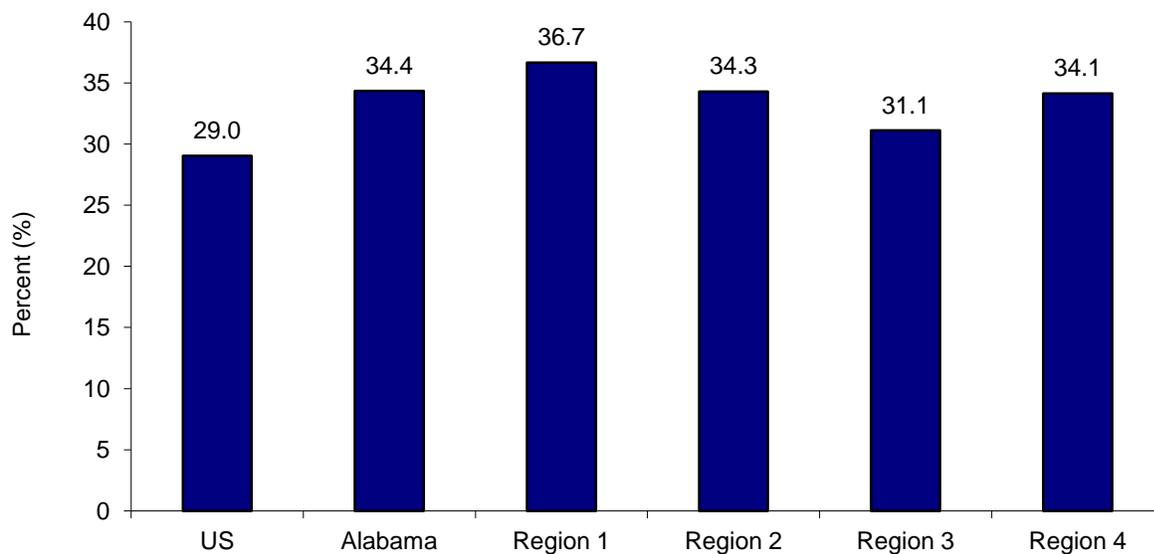


Source: NSDUH

Data combined across multiple years due to small sample size.

- Any tobacco use during the past month among individuals 12 years and older in Alabama (34.4%) was higher than the national average (29.0%) (Figure 25).
- Any tobacco use was comparable across regions. Region 1 had the highest percent of individuals who reported any tobacco use during the past month (36.7%) while Region 3 had the lowest percent (31.1%); however, these differences were not statistically significant.

Figure 25—Percent of individuals ages 12 years and older in Alabama who reported using any tobacco products during the past month by region, 2006-2008



Source: NSDUH

Data combined across multiple years due to small sample size.

Other Drugs

Other Drugs Classification

- The Controlled Substances Act of 1970 established 5 schedules of drugs to regulate the manufacture and distribution of these drugs in the United States based on potential for abuse and accepted medical uses (21 Code of Federal Regulations Part 1308). Commonly abused drugs by schedule are presented in Table 7.
 - Schedule I: No approved medical uses
 - Schedule II: Requires a non-refillable prescription and order form
 - Schedule III, IV: Requires a prescription; limited refills are allowed; prescriptions may be called-in by the physician
 - Schedule V: Some availability over the counter

Table 7—Commonly abused drugs by category and schedule

Category	Name	Schedule
Cannabinoids	Hashish	I
	Marijuana	I
Depressants	Barbituates	II, III, V
	Benzodiazepines	IV
	Flunitrazepam	IV
	GHB (gamma-hydroxybutyrate)	I
	Methaqualone	I
Dissociative Anesthetics	Ketamine	III
	PCP (phencyclidine)	I, II
Hallucinogens	LSD (lysergic acid diethylamide)	I
	Mescaline	I
	Psilocybin	I
Opioids and morphine derivatives	Codeine	II, III, IV, V
	Fentanyl	I, II
	Heroin	I
	Morphine	II, III
	Opium	II, III, V
	Oxycodone HCL	II
	Hydrocodone bitartrate, acetaminophen	II
Stimulants	Amphetamine	II
	Cocaine	II
	MDMA (methylenedioxymethamphetamine)	I
	Methamphetamine	II
	Methylphenidate	II
	Nicotine	Not scheduled
Other compounds	Anabolic steroids	III
	DXM (dextromethorphan)	Not scheduled
	Inhalants	Not scheduled

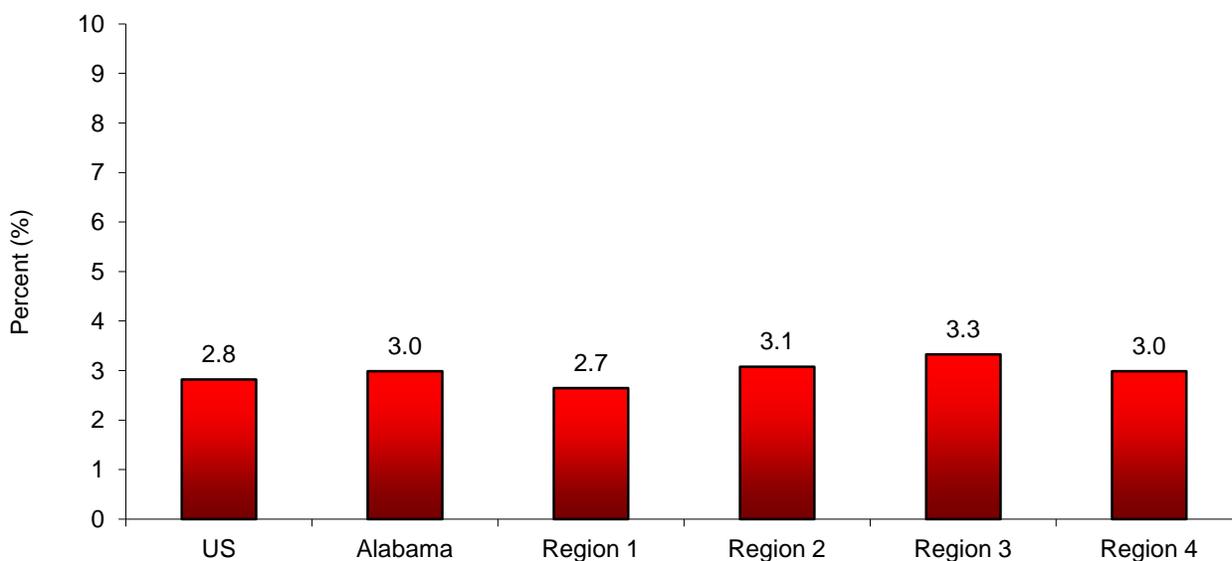
Source: National Institute of Drug Abuse <http://www.drugabuse.gov/DrugPages/DrugsofAbuse.html>

Other Drugs Consequences

Adults and Youth Combined—Illicit Drug Abuse or Dependence

- Illicit drug use, including recreational and experimental use, can result in dependence or abuse and a need for treatment services.
- The percent of individuals in Alabama, ages 12 years and older, who abused or were dependent on illicit drugs during the past year (3.0%) was similar to the national average (2.8%) (Figure 26).
- Illicit drug abuse or dependence was comparable across regions. Region 3 had the highest percent of persons with illicit drug abuse or dependence during the past year (3.3%) while Region 1 had the lowest percent (2.7%); however, these differences were not statistically significant (Figure 26).

Figure 26—Percent of individuals ages 12 years and older in Alabama who abused or were dependent on illicit drugs during the past year by region, 2006-2008



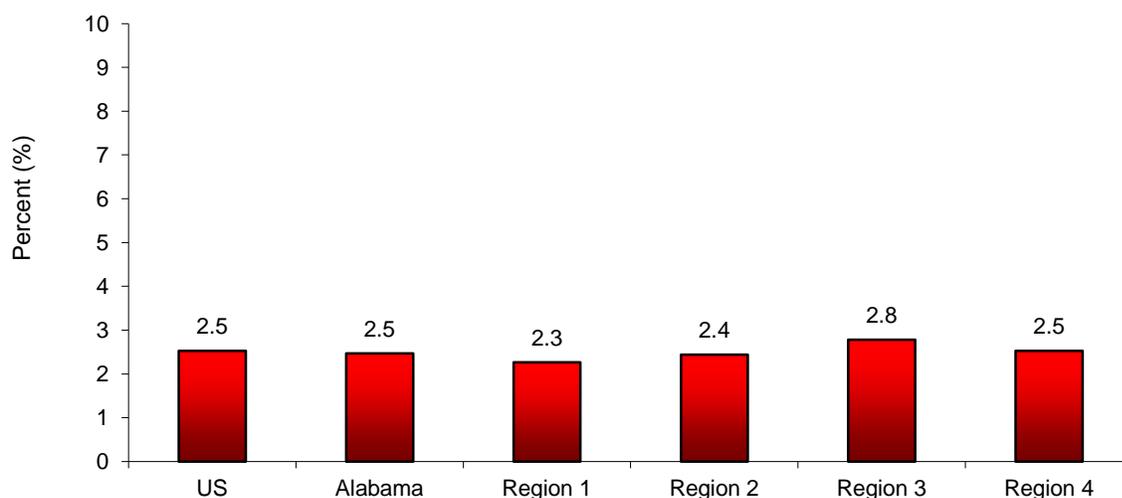
Source: NSDUH

Data combined across multiple years due to small sample size.

Adults and Youth Combined—Needing Treatment for Illicit Drug Abuse or Dependence

- The percent of individuals in Alabama, ages 12 years and older, who needed but did not receive treatment for illicit drug abuse or dependence during the past year was similar (2.5%) to the national average (2.5%) (Figure 27).
- Needing but not receiving treatment for illicit drug abuse or dependence was comparable across regions in Alabama. Region 3 had the highest percent of persons who needed but did not receive treatment for illicit drug abuse or dependence during the past year (2.8%) while Region 1 had the lowest percent (2.3%); however, these differences were not statistically significant (Figure 27).

Figure 27—Percent of individuals ages 12 years and older in Alabama who needed but did not receive treatment for illicit drug abuse or dependence during the past year by region, 2006-2008



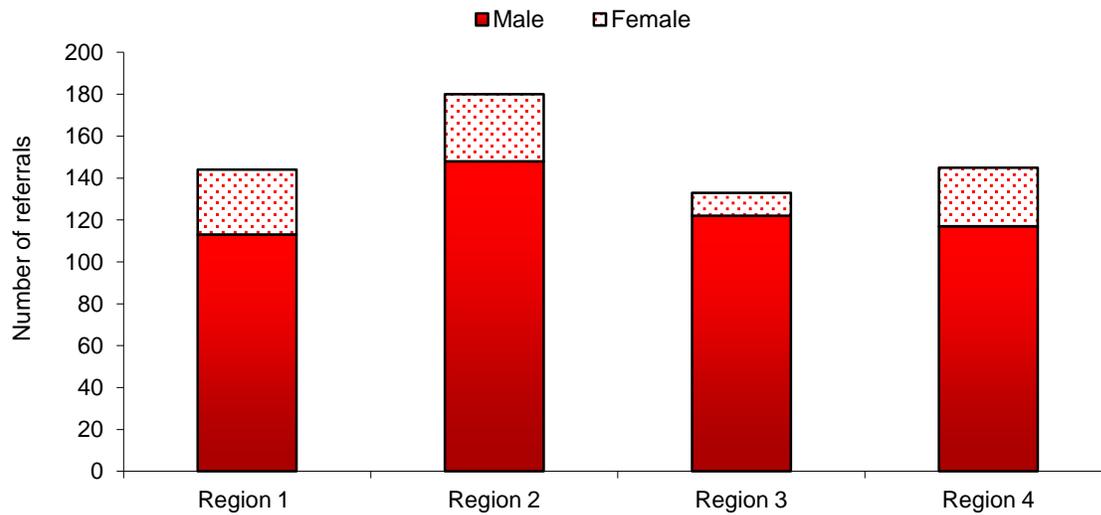
Source: NSDUH

Data combined across multiple years due to small sample size.

Youth—Substance Abuse Treatment Referrals

- The number of youth referrals for substance abuse by the Department of Youth Services between January 1, 2008 and December 30, 2008 varied by region, with Region 2 having the most referrals and Region 3 having the least referrals (Figure 28).
- More Alabama boys were referred for substance abuse treatment than Alabama girls in each region (Figure 28).

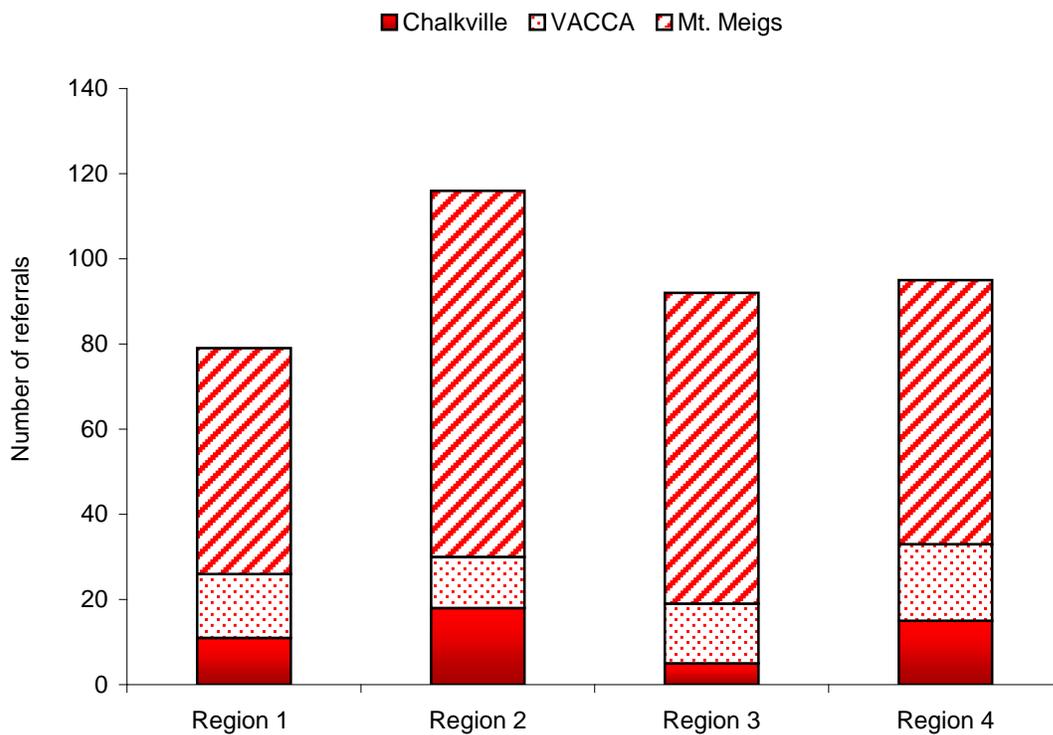
Figure 28—Number of Alabama youth referred to substance abuse treatment by gender and region, 2008



Source: Alabama Department of Youth Services

- The Department of Youth Services (DYS) has 3 residential facilities that provide substance abuse treatment for youth. Chalkville is the residential facility for girls and VACCA and Mt. Meigs are the residential facilities for boys.
- The number of youth referred to DYS residential facilities was comparable across regions, with Region 1 having the least number of referrals (Figure 29).

Figure 29—Number of Alabama youth referrals to DYS facilities by region, 2008

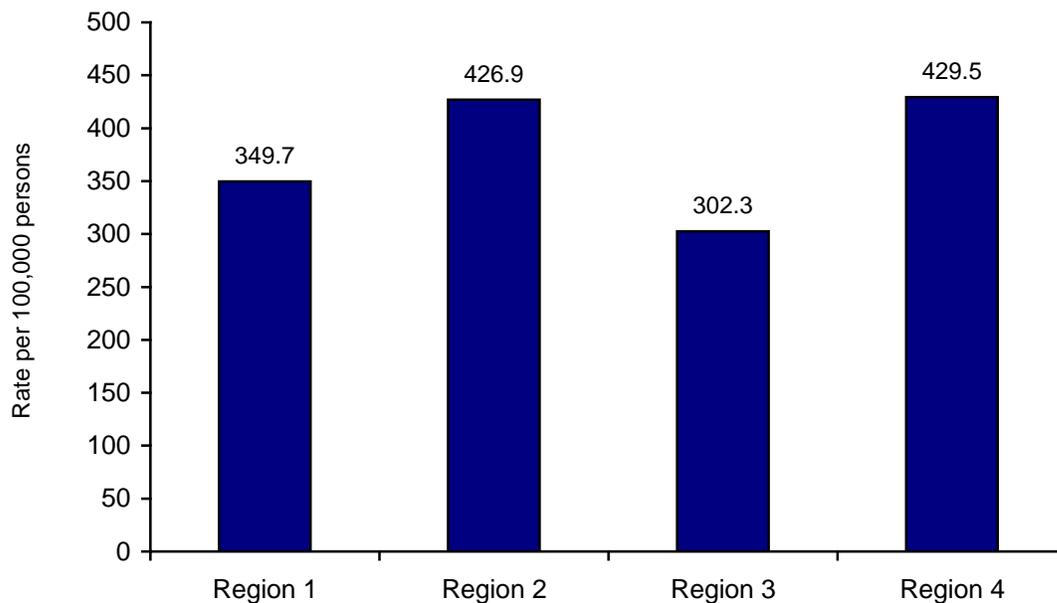


Source: Alabama Department of Youth Services

Drug-Related Arrests

- Criminal arrests for the sale or possession of drugs are also possible consequences of substance abuse.
- In 2009, 17,156 adults and youth were arrested for the sale or possession of drugs in Alabama, with adult possession being the most common offense.
- Regions 2 and 4 had the highest arrest rates per 100,000 persons at 426.9 and 429.5, respectively, followed by Region 1 at 349.7 and Region 3 at 302.3 (Figure 30).

Figure 30—Arrest rate per 100,000 for the sale and possession of drugs in Alabama by region, 2009

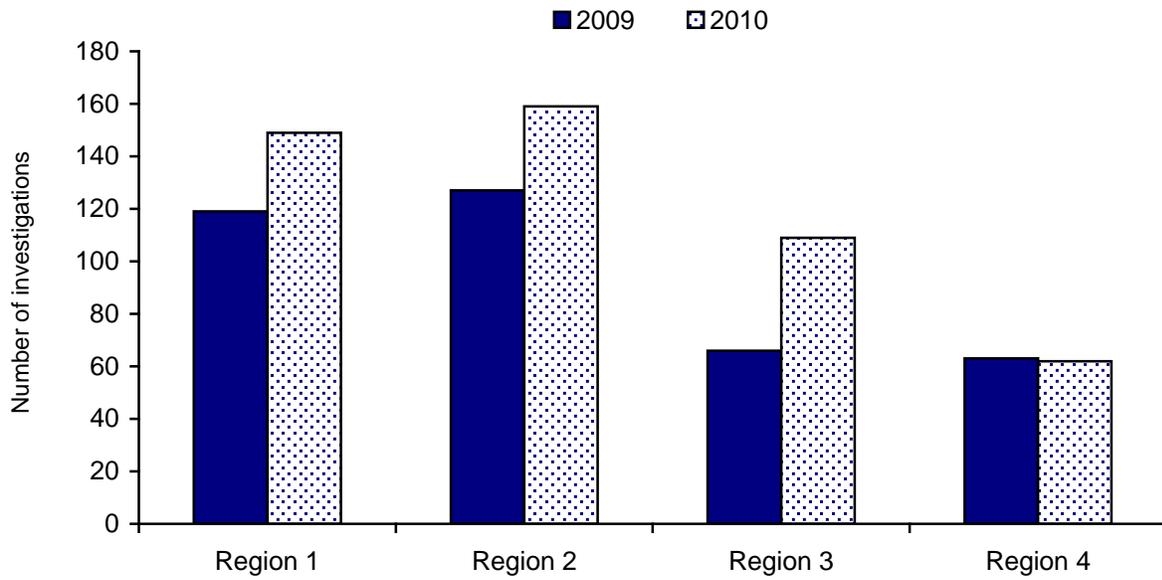


Source: ACJIC

Data may include duplicate counts and may be affected by resources available to enforce laws.

- Child abuse and neglect allegations investigated by Alabama Department of Human Resources (DHR) increased in each region except Region 4 between fiscal year 2009 and fiscal year 2010 (Figure 31).

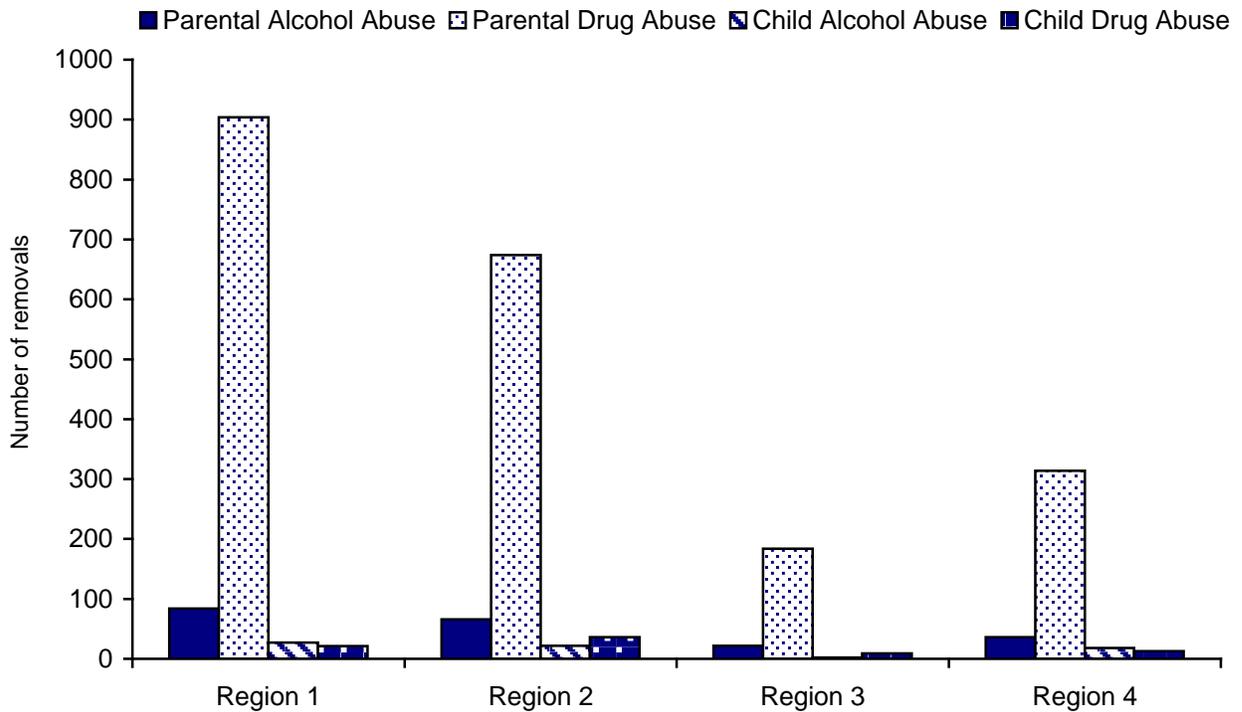
Figure 31—Indicated child abuse/neglect allegations investigated by Alabama Department of Human Resources by region, 2009-2010



Source: Alabama DHR

- In 2010, parental drug abuse was the main reason for removal of children from family homes by DHR. Region 1 had the most children removed by DHR followed by Region 2, Region 4 and Region 3 (Figure 32).

Figure 32—Number of child removals from family homes by Alabama Department of Human Resources due to substance related issue, 2010



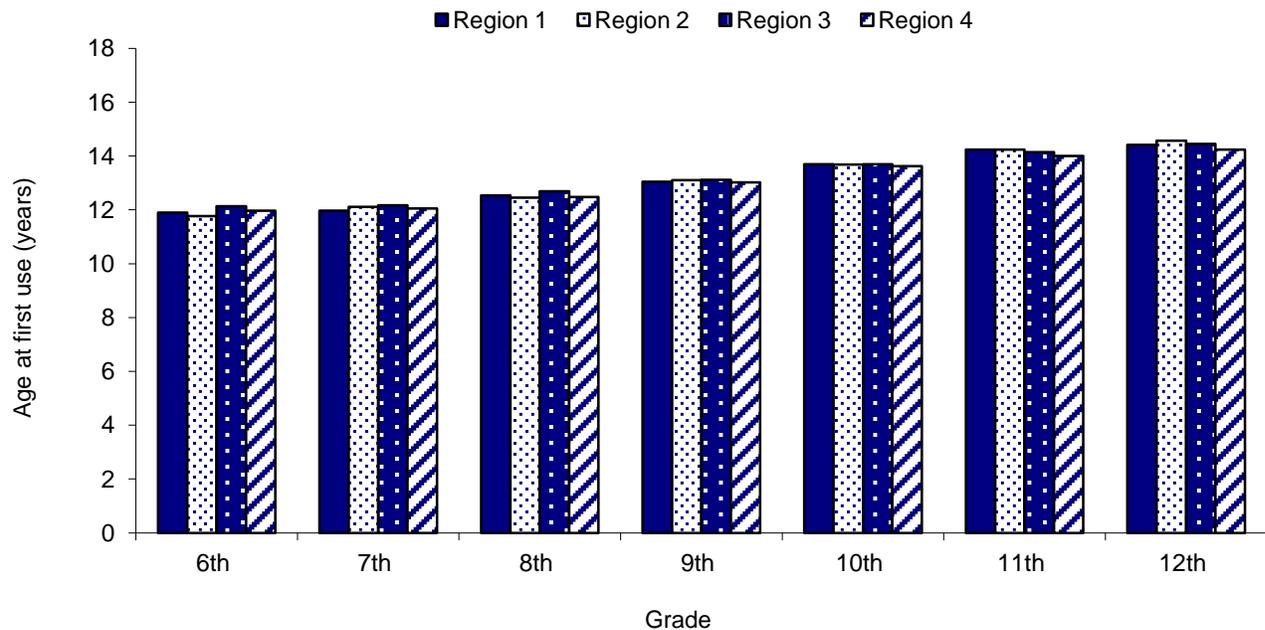
Source: Alabama DHR

Other Drugs Consumption

Youth—Age at First Use of Marijuana

- During 2009-2010, the average age at first use of marijuana in Alabama increased as school grade increased, but was comparable across regions (Figure 33).

Figure 33—Average age at first use of marijuana for Alabama youth in 6th-12th grades, by grade and region, 2009-2010

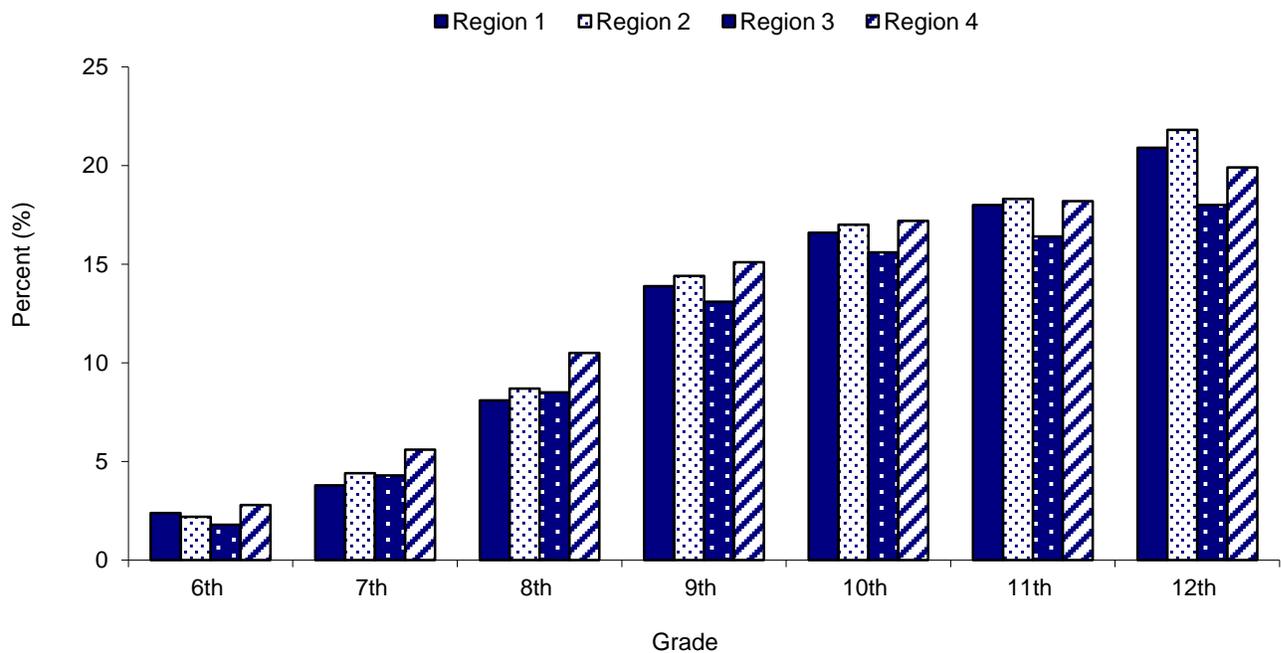


Source: Alabama Pride Survey

Youth—Current Marijuana Use

- The percent of youth in Alabama who reported using marijuana during the past month increased as grade increased.
- Current marijuana use was comparable across regions, with Region 3 having slightly lower percent of students reporting current marijuana use in 9th-12th grades (Figure 34).

Figure 34—Percent of Alabama youth who reported marijuana use during the past month by grade and region, 2009-2010

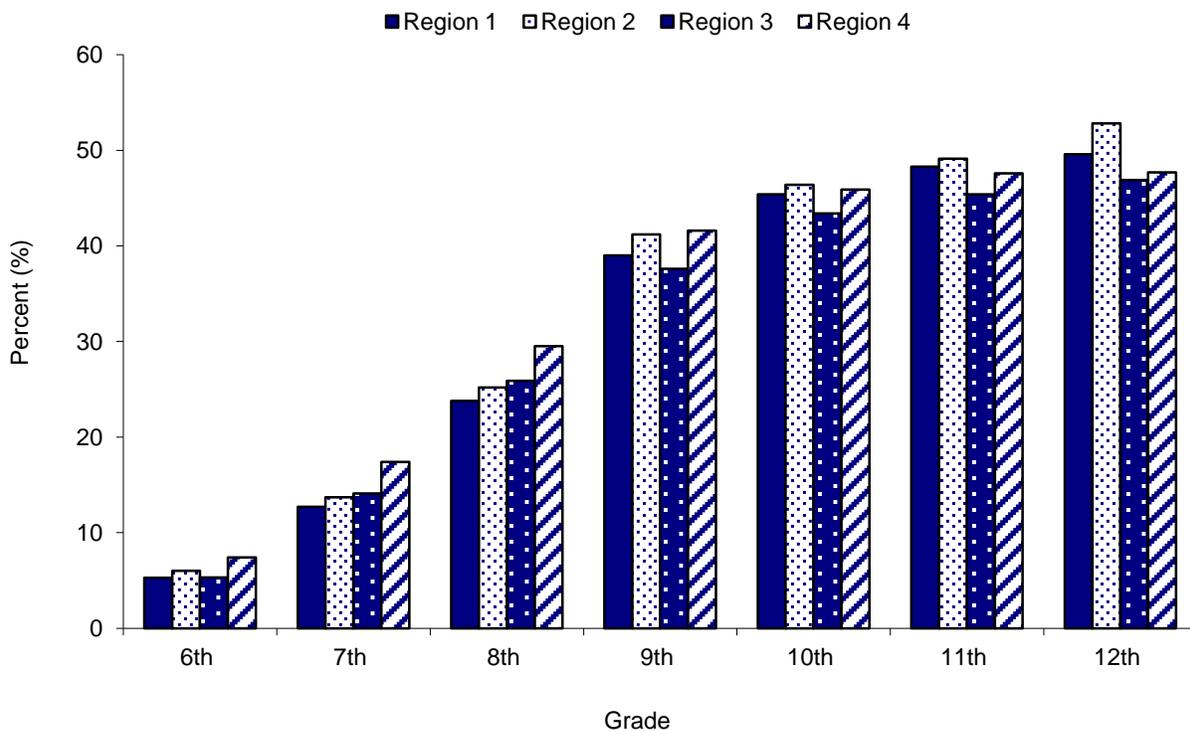


Source: Alabama Pride Survey

Youth—Marijuana Use by Friends

- The percent of Alabama youth who reported that their friends use marijuana increased as grade increased for each region (Figure 35).
- Use of marijuana by friends was comparable across regions, with Region 3 having the lowest percent of students in 9th-12th grades who reported that their friends use marijuana (Figure 35).

Figure 35—Percent of Alabama youth who reported that their friends use marijuana by grade and region, 2009-2010

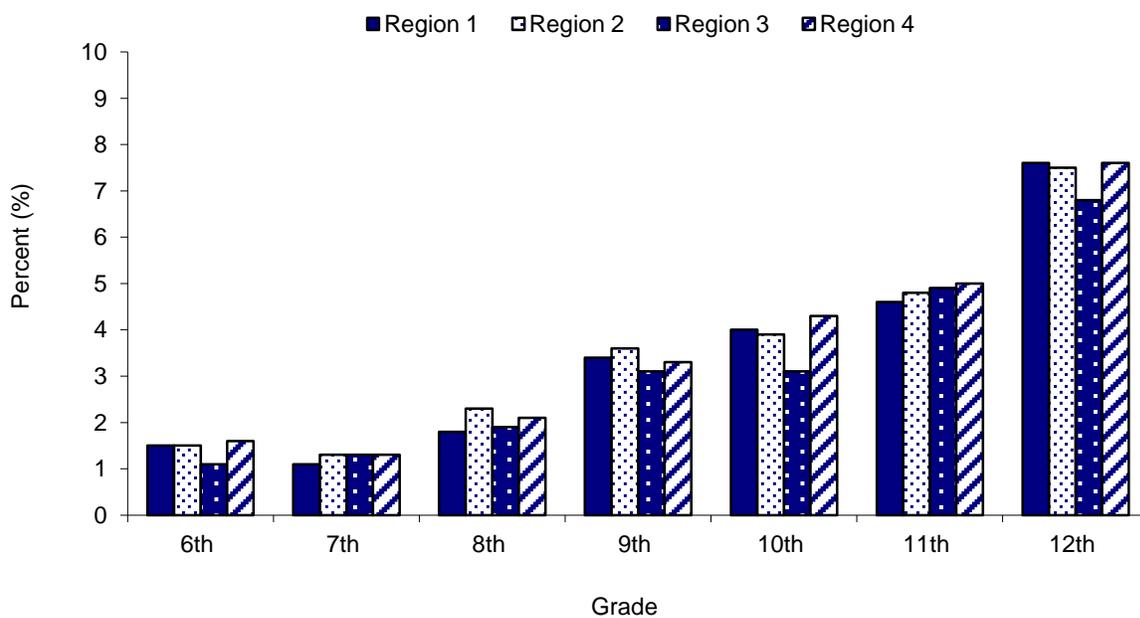


Source: Alabama Pride Survey

Youth—Current Cocaine Use

- Overall, less than 2% of 6th and 7th graders reported cocaine use during the past month compared with approximately 7% of 12th graders (Figure 36).
- Current cocaine use was similar across regions within each grade (Figure 36).

Figure 36—Percent of Alabama youth who reported cocaine use during the past month by grade and region, 2009-2010

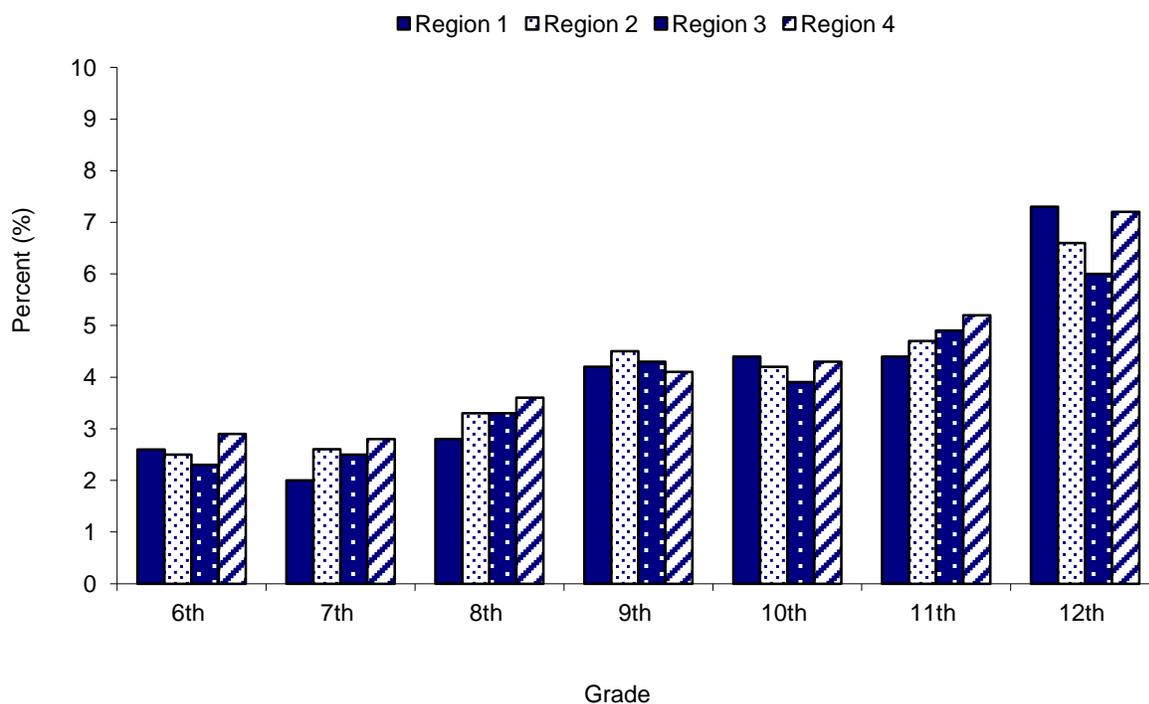


Source: Alabama Pride Survey

Youth—Current Inhalant Use

- Overall, less than 3% of 6th and 7th graders in Alabama reported inhalant use during the past month compared with approximately 7% of 12th graders in Alabama (Figure 37).
- Current inhalant use was similar across regions within each grade (Figure 37).

Figure 37—Percent of Alabama youth who reported using inhalants during the past month by grade and region, 2009-2010

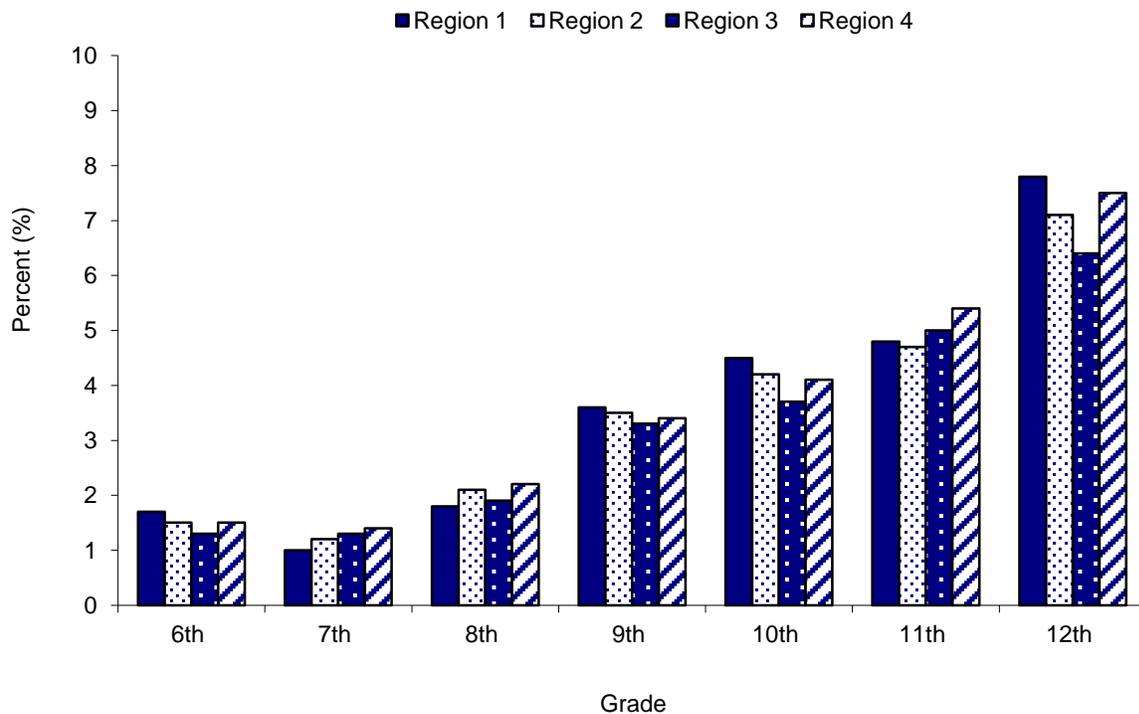


Source: Alabama Pride Survey

Youth—Current Hallucinogen Use

- The percent of Alabama students who reported using hallucinogens during the past month increased as school grade increased (Figure 38).
- Current hallucinogen use was similar across regions within each grade, although slight regional differences were observed for youth in 9th-12th grades (Figure 38).

Figure 38—Percent of Alabama youth who reported hallucinogen use during the past month by grade and region, 2009-2010

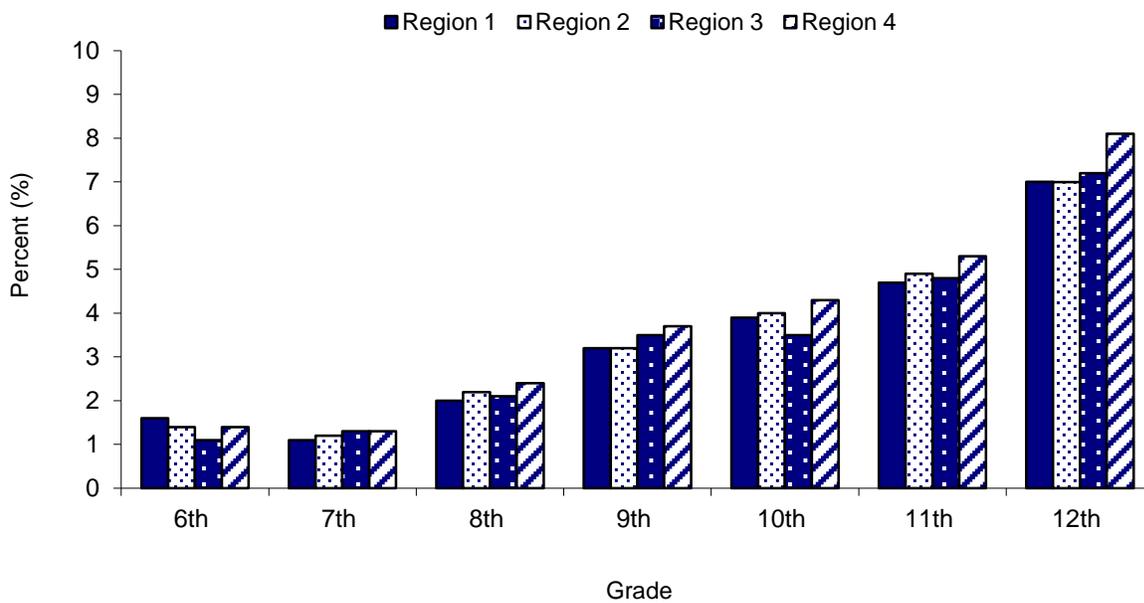


Source: Alabama Pride Survey

Youth—Current Ecstasy Use

- The percent of Alabama youth who reported using ecstasy during the past month increased as school grade increased for each region (Figure 39).
- Current ecstasy use was similar across regions within each grade, with Region 4 having a slightly higher use in 9th-12th grades (Figure 39).

Figure 39—Percent of Alabama youth who reported ecstasy use during the past month by grade and region, 2009-2010

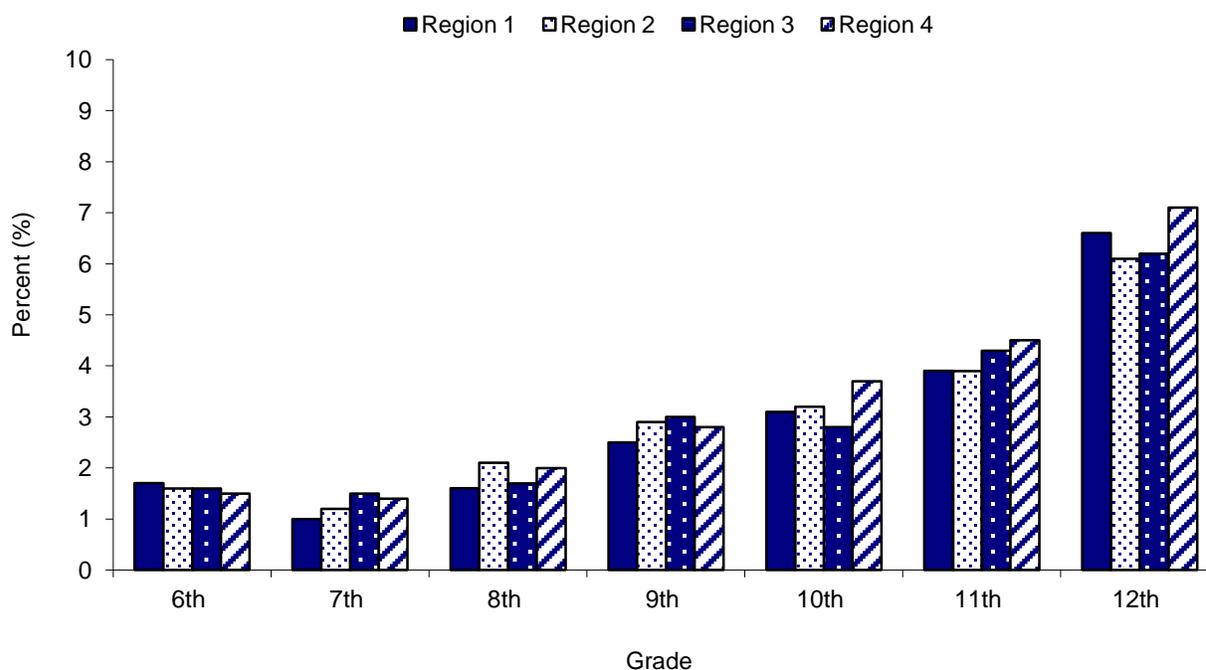


Source: Alabama Pride Survey

Youth—Current Methamphetamine Use

- The percent of Alabama youth who reported using methamphetamine during the past month increased as school grade increased (Figure 40).
- Among 12th grade students, Region 4 had the highest percent of methamphetamine use during the past month (7.1%), followed by Region 1 (6.6%), Region 3 (6.2%), and Region 2 (6.1%) (Figure 40).

Figure 40—Percent of Alabama youth who reported methamphetamine use during the past month by grade and region, 2009-2010

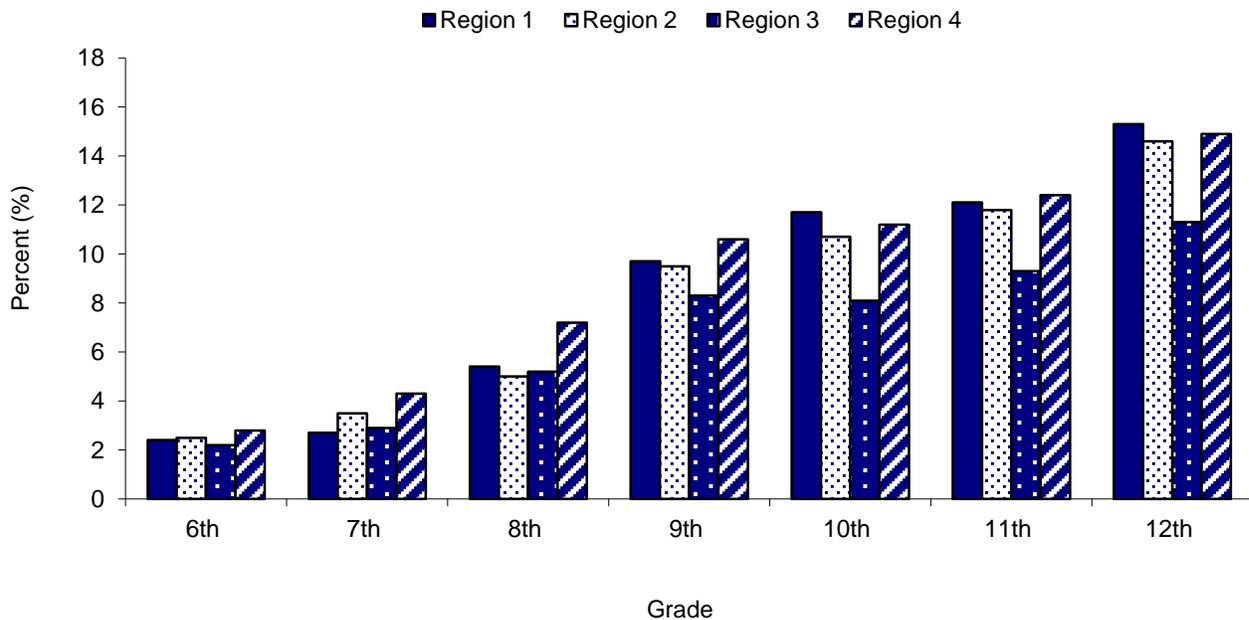


Source: Alabama Pride Survey

Youth—Non-Medical Use of Prescription Drugs

- The percent of Alabama youth who reported non-medical use of prescription drugs increased as school grade increased for each region (Figure 41). Note: Non-medical use of prescription drugs reflects any use during the student’s lifetime.
- For youth in 10th-12th grades, Region 3 had the lowest percent of non-medical use of prescription drugs while Region 1 had the highest percent of non-medical use of prescription drugs. In 6th-9th grades, Region 4 had the highest percent of non-medical use of prescription drugs (Figure 41).

Figure 41—Percent of Alabama youth who reported non-medical use of prescription drugs by grade and region, 2009-2010

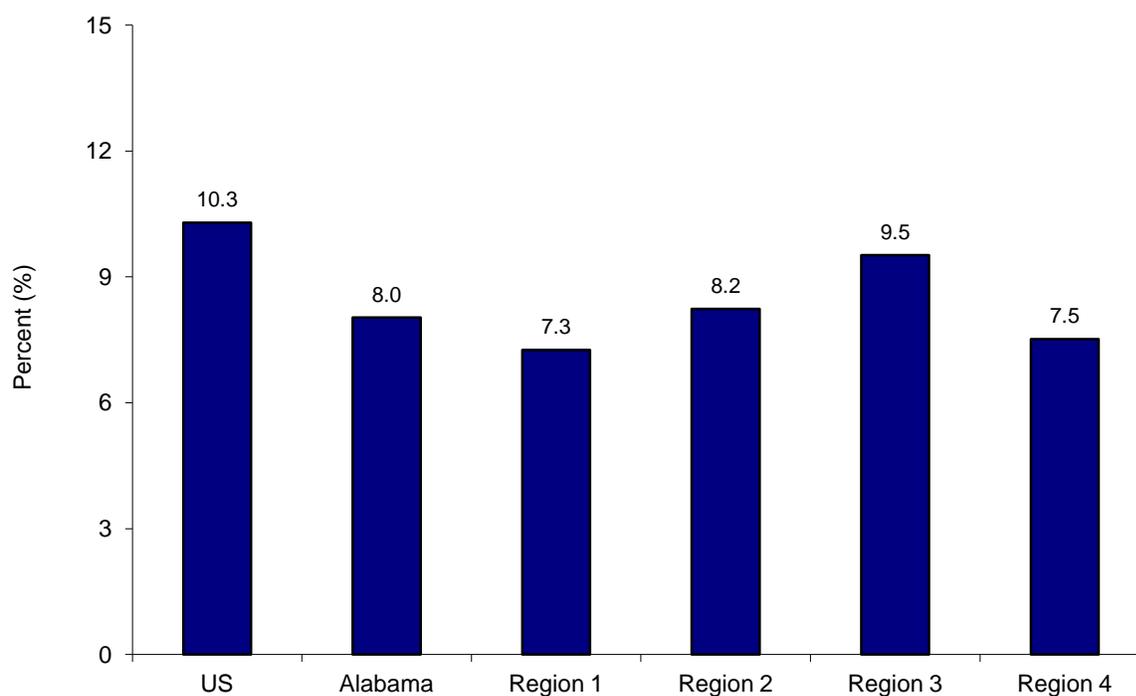


Source: Alabama Pride Survey

Adults and Youth Combined—Marijuana Use

- Marijuana use during the past year among individuals ages 12 years and older in Alabama (8.0%) was lower than the national average (10.3%) (Figure 42).
- Marijuana use was comparable across regions. Region 3 had the highest percent of individuals who reported marijuana use during the past year (9.5%) while Region 1 had the lowest percent (7.3%); however, these differences were not statistically significant (Figure 42).

Figure 42—Percent of individuals ages 12 years and older in Alabama who reported marijuana use during the past year by region, 2006-2008



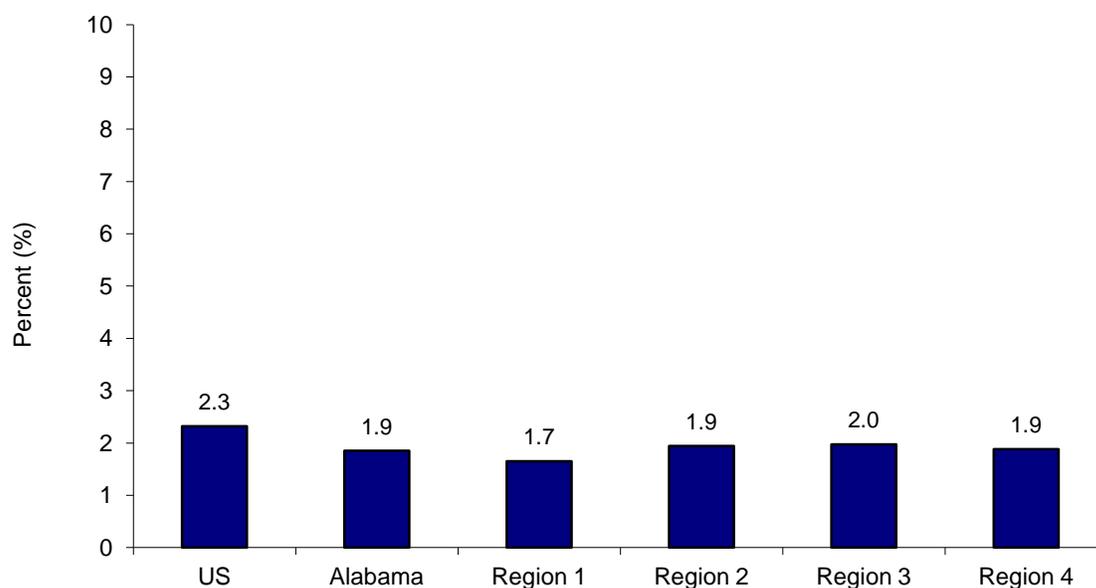
Source: NSDUH

Data combined across multiple years due to small sample size.

Adults and Youth Combined—Cocaine Use

- Cocaine use during the past year among individuals ages 12 years and older in Alabama (1.9%) was similar to the national average (2.3%) (Figure 43).
- Cocaine use was comparable across regions. Region 3 had the highest percent of individuals who reported cocaine use during the past year (2.0%) while Region 1 had the lowest percent (1.7%); however, these differences were not statistically significant (Figure 43).

Figure 43—Percent of individuals ages 12 years and older in Alabama who reported cocaine use during past year by region, 2006-2008



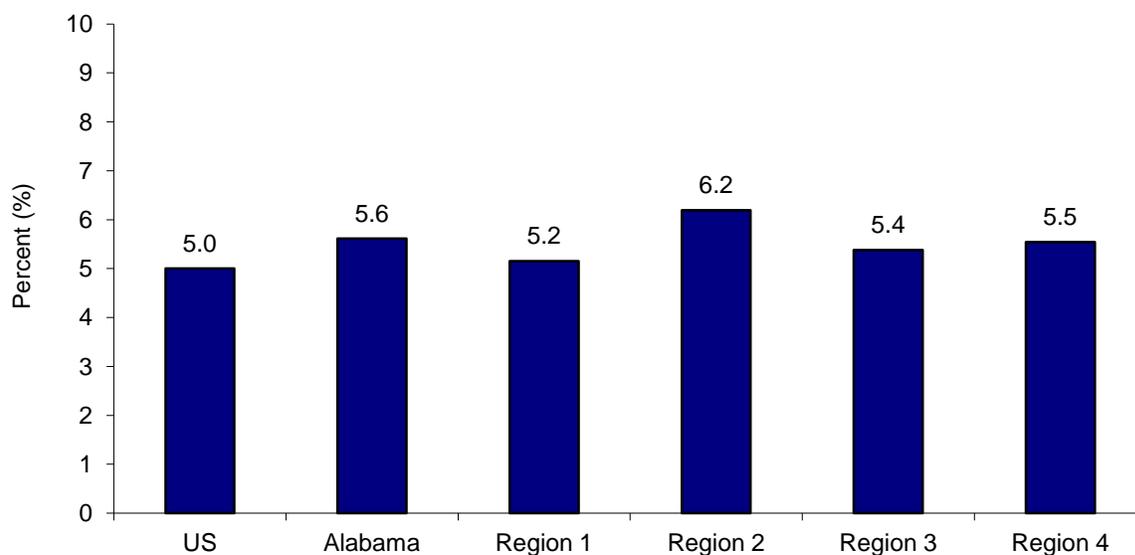
Source: NSDUH

Data combined across multiple years due to small sample size.

Adults and Youth Combined—Non-Medical Use of Prescription Pain Relievers

- Non-medical use of prescription pain relievers during the past year among individuals 12 years and older in Alabama (5.6%) was higher than the national average (5.0%) (Figure 44).
- Non-medical use of prescription pain relievers was comparable across regions. Region 2 had the highest percent of persons who reported non-medical use of prescription pain relievers during the past year (6.2%) while Region 1 had the lowest percent (5.2%); however, these differences were not statistically significant (Figure 44).

Figure 44—Percent of individuals ages 12 years and older in Alabama who reported non-medical use of prescription pain relievers during the past year by region, 2006-2008



Source: NSDUH

Data combined across multiple years due to small sample size.

References

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Appendix A: Substance Abuse Services in Alabama

The Alabama Department of Mental Health is the state agency authorized to supervise, coordinate, and establish standards for all operations and activities related to mental health services in the State of Alabama. The department has three service divisions (Mental Illness, Intellectual Disabilities, and Substance Abuse Services) to address the mental health needs of Alabama residents.

The Substance Abuse Services Division is responsible for contracting with community providers, overseeing services provided, certifying programs, and promoting a continuum of prevention, intervention, treatment, and after-care services for substance abuse in Alabama.

Prevention Services

The Office of Prevention within the Substance Abuse Services Division coordinates and manages all prevention services and programs throughout the state, including the Strategic Prevention Framework, State Incentive Grant (2004-2009), Alabama Epidemiological Outcomes Workgroup, Synar (Tobacco Sales to Minors Program), and Regional Information Clearinghouses. *Currently, 22 prevention providers with locations in 20 counties receive funding from the State of Alabama to deliver substance abuse prevention services.*

Treatment Services

The Office of Treatment within the Substance Abuse Services Division coordinates and manages all treatment services throughout the state, including Adolescent Treatment, Adult Treatment, Co-occurring Disorders, Opiate Replacement Therapy, and Medicaid Services. *Currently, 42 certified community-based providers with locations in 45 counties receive funding from the State of Alabama to provide substance abuse treatment services. An additional 46 community-based providers are certified but are privately funded to deliver substance abuse treatment services.*

Note: All treatment providers in Alabama must be certified according to the standards developed by the Substance Abuse Services Division, with the exception of professionals in private practice.



Appendix B: Members of the Alabama Epidemiological Outcomes Workgroup

Table B1. Members of the Alabama Epidemiological Outcomes Workgroup 2010-2011

Name	Title	Agency
Burks, Henry	Chief Drug Inspector	Alabama Board of Pharmacy
Burleson, Erin	Prevention Consultant	Department of Mental Health
Castaldo, Lisa	Deputy Director	Governor's Office Faith-Based and Community Initiatives
Davis, Ashley	Graduate Intern	Department of Mental Health
Desmond, Kimberly	Program Supervisor	Department of Human Resources
Douglass, Charon	Prevention Consultant	Department of Mental Health
Folks, Brandon	Prevention Associate	Department of Mental Health
Fuller, Debra	State Youth Program Manager	MADD (Mothers Against Drunk Driving)
Hunter, Katrina	Compliance Specialist	Alcohol Beverage Control Board (ABC)
Leary, Joan	Project Manager of Southern Coast ATTC	Council of Community Mental Health Boards
Lewis, Marilyn	Safe & Drug Free Schools Specialist	Department of Education
McCladdie, Stephanie	Prevention Services Director	Department of Mental Health
Nelson, Loretta	Manager of Tobacco & License Tax Severance	Department of Revenue
Oakes, Robert	Assistant Executive Director	Pardons and Parole
Patton, Capt. Vance	Assistant Director of Special Operations	Alcohol Beverage Control Board (ABC)
Pendergast, Pat	Screening & Placement Coordinator	Department of Youth Services
Quinn, Michael	Program Coordinator	Department of Rehabilitation
Reese, Sondra	Epidemiologist	Department of Public Health
Rygiel, Robert	Court Management Analyst IV	Administrative Office of Courts
Shanks, Bill	Senior Statistician	Department of Public Safety
Withers, Ting	Epidemiologist	Department of Mental Health
Wright, Bennet	Statistician	Sentencing Commission

Appendix C: Methodology

The indicators that were included in this community-level epidemiological profile were selected based on the following criteria:

1. Availability of data at regional-level;
2. Relevance to ATOD consumption and consequences;
3. Data collection methods.

Many of the indicators included in this profile are reasonable measures of ATOD consumption and consequences at the regional-level in Alabama. This profile includes consumption data for youth and consumption data for persons 12 years and older; however, there is no data available at the planning region level to assess adult consumption only (18 years and older).

Measures for arrests and youth referrals were included as consequence indicators in this profile, but these measures may be influenced by enforcement policies and available resources and may not be representative of the underlying issue of substance use and abuse. Also, these measures may include duplicate counts so that persons may be included more than once. This profile presents arrests and youth delinquency referrals as total counts, and not rates, so these counts may be affected by population size and should not be compared across counties.

The indicators included in this profile, data sources, and comments about the use of the indicators are provided in table C1.

Table C1. Indicators and data sources included in community epidemiological profile for Alabama

Indicator	Source	Comments
Alcohol Consequences		
Arrests for alcohol violations	ACJIC	May be affected by available personnel, resources, and enforcement policies and can vary substantially across jurisdictions.
% of students in grades 6-12 reporting driving when they had been drinking alcohol	Pride	Reasonable measure of youth drinking and driving.
% of students in grades 6-12 reporting riding with a driver who had been drinking alcohol	Pride	Reasonable measure of youth riding with a drinking driver.
% with alcohol dependence or abuse	NSDUH	Based on DSM-IV criteria; includes all persons 12 years and older.
Alcohol Consumption		
% of students in grades 6-12 reporting use of alcohol during past month	Pride	Reasonable measure of alcohol use.
% of students in grades 6-12 reporting that friends use alcohol	Pride	Reasonable measure of alcohol use by friends.
% of students in grades 6- 12 reporting having 5 or more drinks within a few hours	Pride	Reasonable measure of binge drinking.
Age of first use of alcohol by students in grades 6-12	Pride	Reasonable measure of age at first use.
Tobacco Consequences		
Incidence of lung and bronchus cancers per 100,000 population	SEER	Reasonable measure of tobacco-related morbidity.
Mortality rate for lung and bronchus cancers per 100,000 population	SEER	Reasonable measure of tobacco-related mortality.
Mortality rate for chronic lower respiratory diseases per 100,000 population	CDC Wonder	Reasonable measure of tobacco-related mortality.
Tobacco Consumption		
% of students in grades 6-12 reporting use of tobacco during past month	Pride	Reasonable measure of tobacco use. Includes various forms of tobacco.
% of students in grades 6-12 reporting that friends use tobacco	Pride	Reasonable measure of friends' tobacco use. Includes various forms of tobacco.
Age of first use of tobacco by students in grades 6-12	Pride	Reasonable measure of age at first use.
% of persons who smoked cigarettes during past month	NSDUH	Reasonable measure of cigarette smoking. Ages 12 years and older.
% of persons who used tobacco during past month	NSDUH	Reasonable measure of any tobacco use. Ages 12 years and older.
Other Drug Consequences		
% with illicit drug dependence or abuse	NSDUH	Based on DSM-IV criteria; includes all persons 12 years and older
Number of youth referrals for alcohol and drug treatment	DYS	May be affected by seriousness of youth delinquency and enforcement policies rather than actual magnitude of underlying problem.
Arrest rate for drug possession or sale per 100,000 population	ACJIC	May be affected by available personnel, resources, and enforcement policies and can vary substantially across jurisdictions.
Other Drug Consumption		
% of students in grades 6-12 reporting marijuana use during past month	Pride	Reasonable measure of marijuana use.
Age of first use of marijuana by students in grades 6-12	Pride	Reasonable measure of age at first use.
% of students in grades 6-12 reporting cocaine use during past month	Pride	Reasonable measure of cocaine use.
% of students in grades 6-12 reporting ecstasy use during past month	Pride	Reasonable measure of ecstasy use.
% of students in grades 6-12 reporting inhalant use during past month	Pride	Reasonable measure of inhalant use.
% of students in grades 6-12 reporting hallucinogen use during past month	Pride	Reasonable measure of hallucinogen use.
% of students in grades 6-12 reporting methamphetamine use during past month	Pride	Reasonable measure of methamphetamine use.
% of students in grades 6-12 reporting non-medical use of prescription drugs	Pride	Reasonable measure of non-medical use of prescription drugs.
% of persons who used marijuana during past year	NSDUH	Reasonable measure of marijuana use; ages 12 years and older.
% of persons who used cocaine during past year	NSDUH	Reasonable measure of cocaine use; ages 12 years and older.
% of persons who reported non-medical use of prescription pain relievers during past year	NSDUH	Reasonable measure of non-medical prescription pain reliever use; ages 12 years and older.

Appendix D: Glossary

Age-adjusted rate — A weighted average of age-specific rates where the weights are the proportions of persons in the corresponding age groups of a standard population. A standard population is used (2000 U.S. standard population) to allow for comparisons among counties, states, and national estimates by taking into account differences in the age composition of different areas.

Age-specific rate — A rate determined by the number of cases or events that occur within a specific age group divided by the population of that age group. Example: age-specific mortality rates can be calculated for youth 11-14 years and 15-17 years or any other age group of interest.

Crude rate — An unadjusted rate based on the total number of cases or events divided by the population.

Epidemiology — The study of the distribution and determinants of health-related states and events in populations and the application of this study to control health problems.

ICD-10 codes — The International Classification of Diseases, 10th Revision, is a classification system published by the World Health Organization that is used to classify causes of death.

Incidence — The number of new cases of a disease, illness, or injury that occurs in a population.

Morbidity — The effects of disease, illness, or injury in a population. Typical measures of morbidity are incidence rates and prevalence rates.

Mortality — The total number of deaths due to a particular disease, illness, or injury in a population.

Prevalence — The total number of cases (existing and new) of a disease, illness, or injury that occurs in a population.

Protective factor — A factor that is associated with a decreased risk of disease, illness, or injury.

Risk factor — A factor that is associated with an increased risk of a disease, illness, or injury.

Statistical significance — the probability that the observed difference (e.g., between percentages) occurred by chance. If a finding is not statistically significant, the difference observed could be attributed to chance and not a reflection of any true differences.