

# Arizona Criminal Justice Commission

Statistical Analysis Center Publication

Our mission is to sustain and enhance the coordination, cohesiveness, productivity and effectiveness of the Criminal Justice System in Arizona



## *State of Arizona Youth Survey*

# 2002

November

# ARIZONA CRIMINAL JUSTICE COMMISSION



*Vice Chairperson*  
**RALPH OGDEN**  
Yuma County Sheriff

**JOSEPH ARPAIO**  
Maricopa County Sheriff

**JIM BOLES**  
City of Winslow, Mayor

**DAVID K. BYERS**  
Administrative Office of the  
Courts, Director

**CARROL de BROEKERT**  
Board of Executive Clemency  
Chairperson

**CLARENCE DUPNIK**  
Pima County Sheriff

**TONY ESTRADA**  
Santa Cruz County Sheriff

**BILL FITZGERALD**  
Yavapai County Adult Probation  
Officer

**DENNIS GARRETT**  
Department of Public Safety,  
Director

**BARBARA LAWALL**  
Pima County Attorney

**J.T. McCANN**  
Flagstaff Police Department,  
Chief

**RICHARD MIRANDA**  
Tucson Police Department,  
Chief

**JANET NAPOLITANO**  
Attorney General

**ROBERT CARTER OLSON**  
Pinal County Attorney

**RICHARD M. ROMLEY**  
Maricopa County Attorney

**CHARLES L. RYAN**  
Department of Corrections,  
Acting Director

**CHRISTOPHER SKELLY**  
Judge, Retired

**MICHAEL D. BRANHAM**  
Executive Director

**STEVE BALLANCE**  
Statistical Analysis Center,  
Director

**DON THOMAS**  
Senior Research Analyst

**JACKIE MINERO**  
Research Analyst

## ***ACKNOWLEDGEMENTS***

The Arizona Criminal Justice Commission (ACJC) would like to thank the Arizona Department of Health Services, Governor's Division of Drug and Gang Policy and the Southwest Prevention Center for their partnership in this project. Additionally, ACJC would like to thank the Arizona Drug and Gang Council Working Group, Arizona Department of Education, Arizona Prevention Resource Center and the Arizona Juvenile Justice Commission for their collaborative effort in taking our needs assessment to a higher level for the State of Arizona.

The Statistical Analysis Center received support for this report from numerous state agencies and staff throughout the state.

### ***Special thanks to:***

Jean Ajamie, Arizona Department of Education

Cheri Levenson, Arizona Department of Education

Conny Holstein, Arizona Department of Health Services

Richard Porter, Arizona Department of Health Services

Steve Sparks, Arizona Department of Health Services

Ed Feingold, Arizona Department of Public Safety

Lieutenant James McGuffin, Arizona Department of Public Safety

Wendy Wolfersteig, Arizona Prevention Resource Center

Charles Katz, Arizona State University West

Nancy Rodriguez, Arizona State University West

Julie Dybas, Administrative Office of the Courts

Elizabeth Eells, Administrative Office of the Courts

Brenda Henderson, Governor's Division of Drug and Gang Policy

Sheila Hoppe, Governor's Division of Drug and Gang Policy

# Table of Contents

<b>Table of Figures and Table.....</b>	<b>4</b>
<b>Executive Summary.....</b>	<b>6</b>
<b>Introduction.....</b>	<b>9</b>
<b>Survey Methods.....</b>	<b>12</b>
Survey Questionnaire.....	12
Completion Rate and Ability to Generalize the Results.....	13
Selection of Statewide Survey Sample.....	14
Survey Participants .....	14
Survey Norms and Comparative Data.....	16
Validity of the Data .....	16
<b>Risk and Protective Factor Descriptions .....</b>	<b>18</b>
Community Risk Factors .....	18
Family Risk Factors .....	20
School Risk Factors .....	21
Individual-Peer Risk Factors .....	21
Generalizations About Risks .....	22
Protective Factors .....	23
<b>Survey Results .....</b>	<b>25</b>
<u>Drug, Antisocial Behavior, and School Safety Results .....</u>	<b>25</b>
Total Student Use of ATODs.....	25
Age of Initiation .....	28
ATOD Use by Gender .....	30
Alcohol and Binge Drinking .....	32
Smokeless Tobacco .....	35
Cigarettes .....	37
Marijuana .....	39
Inhalants .....	41
Other Illicit Drugs: Hallucinogens, Methamphetamines, Cocaine, Steroids, Heroin, Barbiturates, and Ecstasy .....	43
Substance Abuse by Academic Grades .....	52
Perceived Availability of ATODs and Handguns .....	54
Perceived Harmfulness .....	56
Antisocial Behavior .....	58
Antisocial Behavior by Gender .....	61
School and Safety Issues .....	63
<u>Risk and Protective Factor Results .....</u>	<b>65</b>
About Risk and Protective Factors .....	65
How to Read the Risk and Protective Factor Charts.....	67
Risk Factor Scores: Arizona 2002 .....	69
Protective Factor Scores: Arizona 2002 .....	73
<b>2002 Adult Substance Use Survey .....</b>	<b>77</b>
<b>Findings .....</b>	<b>85</b>
<b>Summary .....</b>	<b>90</b>
<b>APPENDIX A: 2002 Arizona Youth Survey .....</b>	<b>92</b>
<del><b>APPENDIX B: Item Construct Dictionary.....</b></del>	<del><b>93</b></del>

# Table of Figures and Tables

## *Executive Summary*

Table 1: Arizona and National 30-Day and Lifetime ATOD Use.....	7
---	---

## *Survey Methods*

Table 2: Arizona Youth Survey: 2002 Participation and Demographics .....	15
--	----

## *Survey Results*

### Drug, Antisocial Behavior, and School Safety Results

Table 3: Total Arizona ATOD Use—30-Day and Lifetime.....	26
Figure 1: Total Arizona 30-Day ATOD Use .....	26
Figure 2: Total Arizona Lifetime ATOD Use .....	27
Table 4: Age of Initiation .....	29
Figure 3: 2002 Arizona Substance Use Age of Initiation .....	29
Table 5: Usage of ATODs by Gender.....	31
Figure 4: Arizona 30-Day and Lifetime ATOD Usage by Gender .....	31
Table 6: Alcohol Usage—30-Day and Lifetime .....	33
Figure 5: Arizona and National 30-Day Use of Alcohol .....	33
Table 7: Binge Drinking in the Last Two Weeks.....	34
Figure 6: Arizona Rates of Student Binge Drinking .....	34
Table 8: Smokeless Tobacco Usage—30-Day and Lifetime.....	36
Figure 7: Arizona and National 30-Day Use of Smokeless Tobacco .....	36
Table 9: Cigarettes Usage—30-Day and Lifetime .....	38
Figure 8: Arizona and National 30-Day Use of Cigarettes .....	38
Table 10: Marijuana Usage—30-Day and Lifetime.....	40
Figure 9: Arizona and National 30-Day Use of Marijuana .....	40
Table 11: Inhalant Usage—30-Day and Lifetime .....	42
Figure 10: Arizona and National 30-Day Use of Inhalants .....	42
Table 12: LSD/Hallucinogens Usage—30-Day and Lifetime .....	45
Figure 11: Arizona and National 30-Day Use of Hallucinogens.....	45
Table 13: Methamphetamines Usage—30-Day and Lifetime .....	46
Figure 12: Arizona and National 30-Day Use of Methamphetamines.....	46
Table 14: Cocaine Usage—30-Day and Lifetime .....	47
Figure 13: Arizona and National 30-Day Use of Cocaine .....	47
Table 15: Steroid Usage—30-Day and Lifetime .....	48
Figure 14: Arizona and National 30-Day Use of Steroids.....	48
Table 16: Heroin Usage—30-Day and Lifetime .....	49
Figure 15: Arizona and National 30-Day Use of Heroin .....	49
Table 17: Barbiturates/Sedatives Usage—30-Day and Lifetime .....	50
Figure 16: Arizona and National 30-Day Use of Barbiturates/Sedatives.....	50
Table 18: Ecstasy Usage—30-Day and Lifetime .....	51

<b>Figure 17: Arizona and National 30-Day Use of Ecstasy .....</b>	<b>51</b>
<b>Table 19: Percentage Using ATODs by Academic Grade.....</b>	<b>53</b>
<b>Figure 18: ATOD Use by Academic Grade .....</b>	<b>55</b>
<b>Table 20: Perceived Availability of ATODS and Guns .....</b>	<b>55</b>
<b>Figure 19: Arizona and National Perceived Availability of ATODs .....</b>	<b>55</b>
<b>Table 21: Perceived Harmfulness of ATODs .....</b>	<b>57</b>
<b>Figure 20: Arizona and National Perceived Harmfulness of ATODs .....</b>	<b>57</b>
<b>Table 22: The Prevalence of Delinquent Behavior, by Grade.....</b>	<b>60</b>
<b>Figure 21: Prevalence of Delinquent Behavior for Arizona Youth, by Grade .....</b>	<b>60</b>
<b>Table 23: Percentage of Male and Female Students Who Have Participated in Antisocial Behaviors At Least Once in the Past Year .....</b>	<b>62</b>
<b>Figure 22: Arizona 30-Day Antisocial Behavior by Gender .....</b>	<b>62</b>
<b>Table 24: Safety and School Issues.....</b>	<b>64</b>
<b>Figure 23: Safety and School Issues.....</b>	<b>64</b>

### **Risk and Protective Factors**

<b>Table 25: 2002 Arizona Risk Factor Scores .....</b>	<b>71</b>
<b>Figure 24: Risk Factor Scores: 2002 State Survey, Grade 8 Arizona Students.....</b>	<b>71</b>
<b>Figure 25: Risk Factor Scores: 2002 State Survey, Grade 10 Arizona Students .....</b>	<b>72</b>
<b>Figure 26: Risk Factor Scores: 2002 State Survey, Grade 12 Arizona Students .....</b>	<b>72</b>
<b>Table 26: 2002 Arizona Protective Factor Scores .....</b>	<b>75</b>
<b>Figure 27: Protective Factor Scores: 2002 State Survey, Grade 8 Arizona Students .....</b>	<b>75</b>
<b>Figure 28: Protective Factor Scores: 2002 State Survey, Grade 10 Arizona Students .....</b>	<b>76</b>
<b>Figure 29: Protective Factor Scores: 2002 State Survey, Grade 12 Arizona Students .....</b>	<b>76</b>

### **2002 Adult Substance Use Survey**

<b>Figure 30: Percent of Arrestee’s Testing Positive for Marijuana .....</b>	<b>81</b>
<b>Figure 31: Percent of Arrestee’s Testing Positive for Cocaine .....</b>	<b>81</b>
<b>Figure 32: Percent of Arrestee’s Testing Positive for Methamphetamine .....</b>	<b>82</b>
<b>Table 27: Maricopa County Testing Positive by Gender for All Offenses.....</b>	<b>82</b>
<b>Table 28: Pima County Testing Positive by Gender for All Offenses.....</b>	<b>82</b>

# Executive Summary

Arizona Revised Statute §41-2416 requires that the Arizona Criminal Justice Commission conduct a statewide survey to “measure both the attitudes and the actual prevalence and frequency of substance abuse by children and adults.” This report is produced to fulfill these requirements.

To comply with Arizona Revised Statute §41-2416 the Arizona Criminal Justice Commission’s Statistical Analysis Center conducted both a youth and adult assessment and evaluation. First, a survey was administered in a statewide sample of 8th, 10th, and 12th graders in public schools throughout Arizona. The Arizona Criminal Justice Commission has been conducting a youth survey for twelve years on a biennial basis; however, notable improvements in the survey model, sampling methods and increased collaboration distinguish the 2002 Arizona Youth Survey from prior surveys. Second, a study of adult drug use based upon adults involved in the criminal justice system was conducted by the Statistical Analysis Center.

The Arizona Youth Survey was conducted by the Arizona Criminal Justice Commission with technical assistance from the Southwest Center of Prevention at the University of Oklahoma. The Arizona Youth Survey is the result of a partnership between the Arizona Criminal Justice Commission, the Arizona Department of Health Services and the Governor’s Division of Drug Policy. Further, the development and implementation of the survey is a product of ongoing meetings by state agencies participating in the discussion and evaluation of current statewide surveys over the past two years. The successful implementation of the Arizona Youth Survey can also be attributed to collaborative efforts from the Arizona Prevention Resource Center and the Arizona Department of Education. Finally, the overwhelming cooperation of local school administrators directly contributed to the success of the 2002 Arizona Youth Survey.

The survey was administered from January through February 2002 in Arizona public and private schools. A random sample drawn from the 15 counties resulted in a total of 12,203 valid surveys from 59 individual schools. This report provides a statewide perspective, however, for the first time, participating schools and county officials will receive community specific data in the form of individual reports to assist in analysis and comparison, as well as for planning strategies and program development.

Due to enhancements made in ACJC’s methodology for the 2002 survey, we must caution against comparisons to past survey results, however, it is noteworthy that alcohol is still the most common substance used by Arizona students. In the past month, 46.4% of students have used alcohol, and 69.2% of students have used alcohol in their lifetime. Cigarette use – traditionally the second most used substance for youth and adults – is the third most used by Arizona youth. While regular (30-day) cigarette use is usually higher than marijuana use, results from the survey indicate that more Arizona youth have used marijuana in the past month than have used cigarettes (20.5% compared to 16.5%). Such a shift in past month use, may suggest future directions for Arizona prevention efforts.

Other unexpected results are seen in comparing male and female use. While males have generally tended to have higher use rates of substances, the survey shows that Arizona females actually have higher use rates of alcohol (30-day and lifetime use), cigarettes (30-day and lifetime use), inhalants

(30-days), heroin (30-days), methamphetamines (lifetime) and ecstasy (lifetime). In the case of Arizona, we see that an increase in prevention efforts directed towards females could be beneficial.

A comparison of the Arizona Youth Survey and the National Monitoring the Future (MTF) survey is a measure for assessing current substance abuse and risk behaviors of Arizona youth. While students in the national sample tended to experiment with drugs more, and generally had higher lifetime use of most drugs except smokeless tobacco and marijuana, Arizona youth generally had somewhat higher regular/past month use rates of nearly all substances – alcohol, marijuana, inhalants, hallucinogens, methamphetamines, cocaine, steroids, heroin, barbiturates and ecstasy. Complete results can be seen in the table below.

Table 1

	8th Grade		10th Grade		12th Grade	
	Arizona	National	Arizona	National	Arizona	National
Alcohol	56.9%	50.5%	72.3%	70.1%	80.8%	79.7%
Cigarettes	39.6%	36.6%	49.8%	52.8%	61.1%	61.0%
Smokeless Tobacco	25.9%	11.7%	23.2%	19.5%	24.1%	19.7%
Marijuana	26.6%	20.4%	41.6%	40.1%	50.8%	49.0%
Inhalants	11.9%	17.1%	10.4%	15.2%	10.1%	13.0%
Hallucinogens	2.4%	4.0%	8.3%	7.8%	12.6%	12.8%
Cocaine	4.5%	4.3%	8.2%	5.7%	12.0%	8.2%
Methamphetamines	2.9%	4.4%	6.8%	6.4%	8.6%	6.9%
Steroids	2.2%	2.8%	2.7%	3.5%	2.7%	3.7%
Heroin	1.9%	1.7%	3.2%	1.7%	3.8%	1.8%
Sedatives	2.1%	--	5.7%	--	7.4%	8.7%
Ecstasy	5.5%	5.2%	8.2%	8.0%	12.0%	11.7%

	8th Grade		10th Grade		12th Grade	
	Arizona	National	Arizona	National	Arizona	National
Alcohol	34.4%	21.5%	47.9%	39.0%	58.9%	49.8%
Cigarettes	9.1%	12.2%	18.1%	21.3%	23.2%	29.5%
Smokeless Tobacco	4.0%	4.0%	4.7%	6.9%	5.9%	7.8%
Marijuana	14.3%	9.2%	22.4%	19.8%	25.4%	22.4%
Inhalants	6.5%	4.0%	3.4%	2.4%	2.0%	1.7%
Hallucinogens	1.5%	1.2%	3.2%	2.1%	3.1%	3.2%
Cocaine	2.6%	1.2%	3.5%	1.3%	4.0%	2.1%
Methamphetamines	1.0%	1.3%	2.6%	1.5%	2.2%	1.5%
Steroids	1.2%	0.7%	1.5%	0.9%	0.9%	1.3%
Heroin	1.2%	0.6%	1.4%	0.3%	1.3%	0.4%
Sedatives	1.0%	--	2.6%	--	3.4%	2.8%
Ecstasy	3.6%	1.8%	2.5%	2.6%	3.2%	2.8%

The greatest differences in 30-day use are seen when looking at the use of alcohol, marijuana and cocaine. Past month use of alcohol is notably higher for Arizona youth than for youth nationwide. The Arizona Youth Survey results, when compared to the national MTF results, show that for all grades, more Arizona students have used alcohol in the past month than have students in the national sample. Past month use was 8.9% to 12.9% higher for youth in Arizona than for youth in the national sample. Arizona 8th grade students' 30-day alcohol use rate was 12.9% higher than the national sample (34.4% compared to 21.5%), Arizona 10th graders' use rate was 8.9% higher than the national sample (47.9% compared to 39.0%) and Arizona 12th graders' use rate was 9.1% higher than the national sample (58.9% compared to 49.8%).

More Arizona youth than national youth are using marijuana experimentally. Arizona 30-day and lifetime usage rates of marijuana are higher than national rates for 8<sup>th</sup>, 10<sup>th</sup> and 12<sup>th</sup> grades. Rates of 30-day usage are 2.6% (grade 10) to 5.1% (grade 8) higher for Arizona youth than for the national sample. For lifetime usage, Arizona rates were 1.5% (grade 10) to 6.2% (grade 8) higher than national students.

As for cocaine use, while the use for Arizona youth and MTF youth is relatively low in comparison to other substances, it appears that Arizona youth are using cocaine more than students nationwide. In comparing Arizona results to MTF results, past month and lifetime use rates are higher for Arizona youth in all grades. Similarly, the lifetime use of Ecstasy is above the national average for all grades and more than double in the 30-day use of 8<sup>th</sup> grade students.

An explanation for this difference in use could possibly be gathered by comparing Arizona and national rates of perceived harmfulness of substances. When students were asked how much of a risk (health and otherwise) there was in using alcohol, tobacco and other drugs, students in Arizona generally believed that there is less risk in using alcohol, tobacco and other drugs (ATOD) than students nationwide. The greatest difference is seen in the perceived harm of smoking marijuana regularly. For all grades of the Arizona students surveyed, there was a perception that marijuana was less harmful than was the perception of their national counterparts.

Such results could potentially explain the higher experimental and lifetime marijuana use rate for Arizona youth, since students who are not afraid of using substances, and who believe they will not be harmed by using substances, tend to use substances more than students who perceive harm in using a substance. It could be beneficial for prevention programs to increase the focus on the harmful effects of drugs.

The analysis of the data obtained from the survey is quite extensive and therefore the results are not intended to be exhaustive. Rather, it is believed that the data and highlights contained within this report will provide insights for future decisions pertaining to the well being of Arizona youth. Specifically, the purpose of the Arizona Youth Survey is to provide policy and decision makers with better information to aid in the development of prevention and intervention strategies throughout the state.

# Introduction

*This report describes the conduct and findings of the 2002 survey of 8th, 10th, and 12th grade students in Arizona. The survey data was collected January through February in Arizona public and private schools.*

This report describes the findings of a survey of 8th, 10th, and 12th grade students in the state of Arizona. The survey was sponsored by the Arizona Criminal Justice Commission. Arizona Revised Statute §41-2416 requires that the Arizona Criminal Justice Commission (ACJC) conduct a statewide survey to “measure both the attitudes and the actual prevalence and frequency of substance abuse by children and adults.” This report has been created to fulfill this requirement.

The Arizona Youth Survey was conducted by the Arizona Criminal Justice Commission with technical assistance from the Southwest Center of Prevention at the University of Oklahoma. The Arizona Youth Survey is the result of a partnership between the Arizona Criminal Justice Commission, the Arizona Department of Health Services, and the Governor’s Division of Drug Policy.

Further, the development and coordination of the survey is a product of ongoing meetings by state agencies participating in the discussion and evaluation of current statewide surveys over the past two years. The successful implementation of the Arizona Youth Survey can also be attributed to collaborative efforts from the Arizona Prevention Resource Center and the Arizona Department of Education. Finally, the overwhelming cooperation of local school administrators directly contributed to the success of the 2002 Arizona Youth Survey.

It is important to note that in Arizona, there is consensus on the need to provide both services and data in a collaborative manner. There is agreement by the Arizona Drug and Gang Council and Working Group (representing twelve state agencies) and the Arizona Juvenile Justice Commission that the Arizona Youth Survey, the Social Indicators and the Program Inventory should be instruments adopted by the state for the future collection of data on youth, families, communities, and programs.

The Arizona Criminal Justice Commission made a decision to change the substance abuse survey instrument to a stronger model that would also benefit multiple agencies in the state. The Arizona Youth Survey, based upon the Communities that Care model, is supported by numerous state agencies and has national recognition. The Communities that Care (CTC) model is based upon a comprehensive prevention model developed by J. David Hawkins, Ph.D. and Richard F. Catalano, Ph.D. at the University of Washington. The CTC model identifies “the factors that in-

crease and mitigate the likelihood of delinquent involvement and other dysfunctional behaviors. The model emphasizes the need for community-wide efforts to ameliorate those risk factors.” (OJJDP, 1995).

Risk and protective focused prevention is based on a simple premise: to prevent a problem from happening, we need to identify the factors that increase the risk of that problem developing and then find ways to reduce the risks. The substance abuse prevention field has been evolving over time, often through induction based upon applied empirical research. The science-based theories and theoretical frameworks in substance abuse prevention and programming in recent years are among the most important developments. The focus has been on risk and protective factors as a unifying descriptive and predictive framework for development and evaluation of prevention programs.

Substance abuse prevention programs aim to deter the onset of risky activities, such as alcohol, tobacco and other drug use, by changing the knowledge, attitudes and behaviors of people. To have an impact, a person’s environment needs to be affected. The environmental areas consist of four domains most commonly referred to as the individual and/or peer group, the family, the community, and school. Within each domain are key characteristics that can serve to suppress risk and/or augment protection. These characteristics are referred to as risk and protective factors. Knowing the prevalence of risk and protective factors helps implement programs that have objectives, strategies and funding geared to meeting individual, family, school and community needs (Arizona Drug and Gang Prevention Resource Center, 1999).

The ACJC has had a long history of state substance abuse evaluations. In previous years, to collect substance use information throughout Arizona, the Arizona Criminal Justice Commission’s Statistical Analysis Center conducted two separate evaluations. First, a survey was administered in a statewide sample of public schools. Teachers working in the selected schools administered the survey to students in grades three through twelve. The Commission conducted that survey for twelve years on a biennial basis. Second, Commission staff talked with adult probation officers about adult probationer drug use by conducting three group interviews across the state.

Although quality information has been gathered in previous surveys, any comparison of survey data with previous studies is problematic due to the limitations of the sampling and weighting methods used in prior years as well as the difference in the model

used. For this reason, no formal analysis was conducted between previous evaluations and this study.

The Arizona Youth Survey was administered in January and February of 2002. School principals and teachers were provided detailed instructions for administering the survey. Students' anonymity was emphasized and facilitated through the provision of blank cover sheets to conceal answers while completing the survey. Upon completion, all surveys were returned and electronically scanned by an outside vendor, the Southwest Prevention Center at the University of Oklahoma.

This report is organized into five sections:

1. Survey Methods, which describes how the survey was conducted, who participated, and procedures that were used to ensure that valid information was collected.
2. Risk and Protective Factors for Substance Abuse and Other Youth Problems, which provides a description of the risk and protective factor model of substance abuse prevention, including the four domains of risk and protection (community, family, school, and peer/individual).
3. Survey Results, which has two sub-sections. The first presents drug, anti-social and school safety results data on recent and lifetime use of Alcohol, Tobacco, and Other Drugs (ATOD) among Arizona's youth. The second presents risk factor scores and protective factor scores. These results are often compared to the results of a national survey, Monitoring the Future.
4. 2002 Adult Substance Abuse survey, which provides summary information from Probation Departments throughout the state, the Administrative Office of the Courts, and from the Arrestee Drug Abuse Monitoring (ADAM) project.
5. Survey Findings, which fully summarize the results and conclusions of the report.

# Survey Methods

*Risk Factors increase the likelihood that a child will develop one or more health and/or behavior problems.*

*Protective Factors are conditions or situations which decrease the likelihood of future behavior problems.*

Information was gathered using the Arizona Youth Survey (Appendix A). The goal of the survey was to develop a tool which provided scientifically sound information about the levels of risk and protection in a community. The information gathered on youth drug use and delinquency is essential in supporting prevention planning, intervention planning, and needs assessment at the local and state levels. Risk factors are those conditions or situations that increase the likelihood that a child will develop one or more health and/or behavior problems in adolescence. Protective factors are the conditions or situations which decrease the likelihood of future behavior problems. Risk and protective factors are found in four domains -- community, school, family, and the peer/individual. There are 18 risk factors and 10 protective factors measured through the Arizona survey, and the survey uses 24 risk factor scales and 9 protective factor scales to measure them.

The remainder of this section will discuss the survey questionnaire, how it was administered, the demographics of participants, completion rates, and the ability to generalize the results to other populations.

## ***Survey Questionnaire***

The survey questionnaire was developed through the combined efforts of six states and the Social Development Research Group at the University of Washington. The collaborative survey development process was a Center for Substance Abuse Prevention (CSAP) project called the Six-State Consortium. The goal of the Consortium was to develop a survey that provided scientifically sound information about the levels of risk and protection in a community. The survey has been further refined through the Diffusion Consortium Project that involves seven states and is funded by four federal agencies: the National Institute of Drug Abuse (NIDA), Safe and Drug Free Schools Program, Office of Juvenile Justice and Delinquency Prevention, and CSAP.

Risk and protective factors are characteristics of a community that are reported by the youth who complete the survey. Besides measuring risk and protective factors, the survey also assesses the current prevalence of ATOD use. The substances that are measured by the survey include: 1) alcohol; 2) cigarettes; 3) smokeless tobacco; 4) marijuana; 5) hallucinogens; 6) cocaine;

7) inhalants; 8) methamphetamines; 9) barbiturates; 10) heroin; 11) ecstasy; and 12) steroids. The questions that ask about substance use are similar to those used in the national survey, Monitoring the Future (MTF), so comparisons between the two surveys can easily be made.

There are a total of 18 risk factors and 10 protective factors that are measured by the survey. However, some of the risk factors are broad enough to require more than one scale for adequate measurement. As a result, there are 24 separate risk factor scales and 9 protective factor scales.

There are approximately four survey items that measure each risk factor. Reliability for the constructs is good (the average value for Cronback's was  $\alpha = .79$ ). The questionnaire has 124 questions, however, many of the questions have multiple components so students actually responded to a total of 198 items. The questions were printed in a test booklet that was machine scoreable. See Appendix A for a copy of the questionnaire. Students from all grades could easily complete the questionnaire in one class period. A complete item dictionary that lists the risk and protective factor scales and the items they contain as well as the outcome variables can be seen in Appendix B.

### ***Completion Rate and Ability to Generalize the Results***

Not all Arizona students participated in the survey. Some students individually chose not to participate, some students' parents refused to give consent for them to participate, and some students were absent on the day the survey was administered. A weighted sample of 12,909 surveys was selected from the total survey pool (see **Selection of Statewide Survey Sample** section on page 14 for information on sampling and weighting procedures). This is a very high completion rate for a school survey and resulted in an adequate number of students for analysis.

It should be noted that not all of the surveys that were completed contained valid information. Some (706) were eliminated because students were deemed not truthful in their responses, or did not complete some of the questions (see **Validity of the Data** section on page 16 for the validity criteria).

## ***Selection of Statewide Survey Sample***

The purpose of the survey was to gather information that could be used by participating schools, the counties, and the state. In order to have a sample of students that was representative of all of the students in Arizona, careful attention was paid to sample selection. First, the schools in Arizona were divided into three groups according to size: small, medium and large. Then, a random sample from each group was chosen to assure representation of students in the small rural schools, middle sized schools, and large metropolitan schools. Because this procedure resulted in over-sampling some areas of the state, a weighting procedure was used to weight the results to more accurately represent the student composition in the three grades: eight, ten and twelve; and the 15 counties. Thus, careful selection of the schools that were sampled and uniform administration of the survey resulted in survey data that are valid and representative of the students in grades 8, 10, and 12 in Arizona's 15 counties. In general, the statewide sample was chosen so that those conducting the survey were 95% confident that the margin of error was less than  $\pm 1.5\%$  for each grade. For the counties, the overall sample of students was chosen to produce a margin of error of less than  $\pm 5\%$  at the 95% confidence level.

In addition to the statewide sample discussed above, all of the schools in Arizona were given the opportunity to participate in the survey. Schools that chose to participate were provided reports in which their data were compared to that of the overall statewide sample. However, none of the data from the volunteer schools were used in the statewide analysis.

## ***Survey Participants***

The goal was to sample students in grades 8, 10, and 12 in the state of Arizona. The randomly selected sample, and weighted results ensure that the survey results reported here are a good estimate of the rates of ATOD use and levels of risk and protective factors of youth in the state of Arizona. At the school level, the results provide specific information about the problems faced by youth, and about areas of risk and protection for the school. The survey results are an excellent tool for community and school prevention planning.

*Survey plans called for participation of 8th, 10th, and 12th grade Arizona students. Forty-three Arizona school districts participated in the survey, which is a very high rate of participation for a voluntary school survey. A total sample of 12,909 surveys were sampled from the surveys returned to SWCAPT for scoring and analysis. A total of 12,203 students turned in valid surveys.*

*Of 2002 survey participants, 50.7% were female and 49.3% were male; 51.8% were Caucasian and 30.3% were Hispanic.*

The characteristics of the youth who took the survey are presented in Table 2 below. In comparing the sample characteristics to Arizona student enrollment data gathered from the Arizona Department of Education website, some similarities between the sample and Arizona student enrollment figures can be seen. Such similarities provide more assurance that the data gathered through the Arizona Youth Survey is representative of the state as a whole. For example, in the 2002 survey, there were nearly an equal number of males and females who took the survey in all grades (female = 50.7% and males = 49.3%), while the Department of Education website found similar percentages for Arizona (female = 48.8% and males = 51.2%). Of the respondents, 51.8% were White and 30.3% were Hispanic (similar to the Department of Education website findings — 56.8% white and 29.7% Hispanic). The other ethnic groups accounted for 17.9% of the respondents. Table 2 also shows that English is the primary language spoken in 82.1% of homes. (Arizona student enrollment data gathered from the Arizona Department of Education website—<http://www.ade.state.az.us>).

**Table 2**

**Arizona Youth Survey: 2002 Participation and Demographics**

	Grade 8	Grade 10	Grade 12	Total
<b>Gender</b>				
Male	49.1%	49.0%	50.0%	49.3%
Female	50.9%	51.0%	50.0%	50.7%
<b>Ethnicity</b>				
White	40.9%	55.1%	57.2%	51.8%
African-American	3.8%	1.9%	1.9%	2.4%
Hispanic	35.8%	30.1%	25.7%	30.3%
Asian/Pac. Islander	1.5%	2.0%	2.9%	2.2%
Native American	15.2%	8.0%	9.1%	10.3%
Other	2.8%	2.9%	3.3%	3.0%
<b>Language Spoken at Home</b>				
English	79.6%	81.5%	85.0%	82.1%
Spanish	17.8%	15.6%	11.8%	15.0%
Other	2.6%	2.8%	3.2%	2.9%
<b>Home Structure</b>				
Both Parents	55.8%	57.0%	57.4%	56.8%
Step-family	0.3%	0.1%	0.2%	0.2%
Mother Only	31.9%	30.9%	28.7%	30.5%
Father Only	6.0%	6.5%	6.7%	6.4%
Other	6.1%	5.4%	7.0%	6.1%

*Survey questions, measurements, and protocol for the Arizona Youth Survey and the MTF surveys are similar, making comparisons possible.*

## **Survey Norms and Comparative Data**

It is important to know how results from Arizona students are compared to other national comparison data. The 2002 Arizona Youth Survey data are compared throughout this report to the national Monitoring the Future (MTF) survey data from 2001. State results from the 8th, 10th, and 12th grades are compared to national results from the same grades. The survey is conducted annually through the University of Michigan, and is designed to provide ATOD use information on a sample of students representative of the United States as a whole. The survey questions, measurements, and protocol for both the Arizona Youth Survey and the MTF surveys are similar, making the comparisons valid. More information on the Monitoring the Future survey and survey results can be found at <http://www.monitoringthefuture.org>.

## **Validity of the Data**

The information presented in this report is based entirely on the truthfulness, recall, and comprehension of the youth who participated in the survey. Many studies have shown that most adolescents are truthful in their responses to the questions on similar surveys. For example, ATOD trends for repeated national and state surveys are very similar. Also, the changes reported by youth parallel the changes during the same period in adolescent admissions to treatment for substance abuse. Finally, the relationships between different kinds of behaviors and the problems adolescents report is very consistent over a wide range of studies. This study was carefully designed to ensure honest responses from participants.

The confidentiality of the survey was stressed through the instructions and administration procedures. Participants were assured that the survey was voluntary, anonymous, and confidential. They were told that no one would see their answers and that there was no way that a survey could be traced back to an individual student. Because the survey was anonymous, most of the reasons to exaggerate or deny behaviors were eliminated.

However, several checks were built into the analysis to minimize

the impact of students who were not truthful in their responses. Students whose surveys were deemed not truthful were eliminated.

There were a total of 12,909 survey questionnaires in the sample. However, not all of the sampled questionnaires contained valid information. Seven hundred (700 or 5.42%) of the surveys were eliminated from the final analyses because they reported an impossibly high level of substance use, claimed to use a nonexistent drug, or reported that they were, “Not honest at all” in completing the survey.

After these invalid surveys were taken out of the sample, there were 6 (.049%) surveys that were blank or that students did not answer enough of the validity questions to determine whether or not they were honest in their responses. These surveys were not included in the final analyses. This resulted in a total of 706 (5.47%) questionnaires that were eliminated from most analyses. A total of 12,203 valid surveys are included in the final analyses reported here.

Other measures to reduce response bias included carefully pretesting the questionnaire to ensure that students understood the meaning of each question, using a well developed and tested administration protocol, and reading the same instructions to all students who participated in the survey.

# Risk and Protective Factor Descriptions

In the past century, doctors have discovered factors that put people at risk for things such as heart disease and diabetes, and factors that prevent them from such conditions. The Risk and Protective Factor model discussed here, follows the same model for prevention for our communities' children. Risk-focused prevention is based on a simple premise: to prevent a problem from happening, we need to identify the factors that increase the risk of that problem developing and then find ways to reduce the risks.

Risk focused prevention is based on the work of J. David Hawkins, Ph.D.; Richard F. Catalano, Ph.D.; and a team of researchers at the University of Washington in Seattle. In the early 1980's, they conducted a review of thirty years of youth substance abuse and delinquency research and identified risk factors for adolescent drug abuse and delinquency. They have continually updated this review. Other researchers, including Joy Dryfoos, Robert Slavin, and Richard Jessor, have reviewed the literature on behavior problems, such as school dropout and teen pregnancy, and identified risk factors of these problems. Not surprisingly, there is an interrelationship between adolescent drug abuse, delinquency, school dropout, teen pregnancy, and violence and identified risk factors for these problems. Young people who are seriously involved in either juvenile delinquency, substance abuse, school dropout, teenage pregnancy, or violence are more likely to engage in one or more of the other problem behaviors. Furthermore, all of these teen problems share many common risk factors.

The risk and protective factors have been organized into the four important areas of a young person's life: 1) the **community**; 2) the **family**; 3) the **school**; and 4) within **individuals** themselves and their **peer** interactions. Each are summarized below. *(Note: Below each risk factor, and placed in parentheses, are the problem behaviors that are linked to that factor. When applicable, risk and protective factor scales are listed above risk and protective factor summaries.)*

## Community Risk Factors

### Availability of Drugs and Firearms (Substance Abuse, Delinquency, and Violence)

The more available drugs are in a community, the higher the risk that young people will abuse drugs in that community. Perceived availability of drugs is also associated with risk. For example, in schools where students just *think* drugs are more available, a higher rate of drug use occurs.

Firearm availability and firearm homicide have increased together since the late 1950s. If a gun is present in the home, it is much more likely to be used against a relative or friend than an intruder or stranger. Also, when a firearm is used in a crime or assault instead of another weapon or no weapon, the outcome is much more likely to be fatal. While a few studies report no association between firearm availability and violence, more studies show a positive relationship. Given the lethality of firearms, the increase in the studies show a conflict escalating into homicide when guns are present, and the strong association between availability of guns and homicide rates, firearm availability is included as a risk factor.

### **Community Laws and Norms Favorable Towards Drug Use, Firearms, and Crime (Substance Abuse, Delinquency, and Violence)**

Community norms, the attitudes and policies a community holds about drug use and crime, are communicated in a variety of ways: through laws and written policies, through informal social practices, and through the expectations parents and other community members have of young people. When laws and community standards are favorable toward drug use or crime, or even if they are just *unclear*, youth are at higher risk.

### **Transitions and Mobility (Substance Abuse, Delinquency, and School Dropout)**

Even normal school transitions predict increases in problem behaviors. When children move from elementary school to middle school or from middle school to high school, significant increases in the rates of drug use, school misbehavior, and delinquency result. Communities with high rates of mobility appear to be linked to an increased risk of drug use and crime problems. The more often people in a community move, the greater the risk of both criminal behavior and drug-related problems in families. While some people find buffers against the negative effects of mobility by making connections in new communities, others are less likely to have the resources to deal with the effects of frequent moves, and are more likely to have problems.

### **Low Neighborhood Attachment and Community Disorganization (Substance Abuse, Delinquency, and Violence)**

**Scales: Low Neighborhood Attachment, Community Disorganization**  
Higher rates of drug problems, juvenile delinquency and violence occurs in communities or neighborhoods where people have little attachment to the community, where the rates of vandalism are high, and where there is low surveillance of public places. These conditions are not limited to low-income neighborhoods, they can also be found in wealthier neighborhoods. The less homogeneous a community (in terms of race, class, religion, and even the mix of industrial to residential neighborhoods) the less connected its resident may feel to the overall community, and the more difficult it is to establish clear community goals and identity. The challenge of creating neighborhood attachment and organization is greater in these neighborhoods.

Perhaps the most significant issue affecting community attachment is whether residents feel they can make a difference in their own lives. If the key players in the neighborhood, such as merchants, teachers, police and human services personnel, live outside the neighborhood, residents' sense of commitment will be less. Lower rates of voter participation and parental involvement in schools also indicate lower attachment to the community.

## **Family Risk Factors**

### **Family History of the Problem Behavior**

**(Substance Abuse, Delinquency, Teen Pregnancy, School Dropout, and Violence)**

If children are raised in a family with a history of addiction to alcohol or other drugs, the risk of their children having alcohol and other drug problems themselves increases. If children are born or raised in a family with a history of criminal activity, their risk of juvenile delinquency increases. Similarly, children who are raised by a teenage mother are more likely to become teen parents, and children of dropouts are more likely to dropout of school themselves.

### **Family Management Problems**

**(Substance Abuse, Delinquency, Teen Pregnancy, School Dropout, and Violence)**

**Scales: Family Management, Family Discipline**

Poor family management practices include lack of clear expectations for behavior, failure of parents to monitor their children (knowing where they are and who they are with), and excessively severe or inconsistent punishment.

### **Family Conflict**

**(Substance Abuse, Delinquency, Teen Pregnancy, School Dropout, and Violence)**

Persistent, serious conflict between primary care givers or between caregivers and children appears to enhance risk for children raised in these families. Conflict between family members appears to be more important than family structure. Whether the family is headed by two biological parents, a single parent, or some other primary care giver, children raised in families high in conflict appear to be at risk for all of the problem behaviors.

### **Favorable Parental Attitudes and Involvement in Drug Use, Crime, and Violence**

**(Substance Abuse, Delinquency and Violence)**

**Scales: Favorable Parental Attitudes Toward Alcohol, Tobacco and Other Drug Use, Favorable Parental Attitudes Toward Antisocial Behavior**

Parental attitudes and behavior toward drugs, crime, and violence influence the attitudes and behavior of these children. Parental approval of young people's moderate drinking, even under parental supervision, increases the risk of the young person using marijuana. Similarly, children of parents who excuse their children for breaking the law are more likely to develop problems with juvenile delinquency. In families where parents display violent behavior toward those outside or inside the family, there is an increase in the risk that a child will become violent. Further, in families where parents involve children in their own drug or alcohol behavior, for example, asking the child to light the parent's cigarette or to get the parent a beer, there is an increased likelihood that their children will become drug abusers in adolescence.

## School Risk Factors

### Academic Failure

(Substance Abuse, Delinquency, Teen Pregnancy, School Dropout, and Violence)

Beginning in the late elementary grades, academic failure increases the risk of drug abuse, delinquency, violence, teen pregnancy, and school dropout. Students fail for many reasons. It appears that *the experience of failure*, not necessarily the student's ability, increases the risk of problem behaviors.

### Lack of Commitment to School

(Substance Abuse, Delinquency, Teen Pregnancy, School Dropout, and Violence)

Lack of commitment to school means the young person has ceased to see the role of student as a viable one. Young people who have lost this commitment to school are at higher risk for all five problem behaviors.

## Individual and Peer Risk Factors

### Alienation and Rebelliousness,

(Substance Abuse, Delinquency, and School Dropout)

Young people who feel they are not part of society, are not bound by rules, don't believe in trying to be successful or responsible, or who take an active rebellious stance toward society are at higher risk of drug abuse, delinquency, and school dropout.

### Friends Who Engage in the Problem Behavior

(Substance Abuse, Delinquency, Teen Pregnancy, School Dropout, and Violence)

**Scales: Friends Who Engage in ATOD Use, Interactions with Antisocial Peers**

Youth who associate with peers who engage in problem behaviors are much more likely to engage in the same problem behaviors. This is one of the most consistent predictors the research has identified. Even when young people come from well-managed families and do not experience other risk factors, just hanging out with those who engage in problem behaviors greatly increases their risks. However, young people who experience a low number of risk factors are less likely to associate with those who are involved in problem behaviors.

### Favorable Attitudes Toward the Problem Behavior

(Substance Abuse, Delinquency, Teen Pregnancy, and School Dropout)

**Scales: Attitudes Favorable Toward ATOD Use, Rewards for Antisocial Behavior,**

**Attitudes Favorable Toward Antisocial Behavior**

During the elementary school years, children usually express anti-drug and pro-social attitudes. They have difficulty imagining why people use drugs, commit crimes, and drop out of school. In middle school, as others they know participate in such activities, their attitudes often shift toward greater acceptance of these behaviors. This places them at higher risk.

### **Early Initiation of the Problem Behavior**

#### **(Substance Abuse, Delinquency, Teen Pregnancy, School Dropout, and Violence)**

The earlier young people begin using drugs, committing crimes, engaging in violent activity, becoming sexually active, and dropping out of school, the greater the likelihood that they will have problems with these behaviors later on. For example, research shows that young people who initiate drug use before age fifteen are at twice the risk of having drug problems as those who wait until after age nineteen.

### **Antisocial Behavior**

#### **(Substance Abuse, Delinquency, Teen Pregnancy, School Dropout, and Violence)**

This risk factor also includes persistent antisocial behavior in early adolescence, like misbehaving in school, skipping school, and getting into fights with other children. Young people, both girls and boys, who engage in these behaviors during early adolescence, are at increased risk for drug abuse, delinquency, teen pregnancy, school dropout, and violence.

## **Generalizations About Risks**

### **Risks Exist in Multiple Domains**

Risk factors exist in all areas of life. If a single risk factor is addressed in a single area, problem behaviors may not be significantly reduced. Communities should focus on reducing risks across several areas.

### **The More Risk Factors Present, the Greater the Risk**

While exposure to one risk factor does not condemn a child to problems later in life, exposure to a greater number of risk factors increases a young person's risk exponentially. Even if a community cannot eliminate all the risk factors that are present, reducing or eliminating even a few risk factors may significantly decrease risk for young people in that community.

### **Risk Factors Show Much Consistency in Effects Across Different Races, Cultures, and Classes**

While levels of risk may vary in different racial, cultural or socioeconomic groups, the way in which these risk factors work does not appear to vary. One implication for community prevention is to prioritize prevention efforts for groups with higher levels of risk exposure.

### **Protective Factors May Buffer Exposure to Risk**

Knowledge of risk factors can help communities know what to focus on to reduce health and behavior problems. Communities must know how to reduce risk. Protective factors are conditions that buffer young people from the negative consequences of exposure to risks by either reducing the impact of the risk or changing the way a person responds to the risk.

## Protective Factors

Some young people who are exposed to multiple risk factors do not become substance abusers, juvenile delinquents, teen parents, or school dropouts. Balancing the risk factors are protective factors, those aspects of people's lives that counter risk factors or provide buffers against them. They protect by either reducing the impact of these risks or by changing the way a person responds to the risks. A key strategy to counter risk factors is to enhance protective factors that promote positive behavior, health, well-being, and personal success. Research indicates that protective factors fall into three basic categories: individual characteristics, bonding, and health beliefs and clear standards.

### Community Bonding

Scales: Opportunity for Positive Involvement, Rewards for Conventional Involvement (Recognition)

### Family Bonding

Scales: Opportunity for Positive Involvement, Rewards for Conventional Involvement (Recognition), Family Attachment (Influences Bonding)

### School Bonding

Scales: Opportunity for Positive Involvement, Rewards for Conventional Involvement (Recognition)

Positive bonding makes up for many other disadvantages caused by other risk factors or environmental characteristics. Children who are attached to positive families, friends, schools, and communities and who are committed to achieving the goals valued by these groups are less likely to develop problems in adolescence. Studies of successful children who live in high-risk neighborhoods or situations indicate that strong bonds with a caregiver can keep children from getting into trouble.

To build bonding, three conditions are necessary: opportunities, skills and recognition. Children must be provided with opportunities to contribute to their community, family, peers, and school. The challenge is to provide children with meaningful, challenging opportunities that help them feel responsible and significant.

Children must be taught the skills necessary to effectively take advantage of the opportunities they are provided. If they do not have the necessary skills to be successful, they experience frustration and/or failure. Children must also be recognized and acknowledged for their efforts. This gives them the incentive to contribute, and reinforces their skillful performance.

### Individual characteristics

Scales: Impulsiveness, Pro-Social Orientation, Resiliency, Social Skills

Research has identified four individual characteristics as protective factors. These attributes are considered to be inherent in the youngster and are difficult to change. They consist of gender; a resilient temperament; a positive social orientation; and intelligence, however, intelligence does not protect against substance abuse.

**Healthy Beliefs and Clear Standards (Belief in the Moral Order)**

Youth need to be bonded to people who have clear, positive standards for behavior. The content of these standards is what protects young people. When parents, teachers and communities set clear standards for children's behavior, when they are widely and consistently supported, and when the consequences for not following the standards are consistent, young people are more likely to follow the standards.

# Survey Results: Drug, Antisocial Behavior, and School Safety

*The survey gathers data on current (30-day) and lifetime use.*

*Survey participants in the 8th, 10th, and 12th grades indicated highest past-month and lifetime use of alcohol, tobacco products, and marijuana.*

*More Arizona students have used marijuana in the past month than have used cigarettes. Results from the Arizona Youth Survey show that 20.5% of students have used marijuana in the past month, compared to 16.5% of students who have used cigarettes.*

## **Total Student Use of Alcohol, Tobacco, and Other Drugs (ATODs)**

Overall, Arizona student use of ATODs is at levels that are similar to current national trends. The results for all substances are presented for two prevalence periods: lifetime (whether the students have ever used the substance), and past 30 days (whether the student has used the substance in the last month). The lifetime prevalence period is the best measure of experimentation occurring among students. The 30-day prevalence period is considered the best measure for current use. This report focuses largely on the 30-day use (current use).

### **Lifetime and 30-Day Use**

As can be seen in Table 3 and in Figures 1 and 2 on the next two pages, Arizona students used alcohol, marijuana, and cigarettes more than other substances in 2002. A majority of students (69.2% in 2002) have used alcohol in their lifetime, 49.3% of students have used cigarettes in their lifetime, and 38.8% have used marijuana. As for past month use, nearly half (46.4%) of students have used alcohol in the past month. More Arizona students have used marijuana in the past month than have used cigarettes—20.5% have used marijuana compared to the 16.5% who have used cigarettes. Of the sampled Arizona youth, 4.8% have used smokeless tobacco in the past month and 24.4% have used smokeless tobacco in their lifetime.

Use rates of other drugs—inhalants, hallucinogens, cocaine, methamphetamines, steroids, heroin, barbiturates, and ecstasy—ranged from 1.2% (steroids) to 4.1% (inhalants) for past month use and 2.5% (steroids) to 10.9% (inhalants) for lifetime use.

Individual substance use by grade and gender will be discussed further throughout the report.

Table 3 and Figures 1 and 2 are located on the following pages.

Table 3

Total Arizona ATOD Use -  
30-Day and Lifetime

30-Day Usage	
Alcohol	46.4%
Smokeless Tobacco	4.8%
Cigarettes	16.5%
Marijuana	20.5%
Inhalants	4.1%
Hallucinogens	2.6%
Cocaine	3.3%
Methamphetamines	2.0%
Steroids	1.2%
Heroin	1.3%
Sedatives/Barbituates	2.3%
Ecstasy	3.1%
Lifetime Usage	
Alcohol	69.2%
Smokeless Tobacco	24.4%
Cigarettes	49.3%
Marijuana	38.8%
Inhalants	10.9%
Hallucinogens	7.4%
Cocaine	8.0%
Methamphetamines	5.9%
Steroids	2.5%
Heroin	2.9%
Sedatives/Barbituates	4.9%
Ecstasy	8.3%

Figure 1

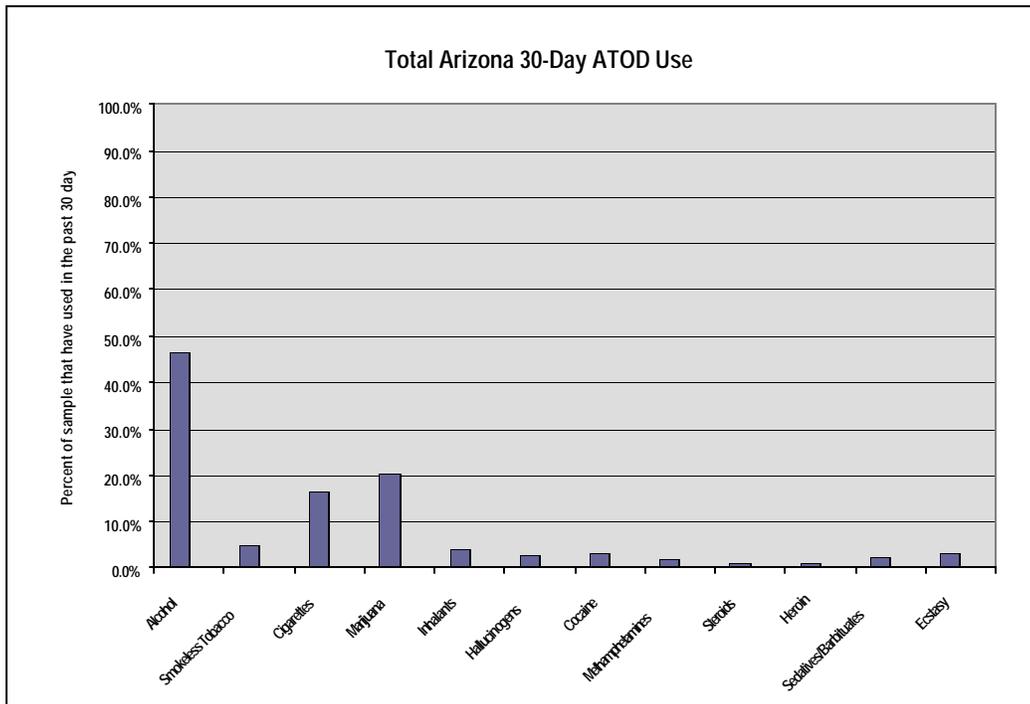
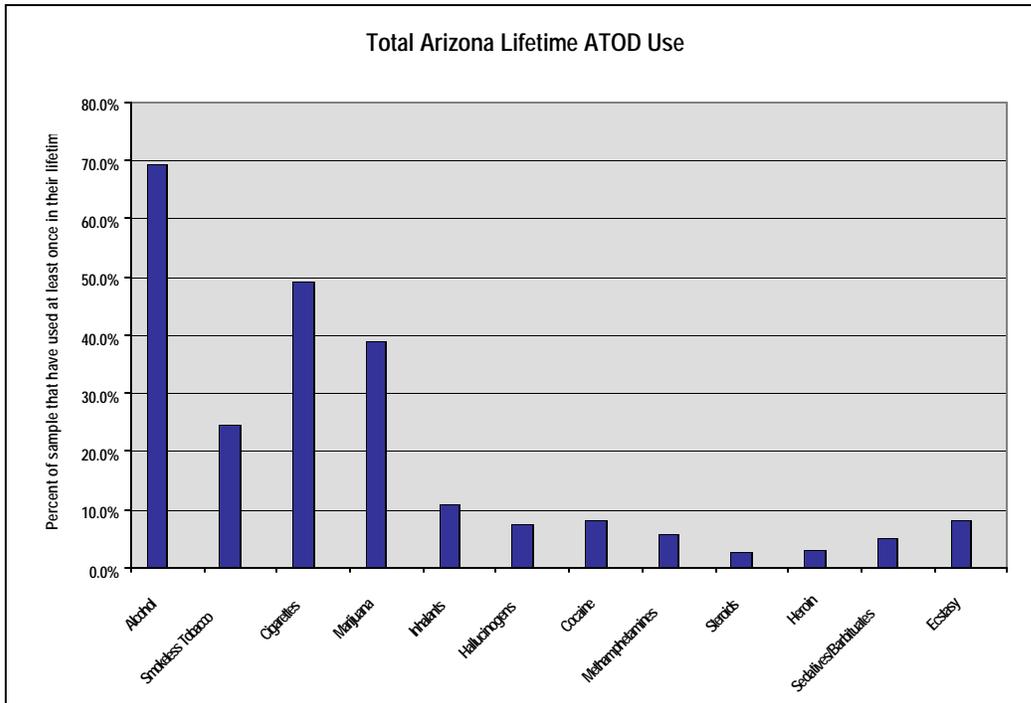


Figure 2



*Age of Initiation is the average age of the first use of alcohol, tobacco, and other drugs.*

*Students use cigarettes at a younger age (12.38 years) than they use alcohol or marijuana.*

*Arizona students reported having their first drink of alcohol more than a year before they began drinking alcoholic beverages regularly. Age of first drink was 13.05 years, and age of first regular drink was 14.41 years.*

*The survey results show that of students using marijuana and students regularly using alcohol, students begin using marijuana at a younger age than alcohol.*

## **Age of Initiation of ATOD Use**

The earlier young people begin using drugs, committing crimes, engaging in violent activity, and becoming involved in other behaviors, the greater the likelihood that they will have problems with these behaviors later on. The Arizona Student Survey asks students to report how old they were when, if ever, they first used ATODs. Asking students to report their age of first substance use allows us to determine the average age when students generally begin using a substance. This not only gives prevention planners an age group in which to target interventions, but also gives the State of Arizona a better idea of the seriousness of the problem—the younger the age of initiation, the more serious the problem is. Through future surveys, age of initiation can be tracked, and if prevention programs are successful, the age of initiation will increase over time. In Table 4 and Figure 3 on the following page, the average age of first use, or age of initiation, is reported.

### **Cigarette Use**

Students begin using cigarettes at a younger age than other drugs. The average age of first use of cigarettes in 2002 was 12.38 years.

### **Alcohol Use**

In alcohol use, a distinction can be made between the first experimental use of alcohol (having more than a or two sip of alcohol) and the first regular use of alcohol (drinking alcoholic beverages regularly, or at least once or twice a month). Arizona students, on average, reported having their first drink of alcohol (having more than a sip or two of alcohol) at age 13.05 years, while the average age of first regular use of alcohol (drinking alcoholic beverages regularly, or at least once or twice a month) was over a year later at age 14.41 years.

### **Marijuana Use**

The survey results also show that those students who have used marijuana, on average, try marijuana at a younger age than students who began regularly using alcohol. In 2002, the average age of initiation for marijuana use was 13.52 years, while students began regularly using alcohol at 14.41 years.

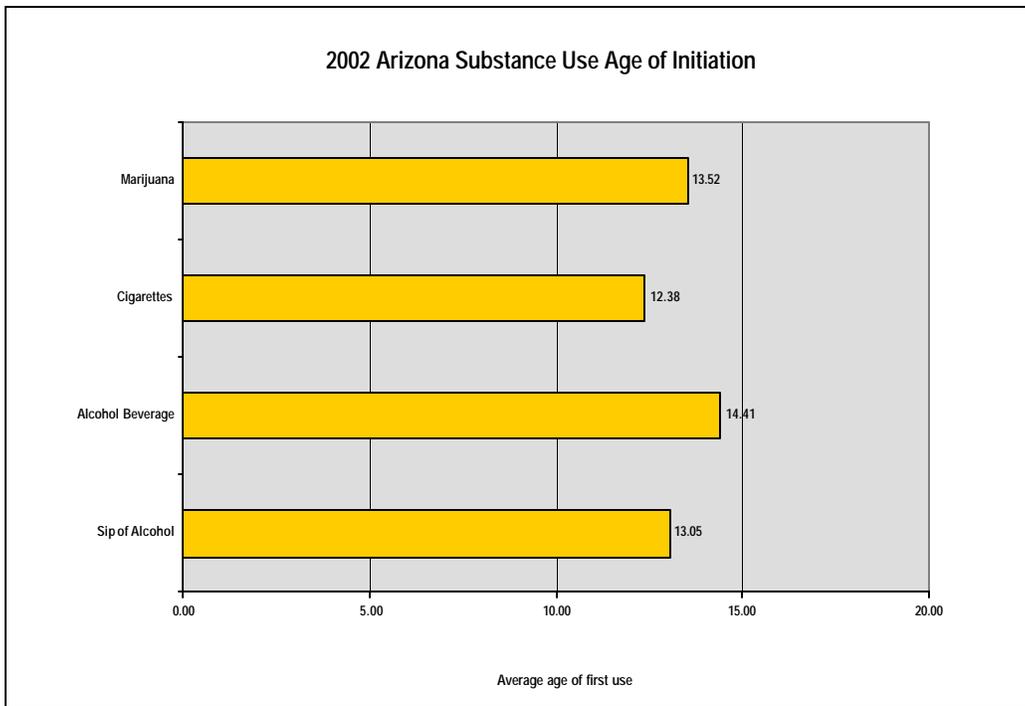
Table 4 and Figure 3 are located on the following page.

Table 4

Age of Initiation

Substance Use	2002
First Drink (More Than a Sip or Two) of Alcohol	13.05
First Regular Alcohol Consumption	14.41
First Cigarette Use	12.38
First Marijuana Use	13.52

Figure 3



*In general, more Arizona males use ATOD substances than females. However, for most substances, the differences in use were small.*

*The greatest differences between male and female use are in lifetime smokeless tobacco use (males used more than females) and cigarette use (females used more than males).*

## **ATOD Use by Gender**

Typically, males tend to use ATOD substances more than females. That trend is also somewhat evident when looking at Arizona student results by gender in Table 5 and Figure 4 on the following page. In the 2002 survey, for most ATODs, more males than females had used. However, differences in use were often very similar, and females had higher use rates in several drug categories.

### **Differences in Male and Female ATOD Use**

For most substances, the difference in male use and female use was small. For example, in 2002, 44.5% of males used alcohol in the past 30-days compared to 48.4% of females.

The greatest difference in usage can be seen in lifetime smokeless tobacco and cigarette use rates. In the 2002 survey, for lifetime use, 13.9% of males indicated they had used smokeless tobacco, while 4.7% of females indicated they had used. For lifetime cigarette use, females use at a higher rate (49.7% for females compared to 41.8% of males). Also, males use marijuana more than females, both in 30-day and lifetime use. Past month marijuana use for males is 22.2%, while it is 19.1% for females. Of males, 40.1% have used marijuana at least once in their lifetime, while 36.5% of females have used marijuana.

As indicated before, females have slightly higher use rates than males in several ATOD categories. For past month use, more females than males used alcohol (48.4% for females compared to 44.5% for males), cigarettes (17.4% compared to 15.7%), inhalants (4.4% compared to 3.7%), and heroin (1.5% compared to 1.2%). For lifetime use, females had higher use rates of alcohol (69.2% for females compared to 66.5% for males), cigarettes (49.7% compared to 41.8%), methamphetamines (5.4% compared to 5.2%), and ecstasy (8.1% compared to 7.9%).

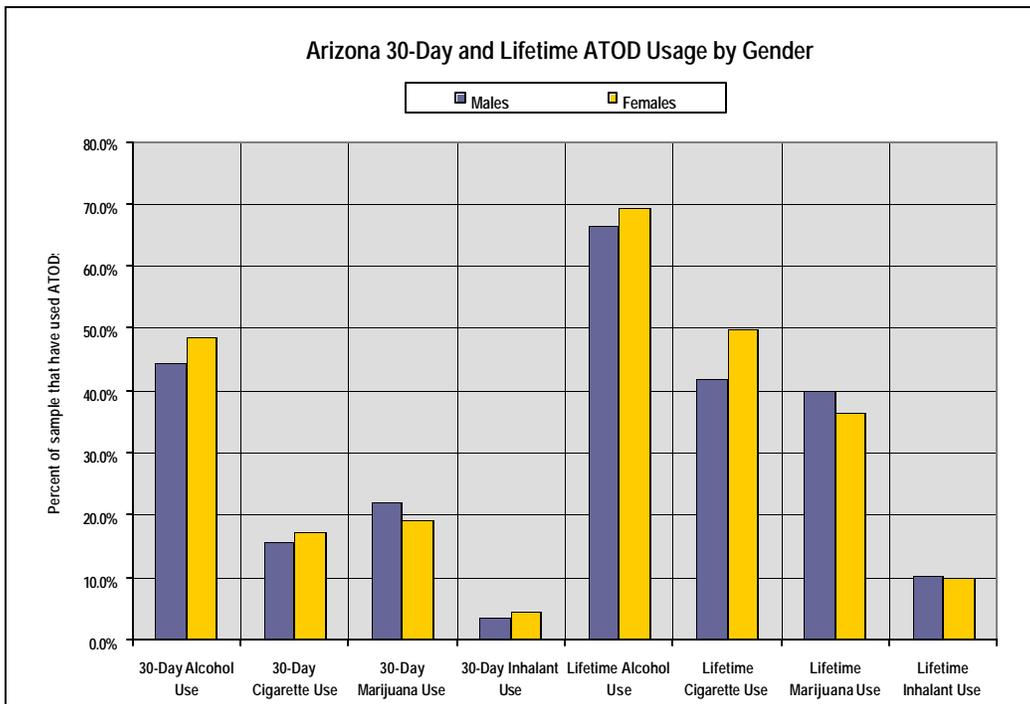
Table 5 and Figure 4 are located on the following page.

Table 5

Usage of ATODs by Gender

	Arizona 2002	
	Males	Females
<b>30-Day Usage</b>		
Alcohol (30-Day)	44.5%	48.4%
Binge Drinking (Past 2 weeks)	25.3%	22.4%
Cigarettes	15.7%	17.4%
Smokeless Tobacco	6.5%	3.1%
Marijuana	22.2%	19.1%
Inhalants	3.7%	4.4%
Methamphetamines	2.0%	1.8%
Cocaine	3.6%	3.1%
Hallucinogens	3.2%	2.1%
Steroids	1.5%	0.9%
Heroin	1.2%	1.5%
Barbituates/Sedatives	2.3%	2.3%
Ecstasy	3.5%	2.7%
<b>Lifetime Usage</b>		
Alcohol	66.5%	69.2%
Cigarettes	41.8%	49.7%
Smokeless Tobacco	13.9%	4.7%
Marijuana	40.1%	36.5%
Inhalants	10.4%	10.0%
Methamphetamines	5.2%	5.4%
Cocaine	7.6%	7.4%
Hallucinogens	7.5%	6.2%
Steroids	2.6%	1.3%
Heroin	2.6%	2.3%
Barbituates/Sedatives	4.6%	4.4%
Ecstasy	7.9%	8.1%

Figure 4



*Alcohol is the most commonly used substance by Arizona students. In the past 30 days 46.4% of students have used alcohol, and 69.2% of students have used alcohol in their lifetime.*

*Of the students included in the Arizona Youth Survey sample, 23.7% indicated they had consumed more than five alcoholic beverages in a row at least once in the past two weeks.*

## ***Alcohol and Binge Drinking***

Tables 6 and 7, and Figures 5 and 6 on the next two pages show that usage of alcohol increases with increased grade level. While 58.9% of 12th graders indicated 30-day alcohol use in 2002, only 34.4% of 8th graders indicated use.

### **30-Day Alcohol Use**

According to the 2002 survey, 34.4% of 8th graders, 47.9% of 10th graders, and 58.9% of 12th graders had used alcohol in the past 30 days. Overall, 46.4% of Arizona students have used alcohol at least once in the past month.

### **Lifetime Alcohol Use**

A greater percentage of students reported having used alcohol at least once in their lifetime. The survey reports that 56.9% of 8th graders, 72.3% of 10th graders, and 80.8% of 12th graders have tried alcohol in their lifetime. A total of 69.2% of Arizona students have used alcohol in their lifetime.

### **Binge Drinking Use**

Rates of student binge drinking (consuming five or more drinks in a row at least once in the past two weeks) also increases with increased grade level. The survey results show that 14.1% of 8th graders, 26.0% of 10th graders, and 32.2% of 12th graders have consumed more than five drinks in a row in the past two weeks.

### **State and National Comparisons**

The Arizona Youth Survey results, when compared to the national MTF results, show that more Arizona students have used alcohol than have students in the national sample. Arizona 8th grade students' 30-day alcohol use rate was 12.9% (34.4% compared to 21.5%) higher than the national sample, Arizona 10th graders' use rate was 8.9% (47.9% compared to 39.0%) higher than the national sample, and Arizona 12th graders' use rate was 9.1% (58.9% compared to 49.8%) higher than the national sample. However, in looking at the lifetime results, Arizona rates and national rates are more comparable. While more Arizona 8th graders have used alcohol in their lifetime than national 8th graders (56.9% compared to 50.5%), lifetime use rates for the 10th and 12th grades are similar for Arizona and national youth. Alcohol differed only by 2.2% for 10th graders, and 1.1% for 12th graders.

Tables 6 and 7, and Figures 5 and 6 are located on the following pages.

Table 6

Alcohol Usage - 30-Day and Lifetime

	Arizona	National
	2002	2001
<b>30-Day Usage</b>		
8th Grade	34.4%	21.5%
10th Grade	47.9%	39.0%
12th Grade	58.9%	49.8%
Total	46.4%	---
<b>Lifetime Usage</b>		
8th Grade	56.9%	50.5%
10th Grade	72.3%	70.1%
12th Grade	80.8%	79.7%
Total	69.2%	---

Figure 5

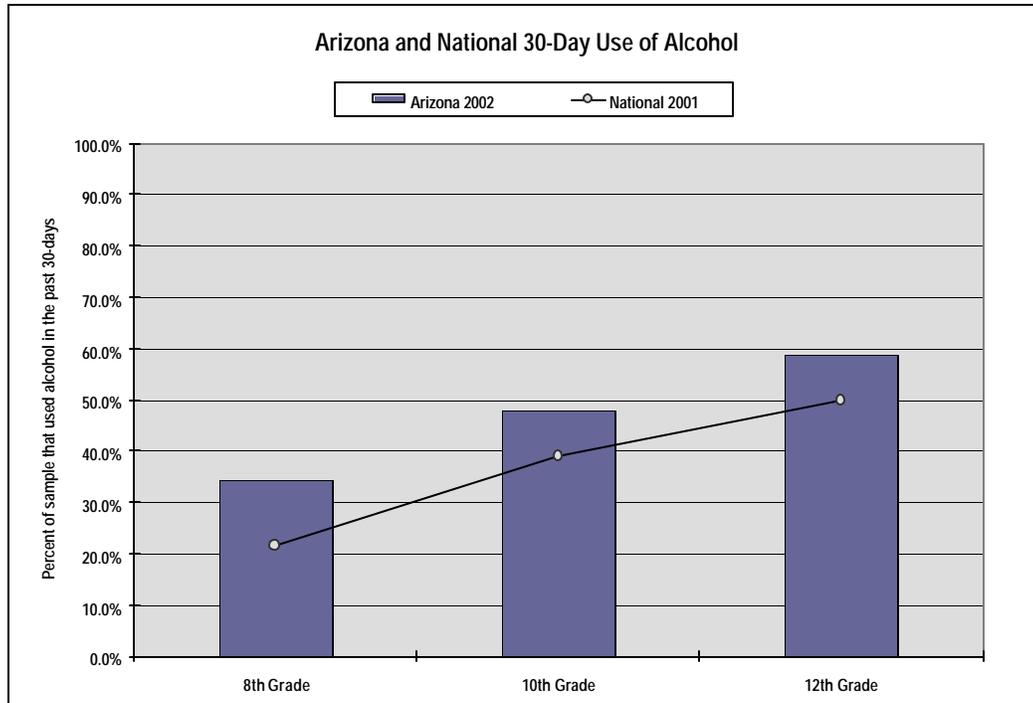
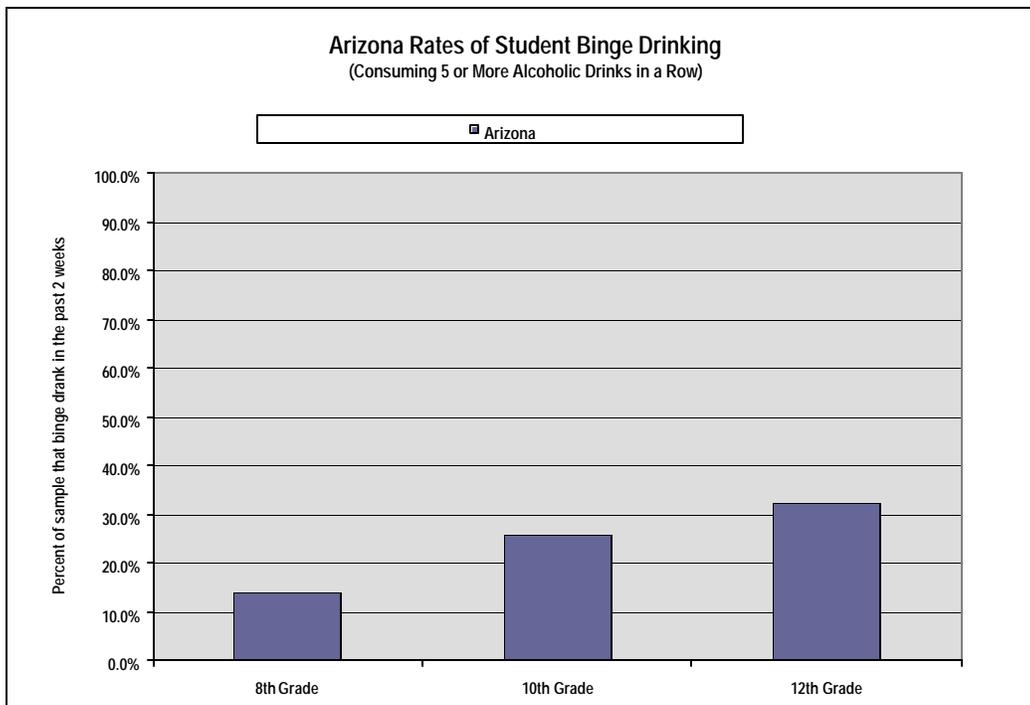


Table 7

Binge Drinking in the Last Two Weeks

	Arizona
	2002
8th Grade	14.1%
10th Grade	26.0%
12th Grade	32.2%
Total	23.7%

Figure 6



*In the past month, 4.8% of Arizona students have used smokeless tobacco, and 24.4% of students have used smokeless tobacco in their lifetime.*

*Substantially more Arizona students experiment with smokeless tobacco, but more national students use smokeless tobacco on a regular basis.*

## **Smokeless Tobacco**

Compared to cigarette use, there was relatively low use of smokeless tobacco in Arizona. This is almost always true of school age populations.

### **30-Day Smokeless Tobacco Use**

In alcohol use results, there were differences in the use of younger students and older students. However, for smokeless tobacco, the differences are small. The 2002 data in Table 8 and Figure 7 on the following page shows that 4.0% of 8th graders had used, 4.7% of 10th graders had used, and 5.9% of 12th graders had used.

### **Lifetime Smokeless Tobacco Use**

For lifetime use, 25.9% of 8th graders, 23.2% of 10th graders, and 24.1% of 12th graders have tried smokeless tobacco before.

### **State and National Comparisons**

Comparisons between the 2002 Arizona Youth Survey and the 2001 national MTF survey show differences in use, with students in the national sample using smokeless tobacco at higher rates of 30-day use, and lower rates of lifetime use, than students in the Arizona sample. For 30-day use, the 8th grade use rate of smokeless tobacco was the same (4.0%). For the 10th grade, the national rate was higher (6.9% national compared to 4.7% for Arizona), and the national rate for 12th graders was also higher (7.8% compared to 5.9%).

Arizona lifetime use rates were 14.2% higher for 8th graders (25.9% compared to 11.7%), 3.7% higher for 10th graders (23.2% compared to 19.5%), and 4.4% higher for 12th graders (24.1% compared to 19.7%).

The difference in national and Arizona rates described above indicates that substantially more Arizona students experiment with smokeless tobacco, but more national students use smokeless tobacco on a regular basis.

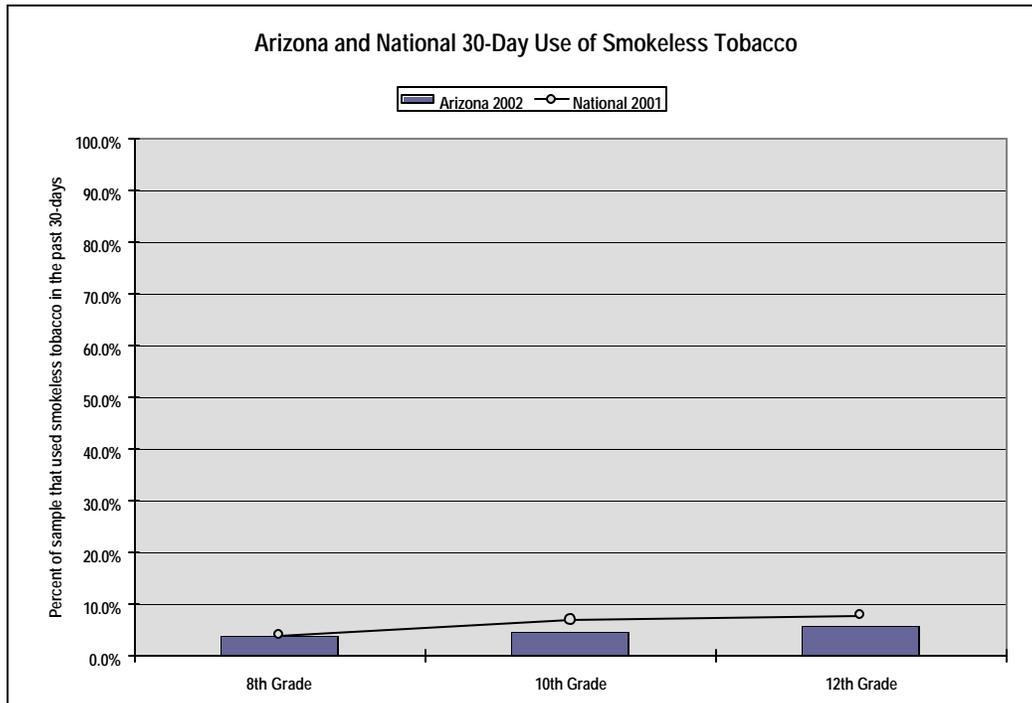
Table 8 and Figure 7 are located on the following page.

Table 8

Smokeless Tobacco Usage -  
30-Day and Lifetime

	Arizona	National
	2002	2001
<b>30-Day Usage</b>		
8th Grade	4.0%	4.0%
10th Grade	4.7%	6.9%
12th Grade	5.9%	7.8%
Total	4.8%	---
<b>Lifetime Usage</b>		
8th Grade	25.9%	11.7%
10th Grade	23.2%	19.5%
12th Grade	24.1%	19.7%
Total	24.4%	---

Figure 7



*In the past month, 16.5% of Arizona students have used cigarettes, and 49.3% have used cigarettes at least once in their lifetime.*

*Arizona youth indicated lower use rates of cigarettes than youth in the national MTF survey.*

*Table 9 shows that the greatest increase in 30-day use occurs after the 8th grade. These findings suggest that prevention efforts need to be focused on the younger student population.*

## **Cigarettes**

Cigarette use increases with increased grade level. In the past month, 16.5% of Arizona students have used cigarettes, and 49.3% have used cigarettes at least once in their lifetime.

### **30-Day Cigarette Use**

In 2002, 9.1% of 8th graders, 18.1% of 10th graders, and 23.2% of 12th graders smoked in the past month. Table 9 and Figure 8 on the following page clearly show that the greatest increase in cigarette use occurs after the 8th grade—use nearly doubled. This finding indicates that prevention efforts should be focused on middle school youth as this is the time when many students encounter pressure to use tobacco for the first time.

### **Lifetime Cigarette Use**

By the time Arizona students graduate from high school, a majority of them have tried cigarettes at least once in their lifetime. In the 2002 survey 39.6% of 8th graders, 49.8% of 10th graders, and 61.1% of 12th graders reported having used cigarettes at least once.

### **State and National Comparisons**

Arizona 30-day use is lower than in the national survey. National 30-day smoking rates are 3.1% higher for the 8th grade (12.2% compared to 9.1%) and 6.3% higher for the 12 grade (29.5% compared to 23.2%) higher than Arizona use rates.

More Arizona 8th graders than national 8th graders have used cigarettes at least once in their lifetime (39.6% for Arizona compared to 36.6% for the national sample). However, for the 10th grade, the national sample had a higher lifetime use rate (52.8% compared to 49.8%); and for the 12th grade, the Arizona rate was 0.1% higher than the national rate.

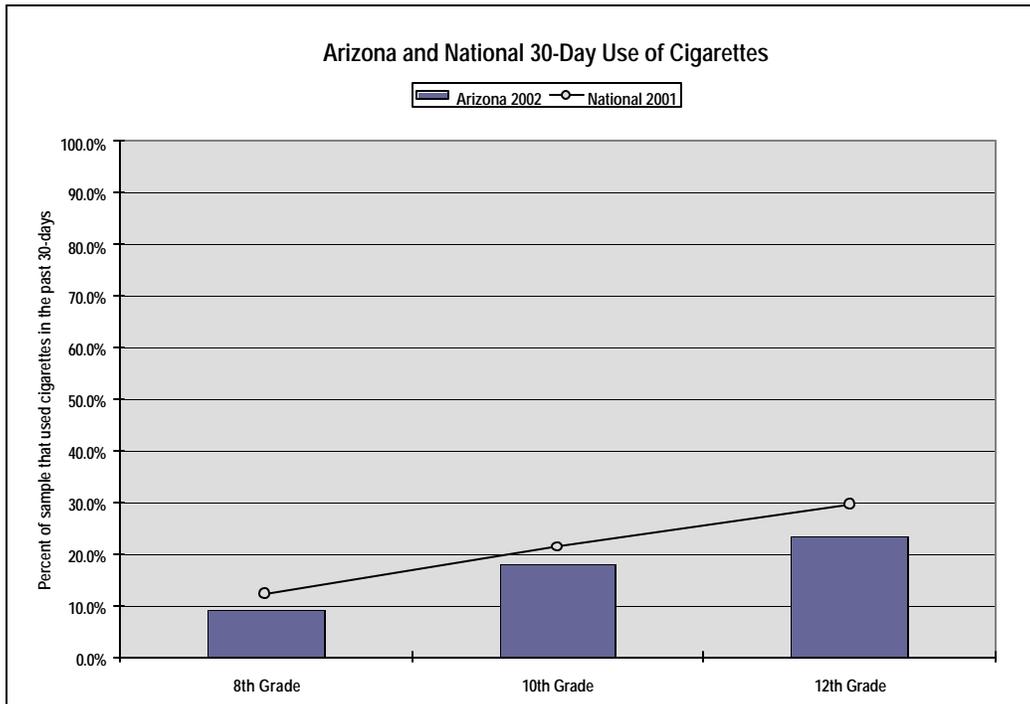
Table 9 and Figure 8 are located on the following page.

Table 9

Cigarettes Usage - 30-Day and Lifetime

	Arizona	National
	2002	2001
<b>30-Day Usage</b>		
8th Grade	9.1%	12.2%
10th Grade	18.1%	21.3%
12th Grade	23.2%	29.5%
Total	16.5%	---
<b>Lifetime Usage</b>		
8th Grade	39.6%	36.6%
10th Grade	49.8%	52.8%
12th Grade	61.1%	61.0%
Total	49.3%	---

Figure 8



*As with cigarette use, the 2002 survey shows that the greatest increase in marijuana use occurs in middle school.*

*In each grade, Arizona 30-day and lifetime use rates of marijuana were higher than national MTF use rates.*

## **Marijuana**

In the past 30 days, 20.5% of 8th, 10th, and 12th graders have used marijuana at least one time. While cigarette use is usually higher than marijuana use, results from the survey indicate that more Arizona youth have used marijuana in the past month than have used cigarettes (20.5% compared to 16.5% nationally).

### **30-Day Marijuana Use**

Marijuana use increases with increased grade level, with 14.3% of 8th graders using in the past 30 days, 22.4% of 10th graders using, and 25.4% of 12th graders using. These results can be seen in Table 10 and Figure 9 on the following page. As with cigarette use, the biggest increase in usage comes during middle school when students transition from the 8th to the 10th grades.

### **Lifetime Marijuana Use**

According to the 2002 survey, 26.6% of 8th graders, 41.6% of 10th graders, and 50.8% of 12th graders have tried marijuana at least once in their lifetime.

### **State and National Comparisons**

Arizona 30-day and lifetime usage rates of marijuana are higher than national rates for all grades. Rates of 30-day usage are 2.6% (grade 10) to 5.1% (grade 8) higher for Arizona youth than for the national sample. For lifetime usage, Arizona rates were 1.5% (grade 10) to 6.2% (grade 8) higher than national students.

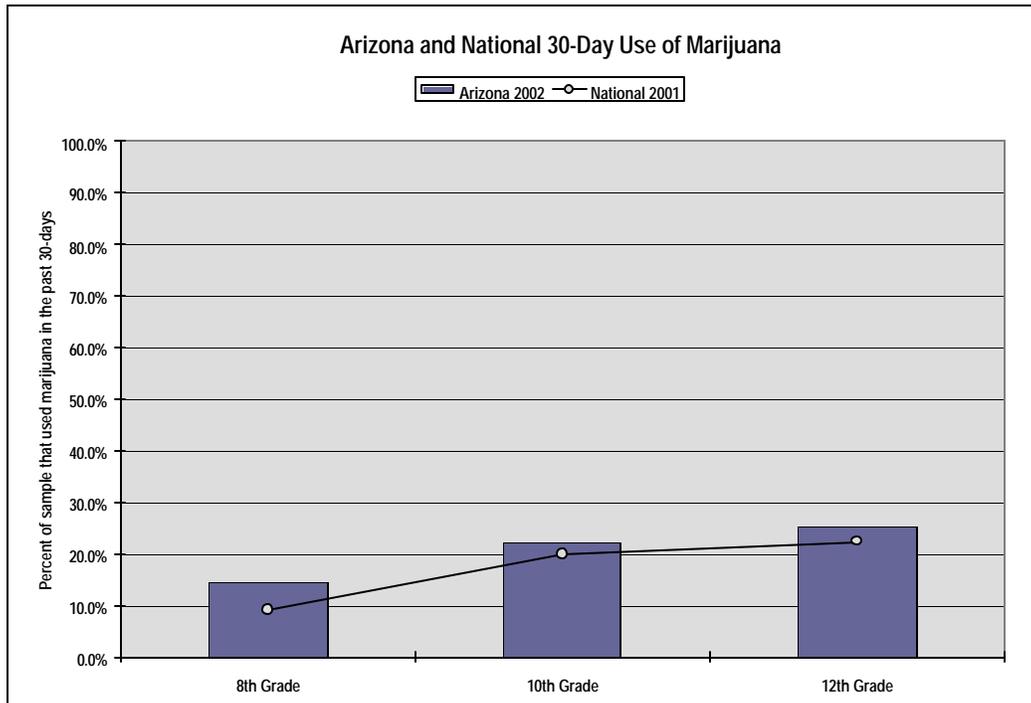
Table 10 and Figure 9 are located on the following page.

Table 10

Marijuana Usage - 30-Day and Lifetime

	Arizona	National
	2002	2001
<b>30-Day Usage</b>		
8th Grade	14.3%	9.2%
10th Grade	22.4%	19.8%
12th Grade	25.4%	22.4%
Total	20.5%	---
<b>Lifetime Usage</b>		
8th Grade	26.6%	20.4%
10th Grade	41.6%	40.1%
12th Grade	50.8%	49.0%
Total	38.8%	---

Figure 9



*Use of most ATODs increases with increased grade level, but use of inhalants is highest in the 8th grade. In 2002, while 2.0% of 12th graders used inhalants in the past month, 6.5% of 8th graders used.*

*Past month inhalant use in Arizona is higher than national levels, while Arizona lifetime use is lower than national levels.*

## ***Inhalants***

While use of other drugs tends to increase with increased grade level, a common pattern for inhalant use is to peak in middle school and decline significantly after the 8th grade. This trend can be seen in the Arizona results as well. The difference in inhalant use trends may be related to the fact that younger students have more access to inhalants than they do other drugs.

### **30-Day Inhalant Use**

As Table 11 and Figure 10 show, 2002 30-day inhalant use peaks in the 8th grade (6.5%), and then decreases. Twelfth grade 30-day inhalant usage is lower at 2.0%.

### **State and National Comparisons**

While 30-day inhalant use in Arizona is higher than national levels, Arizona lifetime use is lower than national levels. This indicates a higher rate of inhalant experimentation on the national level. For 30-day use, Arizona rates were 0.3% (grade 12) to 2.5% (grade 8) higher than in the national sample. Greater differences are seen in the lifetime use results. National inhalant use rates were 2.9% (grade 12) to 5.2% (grade 8) higher than Arizona rates.

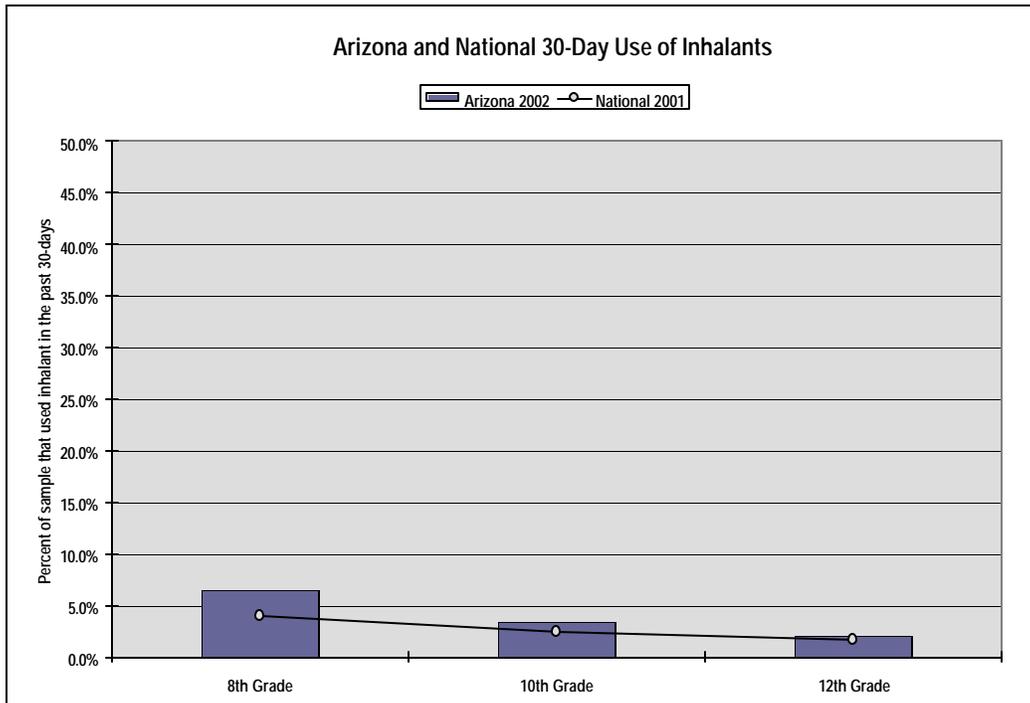
Table 11 and Figure 10 are located on the following page.

Table 11

Inhalants Usage - 30-Day and Lifetime

	Arizona 2002	National 2001
<b>30-Day Usage</b>		
8th Grade	6.5%	4.0%
10th Grade	3.4%	2.4%
12th Grade	2.0%	1.7%
Total	4.1%	---
<b>Lifetime Usage</b>		
8th Grade	11.9%	17.1%
10th Grade	10.4%	15.2%
12th Grade	10.1%	13.0%
Total	10.9%	---

Figure 10



*An overwhelming majority of students never try illicit drugs such as hallucinogens, methamphetamines, cocaine, steroids, heroin, barbiturates, and ecstasy.*

*Of the seven illicit drugs discussed in this section, Arizona 8th graders have experimented with ecstasy more than the other six drugs.*

## ***Other Illicit Drugs: Hallucinogens, Methamphetamines, Cocaine, Steroids, Heroin, Barbiturates, and Ecstasy***

An overwhelming majority of students never try illicit drugs such as hallucinogens, methamphetamines, cocaine, steroids, heroin, barbiturates, and ecstasy. Whereas no more than 12.6% of Arizona students have used these drugs in their lifetime, an even lower percentage of students regularly use these illicit drugs. This section will report the Arizona rates of the previously mentioned illicit drugs.

Total past month use was 2.6% for hallucinogens, 3.3% for cocaine, 2.0% for methamphetamines, 1.2% for steroids, 1.3% for heroin, 2.3% for barbiturates, and 3.1% for ecstasy. Complete results can be seen in Tables 1 and 12-18, and Figures 11-17.

### **30-Day Illicit Drug Use**

Use of these illicit drugs increases slightly with increased grade level. Past month use of hallucinogens, methamphetamines, cocaine, steroids, heroin, barbiturates, and ecstasy, are similar when looked at by grade. Of eighth graders in the 2002 survey, 1.5% had used hallucinogens, 1.0% had used methamphetamines, 2.6% had used cocaine, 1.2% had used steroids, 1.2% had used heroin, 1.0% had used barbiturates, and 3.6% had used ecstasy. Of tenth graders, 3.2% had used hallucinogens, 2.6% had used methamphetamines, 3.5% had used cocaine, 1.5% had used steroids, 1.4% had used heroin, 2.6% had used barbiturates, and 2.5% had used ecstasy. Of twelfth graders, 3.1% had used hallucinogens, 2.2% had used methamphetamines, 4.0% had used cocaine, 0.9% had used steroids, 1.3% had used heroin, 3.4% had used barbiturates, and 3.2% had used ecstasy.

### **Lifetime Illicit Drug Use**

Lifetime use of each illicit drug was less similar when looked at by grade. Of the seven illicit drugs discussed in this section, Arizona 8th graders have experimented with ecstasy more than the other seven drugs—5.5% of 8th graders have tried ecstasy at least once. For 10th graders, the drug most experimented with was also ecstasy—8.2% of 10th graders have tried ecstasy at least once in their lifetime. Hallucinogens were the drug most often experimented with by 12th graders—12.6% have tried hallucinogens at least once in their lifetime.

*While all use rates of illicit substances are very low for Arizona and national students, past 30-day rates for hallucinogens, methamphetamines, cocaine, steroids, heroin, barbiturates, and ecstasy tended to be slightly higher for Arizona youth.*

*For a majority of the substances and grades, Arizona past month use rates are less than one percent more than national rates. While these rates are only slightly higher, the consistently higher rates are cause for concern.*

### **State and National Illicit Drug Use Comparisons**

In comparison to national MTF survey results, the Arizona Youth Survey indicates that 30-day and lifetime use rates of hallucinogens, methamphetamines, cocaine, steroids, heroin, barbiturates, and ecstasy are similar and comparable. Differences in use were small.

While all use rates of illicit substances are very low for Arizona and national students, past month rates for hallucinogens, methamphetamines, cocaine, steroids, heroin, barbiturates, and ecstasy tended to be slightly higher for Arizona youth. Past month use rates of the seven substances for Arizona 8th, 10th, and 12th graders are anywhere from 0.1% to 2.2% higher than the national sample.

For a majority of the substances and grades, Arizona past month use rates are less than one percent more than national rates. Rates that were less than one percent higher than national rates were: Arizona 8th grade use of hallucinogens, 12th grade use of methamphetamines, 8th grade use of steroids, 10th grade use of steroids, 8th grade use of heroin, 10th grade use of heroin, 12th grade use of heroin, 12th grade use of sedatives, and 12th grade use of ecstasy. Rates that were more than one percent higher than national rates were: Arizona 10th grade use of hallucinogens and methamphetamines (1.1% higher), 8th grade use of ecstasy (1.8% higher). All of these rates indicate a slightly higher regular use rate of illicit drugs. While the rates are only slightly higher, the consistently higher rates are disturbing.

Perhaps a notable difference in use is found when looking at past month use rates of cocaine, where use is higher for Arizona students in the 8th grade (1.4% higher), 10th grade (2.2% higher), and 12th grade (1.9% higher).

For lifetime use of the seven substances, national rates tended to be more similar to rates for Arizona youth. National lifetime use rates were higher for hallucinogens (grades 8 and 12), methamphetamines (grade 8), steroids (grades 8, 10, and 12), and barbiturates (grade 12). The instances where Arizona had higher lifetime use rates in all grades were for heroin (Arizona's rates were 0.2% to 2.0% higher), cocaine (Arizona's rates were 0.2% to 3.8% higher), and ecstasy (Arizona's rates were 0.2% to 0.3% higher).

Tables 12-18 and Figures 11-17 are located on the following pages.

Table 12

LSD/Hallucinogens Usage -  
30-Day and Lifetime

	Arizona	National
	2002	2001
<b>30-Day Usage</b>		
8th Grade	1.5%	1.2%
10th Grade	3.2%	2.1%
12th Grade	3.1%	3.2%
Total	2.6%	---
<b>Lifetime Usage</b>		
8th Grade	2.4%	4.0%
10th Grade	8.3%	7.8%
12th Grade	12.6%	12.8%
Total	7.4%	---

Figure 11

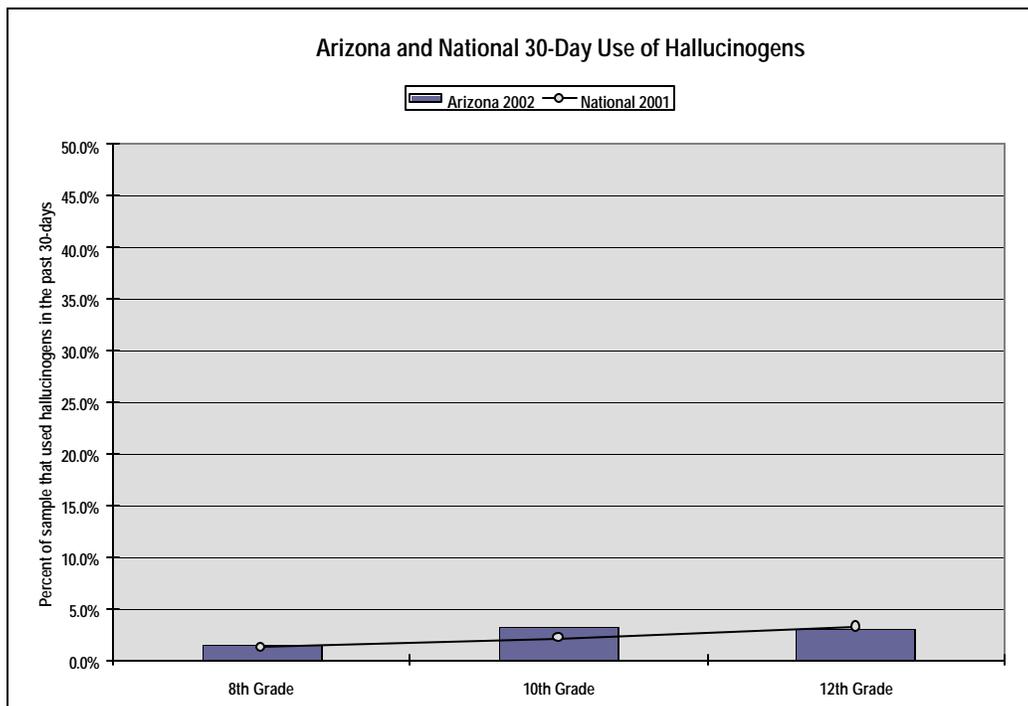


Table 13

Methamphetamines Usage -  
30-Day and Lifetime

	Arizona	National
	2002	2001
<b>30-Day Usage</b>		
8th Grade	1.0%	1.3%
10th Grade	2.6%	1.5%
12th Grade	2.2%	1.5%
Total	2.0%	---
<b>Lifetime Usage</b>		
8th Grade	2.9%	4.4%
10th Grade	6.8%	6.4%
12th Grade	8.6%	6.9%
Total	5.9%	---

Figure 12

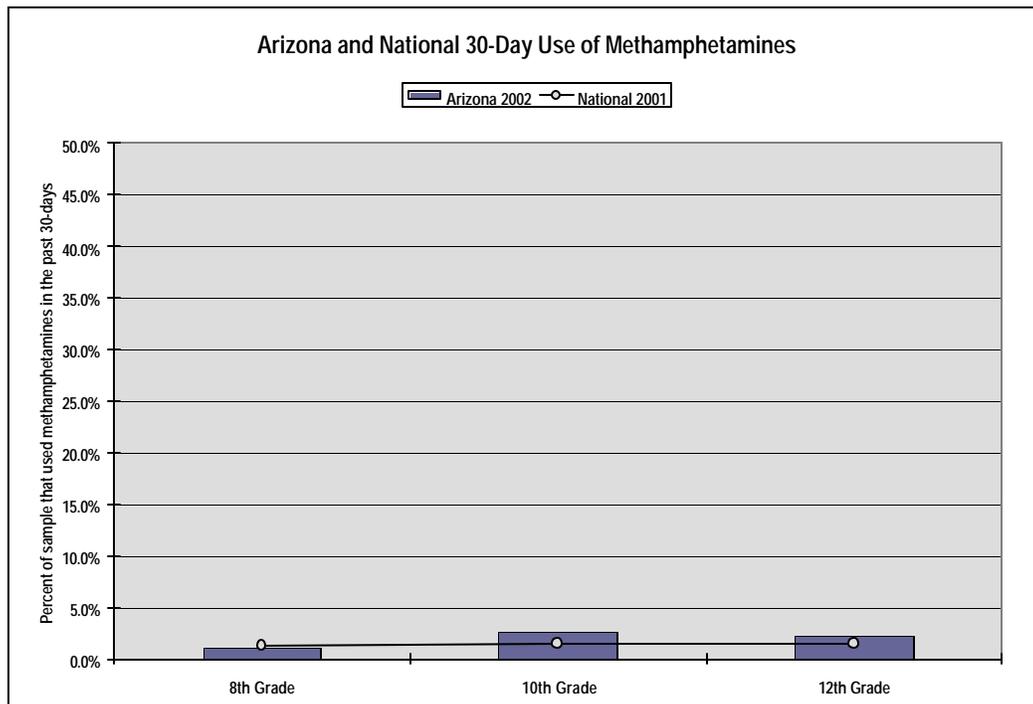


Table 14

Cocaine Usage - 30-Day and Lifetime

	Arizona	National
	2002	2001
<b>30-Day Usage</b>		
8th Grade	2.6%	1.2%
10th Grade	3.5%	1.3%
12th Grade	4.0%	2.1%
Total	3.3%	---
<b>Lifetime Usage</b>		
8th Grade	4.5%	4.3%
10th Grade	8.2%	5.7%
12th Grade	12.0%	8.2%
Total	8.0%	---

Figure 13

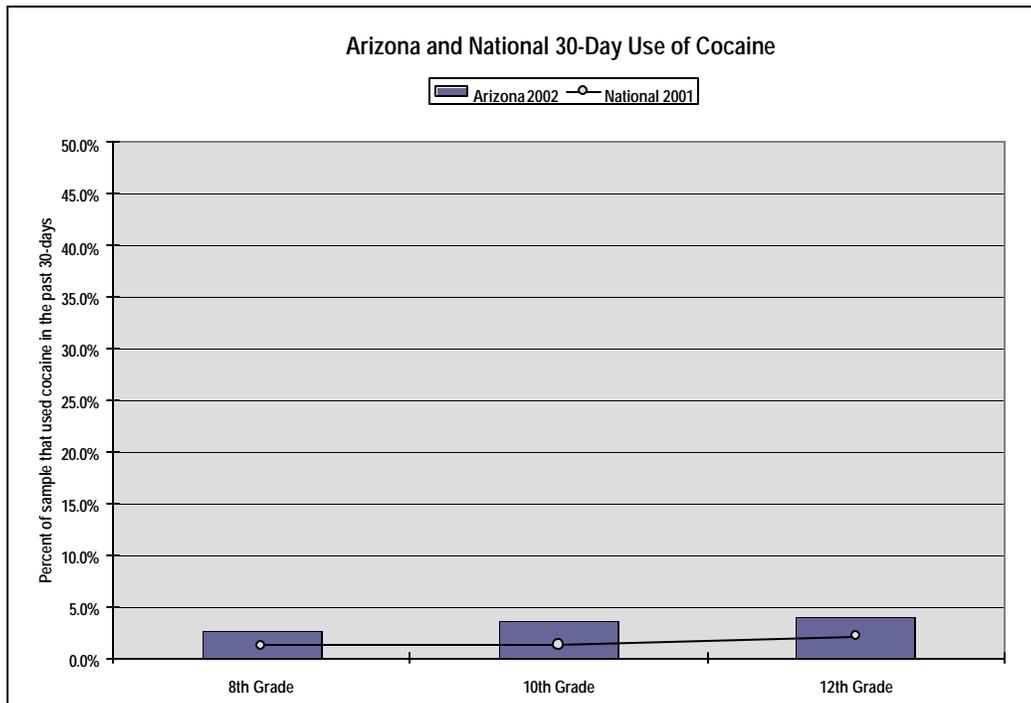


Table 15

Steroids Usage - 30-Day and Lifetime

	Arizona	National
	2002	2001
<b>30-Day Usage</b>		
8th Grade	1.2%	0.7%
10th Grade	1.5%	0.9%
12th Grade	0.9%	1.3%
Total	1.2%	---
<b>Lifetime Usage</b>		
8th Grade	2.2%	2.8%
10th Grade	2.7%	3.5%
12th Grade	2.7%	3.7%
Total	2.5%	---

Figure 14

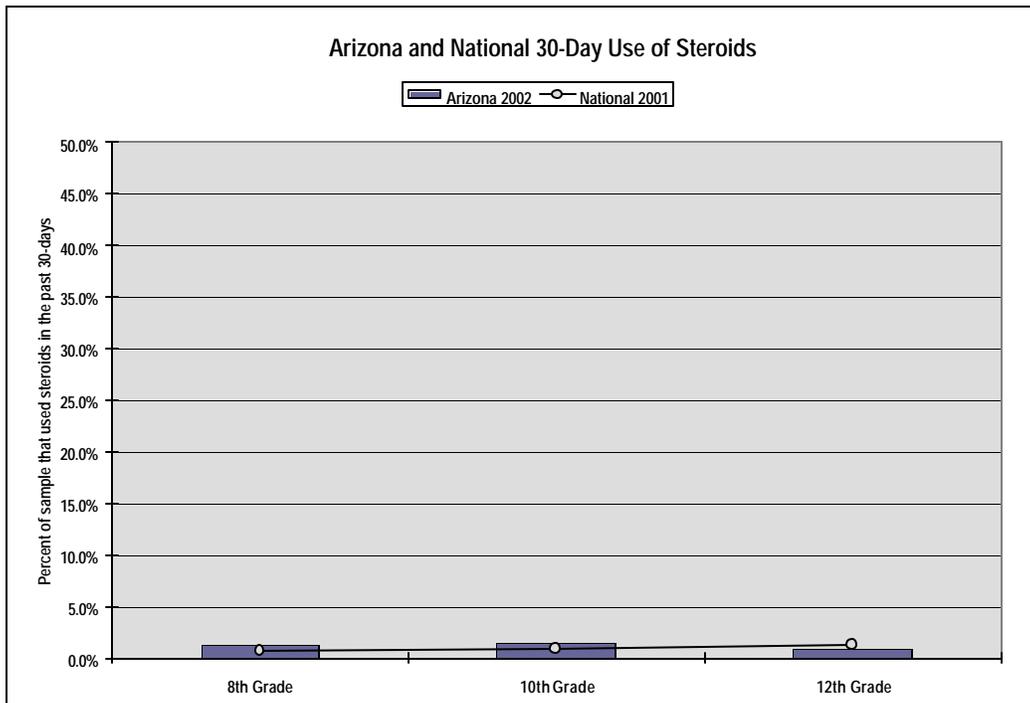


Table 16

Heroin Usage - 30-Day and Lifetime

	Arizona	National
	2002	2001
<b>30-Day Usage</b>		
8th Grade	1.2%	0.6%
10th Grade	1.4%	0.3%
12th Grade	1.3%	0.4%
Total	1.3%	---
<b>Lifetime Usage</b>		
8th Grade	1.9%	1.7%
10th Grade	3.2%	1.7%
12th Grade	3.8%	1.8%
Total	2.9%	---

Figure 15

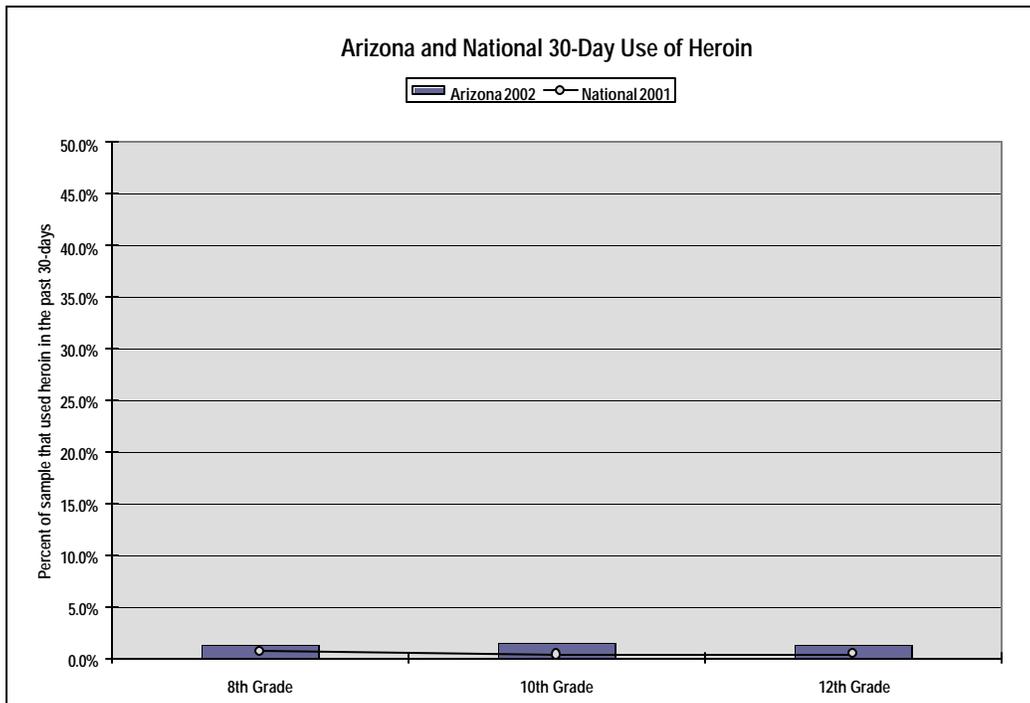


Table 17

Barbituates/Sedatives Usage -  
30-Day and Lifetime

	Arizona	National
	2002	2001
<b>30-Day Usage</b>		
8th Grade	1.0%	---
10th Grade	2.6%	---
12th Grade	3.4%	2.8%
Total	2.3%	---
<b>Lifetime Usage</b>		
8th Grade	2.1%	---
10th Grade	5.7%	---
12th Grade	7.4%	8.7%
Total	4.9%	---

Figure 16

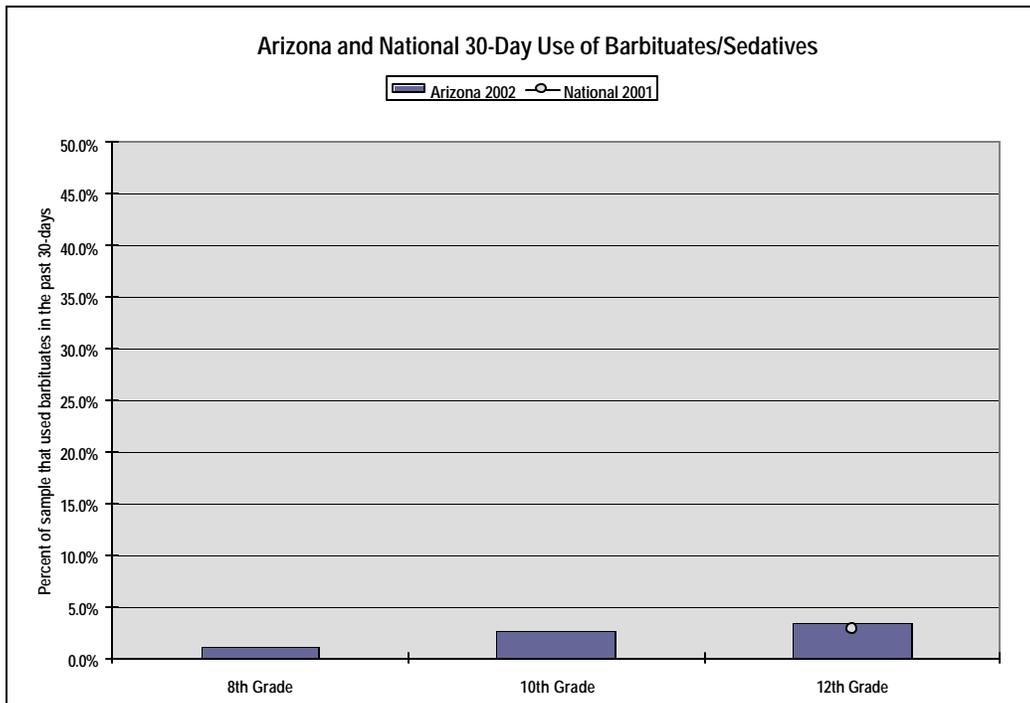
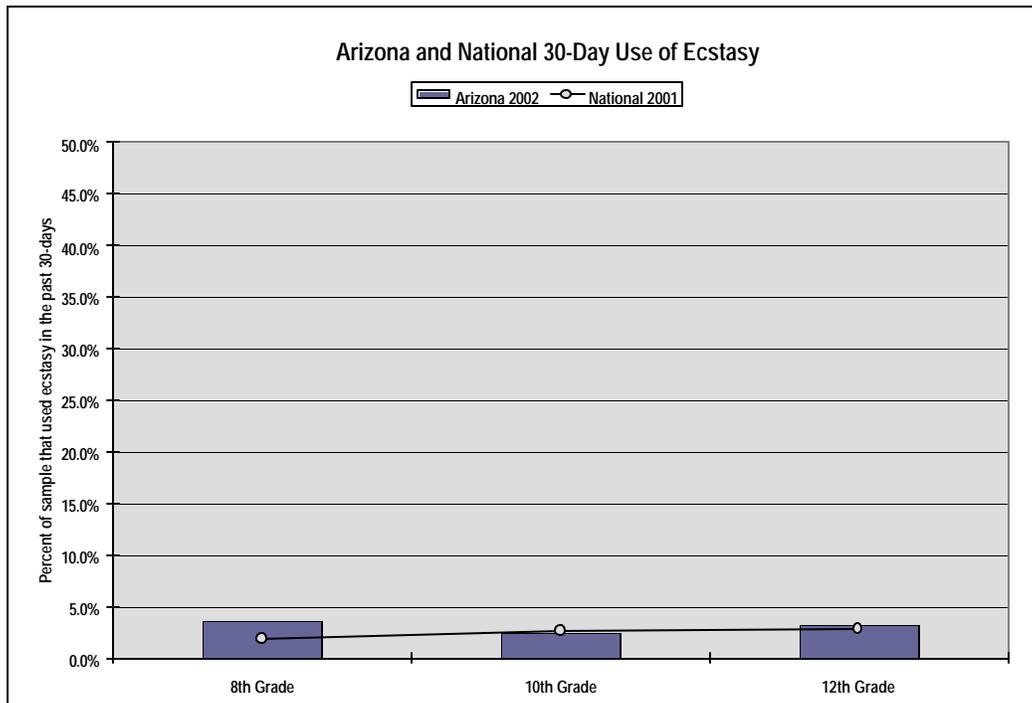


Table 18

Ecstasy Usage - 30-Day and Lifetime

	Arizona	National
	2002	2001
<b>30-Day Usage</b>		
8th Grade	3.6%	1.8%
10th Grade	2.5%	2.6%
12th Grade	3.2%	2.8%
Total	3.1%	---
<b>Lifetime Usage</b>		
8th Grade	5.5%	5.2%
10th Grade	8.2%	8.0%
12th Grade	12.0%	11.7%
Total	8.3%	---

Figure 17



## ***Substance Use by Academic Grades***

*Of the students who report getting better grades, fewer have tried ATODs and fewer are currently using ATODs than those who report poorer grades.*

*'D' students are approximately 15 times more likely to have indicated use of alcohol in the past 30 days than 'A' students.*

Table 19 and Figure 18 show a clear relationship between substance use and academic grades. Of the students who report getting better grades, fewer have tried ATODs and fewer are currently using ATODs than those who report poorer grades.

'D' students are approximately 15 times more likely to have indicated use of alcohol in the past 30 days than 'A' students. 'D' students are also six times more likely to use marijuana, seven times more likely to use cigarettes, and six times more likely to use inhalants in the past 30 days than 'A' students. Similar and more dramatic differences can be seen for individual drugs. See Table 19, and Figure 18 for complete results.

The students getting A's are more invested in the education process and more bonded to school. It is unclear why 'D' students indicated a higher use rate than 'F' students. It is interesting to note that the first large increase in use occurs in 'C' students; Figure 18 shows that while 'A' and 'B' students have similar use rates, the difference between 'B' and 'C' students is much larger. In fact, 'C' and 'D' student have similar rates of marijuana and inhalant use, and 'C' students actually indicated a higher use rate for cigarettes than 'D' students.

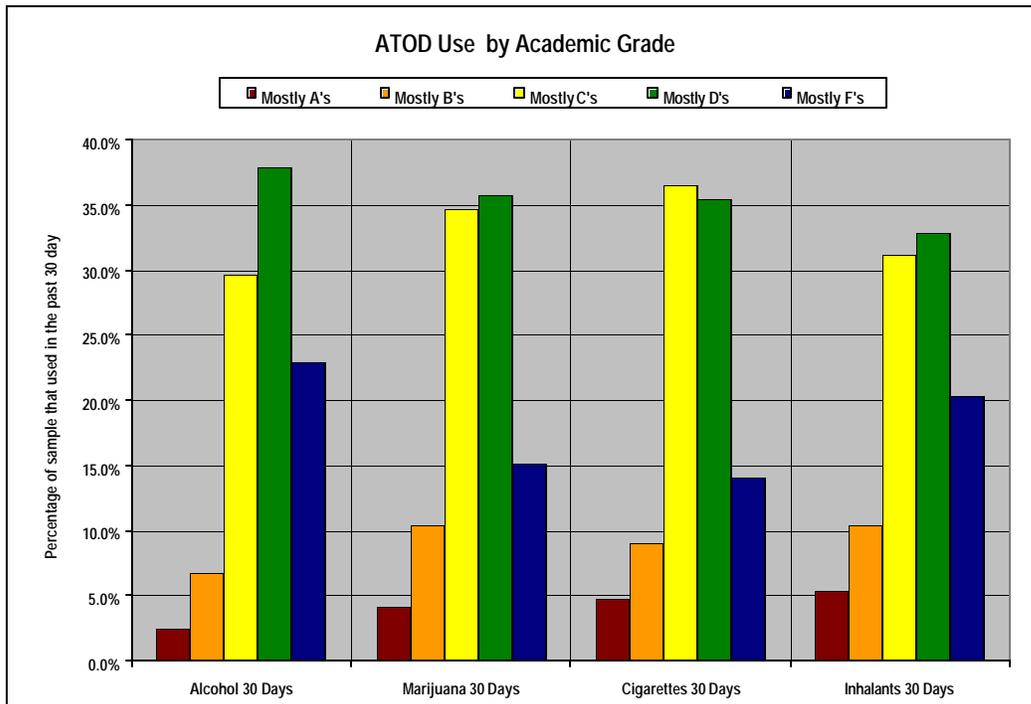
Finally, it is important to note that students who reported not using alcohol, tobacco or other drugs in the past 30-days performed significantly better in school than those students who did report ADOT use during the same time frame. See Table 19 on the following page to review the correlation between drug usage and lower grade performance.

Table 19

Percentage Using ATODs by Academic Grades

Drugs Used	Academic Grades				
	Mostly A's	Mostly B's	Mostly C's	Mostly D's	Mostly F's
Alcohol Lifetime	2.3%	6.3%	28.8%	38.2%	24.3%
Alcohol 30 Days	2.5%	6.8%	29.7%	37.9%	23.0%
Marijuana Lifetime	3.5%	8.7%	33.3%	37.3%	17.3%
Marijuana 30 Days	4.1%	10.4%	34.6%	35.7%	15.2%
Cigarettes Lifetime	2.9%	7.4%	32.0%	38.4%	19.2%
Cigarettes 30 Days	4.8%	9.0%	36.5%	35.5%	14.1%
Inhalants Lifetime	3.9%	9.6%	32.3%	35.6%	18.6%
Inhalants 30-Day	5.3%	10.4%	31.2%	32.8%	20.3%
Hallucinogens Lifetime	4.4%	9.9%	35.2%	33.3%	17.2%
Hallucinogens 30-Day	5.9%	10.9%	36.8%	31.9%	14.5%
Cocaine Lifetime	4.7%	10.4%	38.7%	31.9%	14.3%
Cocaine 30-Day	5.2%	12.3%	37.7%	32.2%	12.6%
Stimulants Lifetime	5.9%	13.4%	37.2%	30.6%	13.0%
Stimulants 30-Day	6.7%	14.6%	36.3%	29.2%	13.1%
Sedatives Lifetime	4.0%	8.0%	31.4%	36.2%	20.5%
Sedatives 30-Day	3.8%	6.8%	29.7%	38.6%	21.2%
Steroids Lifetime	4.9%	13.4%	29.6%	33.1%	19.0%
Steroids 30-Day	6.4%	13.5%	25.5%	34.0%	20.6%
Heroin Lifetime	6.0%	11.7%	41.9%	29.9%	10.5%
Heroin 30-Day	5.6%	12.3%	42.0%	31.5%	8.6%
Ecstasy Lifetime	4.1%	11.2%	36.7%	32.7%	15.3%
Ecstasy 30-Day	4.5%	14.9%	36.5%	32.0%	12.1%

Figure 18



*Perceived availability is a measurement of how easy students believe it is to get ATODs and handguns.*

*The substance perceived to be the easiest to get was cigarettes.*

*Survey respondents indicated that the substances perceived to be the most difficult to get were cocaine and other drugs.*

*A comparison of national MTF and Arizona survey results shows that students in Arizona believe that alcohol, tobacco, and other drugs are more difficult to get than students nationwide.*

## **Perceived Availability of ATODs and Handguns**

Prevention researchers have identified that there is a higher risk that youth will abuse drugs when there are more drugs available in a community. In addition to the *actual* availability of drugs, *perceived* availability is also associated with risk. For example, in schools and communities where students just *think* drugs are more available, a higher rate of drug use occurs.

The Arizona Youth Survey measures perceived availability of ATODs by asking students how easy they think it would be to get ATODs and handguns. This section focuses on the percentage of students who reported that they believed it was “Sort of easy” or “Very easy” to get alcohol, cigarettes, cocaine or other drugs, marijuana, or a handgun. Perceived availability data can also be found on the following page in Table 20 and Figure 19.

### **2002 Perceived Availability**

According to survey participants, cigarettes are perceived to be the easiest substance to get—65.4% of students indicated that it was “Sort of easy” or “Very easy” to get cigarettes. The survey also found that 64.1% of students indicated that alcohol (beer, wine, or hard liquor) was easy to get, and 64.0% indicated that marijuana was easy to get. The substance perceived as being least available was cocaine and other drugs—only 32.8% of students perceived these drugs to be “Sort of easy” or “Very easy” to get. Also, 25.8% indicated that handguns were easy to get.

### **State and National Perceived Availability Comparisons**

A comparison of the 2002 Arizona Youth Survey results to the national MTF survey results shows that students in Arizona believe that alcohol, tobacco, and other drugs are more difficult to get than students nationwide. The greatest differences are found in perceived availability of alcohol and perceived availability of cigarettes. For perceived availability of alcohol, 27.0% more 8th graders nationwide than Arizona 8th graders perceive alcohol as being easy to get; while 19.5% more 10th graders and 11.8% more 12th graders in the national sample perceive the substance as easily available. For perceived availability of cigarettes, national rates are 25.6% higher for 8th graders than Arizona 8th graders and 18.3% higher for national 10th graders than Arizona 10th graders.

The differences in perceived availability of marijuana are smaller, with rates being only 3.8% to 8.7% higher for national students than for Arizona students.

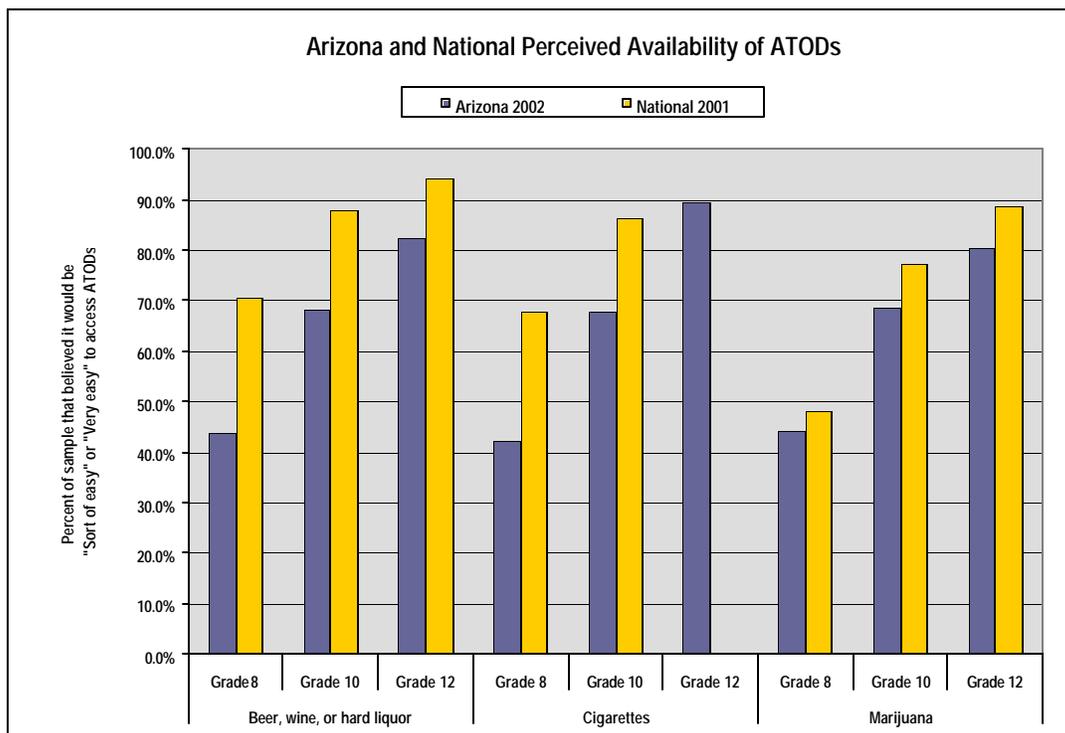
Table 20 and Figure 19 are located on the following page.

Table 20

Perceived Availability of ATODs and Guns: Percent of students that believed it would be "Sort of easy" or "Very easy" to get one of the following:

	Grade 8		Grade 10		Grade 12		Total
	Arizona 2002	National 2001	Arizona 2002	National 2001	Arizona 2002	National 2001	Arizona 2002
Beer, wine, or hard liquor	43.6%	70.6%	68.2%	87.7%	82.5%	94.3%	64.1%
Cigarettes	42.1%	67.7%	68.0%	86.3%	89.4%	---	65.4%
Cocaine or other drugs	22.1%	---	33.0%	---	44.6%	---	32.8%
Marijuana	44.3%	48.1%	68.7%	77.4%	80.3%	88.5%	64.0%
Handgun	21.0%	---	24.8%	---	32.6%	---	25.8%

Figure 19



*Perceived Harmfulness measures the percentage of students that believed there was “Great risk” in using ATOD substances occasionally or often.*

*The form of substance use which was perceived as being the least harmful was experimental marijuana use (used only once or twice).*

*The form of substance use which was perceived as being the most harmful was heavy smoking (smoking one or more packs of cigarettes per day).*

## **Perceived Harmfulness**

Prevention research also indicates that students are at a greater risk for substance abuse when they perceive little or no risk in using ATODs. When students believe that using alcohol, cigarettes, and marijuana occasionally or often will not harm them, they are more likely to use them.

This section reports the percentage of students who believed that there was “Great risk” in smoking one or more packs of cigarettes per day; trying marijuana once, twice, or regularly; or taking one or two drinks of an alcoholic beverage nearly every day. Perceived harmfulness data can also be found on the following page in Table 21 and Figure 20.

### **2002 Perceived Harmfulness**

The 2002 survey results show that students perceive experimental marijuana use to be the least harmful of ATOD substances—only 21.1% of students believed that there was great risk in trying marijuana once or twice. However, students indicated that they believed using marijuana more regularly was more harmful—48.9% believed that there was “Great risk” in smoking marijuana regularly. Students perceived the greatest risk in smoking one or more packs of cigarettes per day. A majority of students (62.8%) believed that there was great risk in this use of cigarettes.

### **State and National Perceived Harmfulness Comparisons**

A comparison of the 2002 Arizona Youth Survey results to the National MTF survey results shows that students in Arizona believe that there is less risk in using ATODs than students nationwide. Arizona 8th graders perceived greater risk in smoking one or more packs of cigarettes per day and trying marijuana once or twice. National 10th and 12th grade rates were higher for all substance categories. The greatest difference is seen in the perceived harm of smoking marijuana regularly, with 13.7% more national 8th graders perceiving great risk (72.2% compared to 58.5%), 17.6% more 10th graders perceiving risk (62.8% compared to 45.2%), and 5.4% of 12th graders perceiving risk (57.4% compared to 52.0%). Rates of perceived risk of trying marijuana once or twice were comparable for the Arizona Youth Survey sample and the national MTF sample.

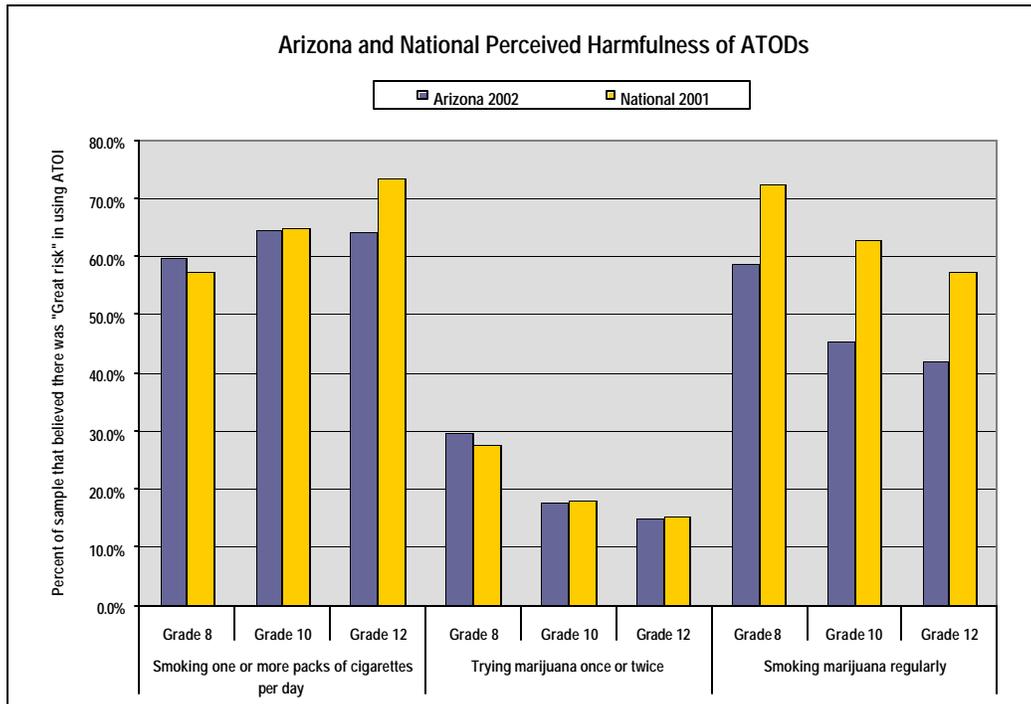
Table 21 and Figure 20 are located on the following page.

Table 21

Perceived Harmfulness of ATODs: Percent of students that believed there was "Great risk" in the following:

	Grade 8		Grade 10		Grade 12		Total
	Arizona 2002	National 2001	Arizona 2002	National 2001	Arizona 2002	National 2001	Arizona 2002
Smoking one or more packs of cigarettes per day	59.8%	57.1%	64.6%	64.7%	64.1%	73.3%	62.8%
Trying marijuana once or twice	29.7%	27.7%	17.8%	17.9%	15.0%	15.3%	21.1%
Smoking marijuana regularly	58.5%	72.2%	45.2%	62.8%	52.0%	57.4%	48.9%

Figure 20



*Students were asked a series of questions on how often they participated in antisocial behaviors.*

*The antisocial behavior with the highest rate of participation was being drunk or high at school (19.6%).*

*Rates of taking a handgun to school were the lowest (1.2%) of all student antisocial behaviors.*

## **Antisocial behavior**

The Arizona Youth Survey also asks students how often they participated in delinquent behavior in the past year. The results of these questions are summarized below. Antisocial behaviors most often participated in by students were being suspended from school and being drunk or high at school. Antisocial behavior rates peaked in the 8th grade for five out of the eight behaviors. More detailed information can be seen in Table 22 and Figure 21. For the 8th grade, the greatest antisocial behavior participated in was being suspended from school. The antisocial behavior participated in by the most 10th and 12th graders was being drunk or high at school.

### **Arrested**

Of all students surveyed, 8.5% (1,000) indicated that they had been arrested at least once in the past year. Rates peaked in the 8th grade at 9.1% .

### **Attacked Someone with the Intention of Seriously Hurting Them**

When students were asked this question, 10.6% (1,245) indicated that they had attacked someone with the intention of seriously hurting them at least once in the past year. Rates of student attack peaked in the 8th grade at 11.6% .

### **Carried a Handgun in Neighborhood**

Of all students surveyed, 5.6% (663) indicated that had carried a handgun in their neighborhood in the past year. Rates of carrying a handgun peaked in the 8th grade at 6.7%.

### **Went to School While Drunk or High**

Of all students surveyed, 19.6% (2,318) indicated that they had gone to school while drunk or high at least once in the past year. Rates of being drunk or high at school peaked in the 12th grade at 23.8%.

### **Had Taken a Handgun to School**

When students were asked this question, 1.2% (147) indicated that they had taken a handgun to school at least once in the past year. Rates of taking a handgun to school peaked in the 8th grade at 1.4% .

**Sold Illegal Drugs**

Of all students surveyed, 8.4% (998) indicated that they had sold illegal drugs in the past year. Rates of selling illegal drugs peaked in the 12th grade at 10.0%.

**Suspended from School**

Of all students surveyed, 12.9% (1,536) indicated that they had been suspended from school at least once in the past year. Rates peaked in the 8th grade at 18.1%. It should be noted that it is difficult to interpret school suspension rates, because school suspension rates vary substantially from district to district depending on district policies and practices.

**Stole a Vehicle**

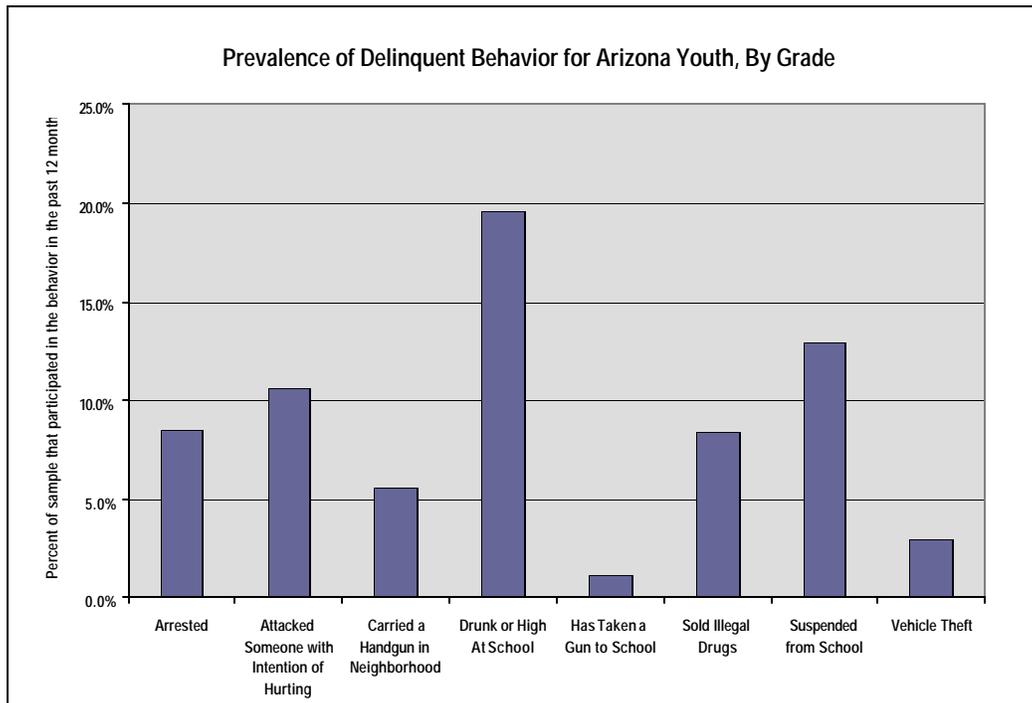
When students were asked this question, 3.0% (360) indicated that they had stolen a vehicle at least once in the past year. Rates of vehicle theft peaked in the 10th grade at 3.6%.

Table 22

The Prevalence of Delinquent Behavior, By Grade

	8th		10th		12th		Total	
	#	%	#	%	#	%	#	%
Suspended from School	765	18.1%	495	11.6%	276	8.1%	1536	12.9%
Drunk or High At School	646	15.4%	871	20.5%	801	23.8%	2318	19.6%
Sold Illegal Drugs	239	5.7%	423	9.9%	336	10.0%	998	8.4%
Vehicle Theft	137	3.3%	153	3.6%	70	2.1%	360	3.0%
Arrested	382	9.1%	341	8.0%	277	8.2%	1000	8.5%
Attacked Someone with Intention of Hurting	483	11.6%	457	10.8%	305	9.1%	1245	10.6%
Carried a Handgun in Neighborhood	283	6.7%	214	5.0%	166	4.9%	663	5.6%
Has Taken a Gun to School	59	1.4%	57	1.3%	31	1.0%	147	1.2%

Figure 21



*More Arizona males participate in all antisocial behaviors than females.*

*Male and female antisocial behavior rates in 2002 differ by as little as 1.8% and as much as 7.0% .*

*The antisocial behaviors most often participated in by males and females are being drunk or high at school, being suspended from school, and attacking someone.*

## ***Antisocial Behavior by Gender***

Just as males typically use ATODs at higher rates than females, so do males participate in antisocial behaviors more than females. The difference in male and female antisocial behavior use is much larger than the difference in male and female ATOD use. The differences are shown in Table 23 and Figure 22 on the following page.

### **Differences in Male and Female Rates of Antisocial Behavior**

Great differences can be seen in all categories of antisocial behavior. For example, in the 2002 survey, 11.4% of males indicated that they had been arrested at least once in the past year, compared to 5.5% of females (less than one-half the male arrest rate). While 9.1% of males indicated that they had carried a handgun in their neighborhood, only 2.1% of females indicated that they had done the same. While these rates are relatively low for both genders, it is important to note that males participate in this behavior over 4 times more than females. Male rates of antisocial behavior were 1.8% to 7.0% higher than female rates in all categories.

The results of the 2002 survey show that the behaviors that males most often participated in were being drunk or high at school (21.6%), being suspended from school (16.3%), and attacking someone with the intention of hurting them (13.9%). The behaviors that females most often participated in were also being drunk or high at school (17.9%), being suspended from school (9.3%), and attacking someone (7.3%).

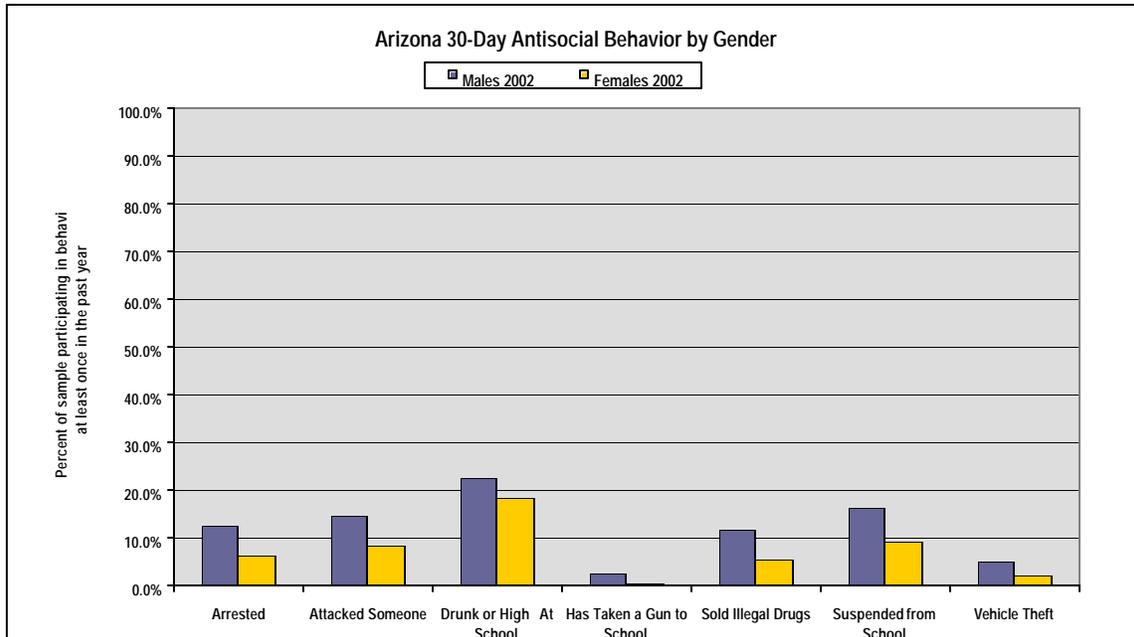
Table 23 and Figure 22 are located on the following page.

Table 23

Percentage of Male and Female Students who Have Participated in Antisocial Behavior at Least Once in the Past Year

	Males 2002	Females 2002
Arrested	11.4%	5.5%
Attacked Someone with Intention of Hurting	13.9%	7.3%
Carried a Handgun in Neighborhood	9.1%	2.1%
Drunk or High At School	21.6%	17.9%
Has Taken a Gun to School	2.1%	0.3%
Sold Illegal Drugs	12.0%	5.1%
Suspended from School	16.3%	9.3%
Vehicle Theft	4.1%	1.9%

Figure 22



## ***Safety and School Issues***

*Overall, a large majority of students feel safe at school, have never been in a fight at school, have never been injured or threatened at school, and have never taken a weapon to school.*

*The least serious issue seems to be with students not going to school because they feel unsafe.*

*One out of 10 8th graders indicated that they had been threatened by someone or injured with a weapon at school.*

*The safety issue with the highest rate is fighting on school property. Students in the 8th grade are most likely to be in a physical fight at school, with 21.48% indicating they had been in a fight at least once in the last year.*

The Arizona Youth Survey also asked students questions regarding their safety on school property. Students were asked to indicate the number of days in the past month that they carried a weapon to school and the number of days that they didn't go to school because they felt unsafe at school or on their way to school. Additionally, students were asked how many times in the past year they were threatened by someone or injured with a weapon on school property and how many times they had a physical fight at school. Results for these questions are found on the following page in Table 24 and Figure 23.

Overall, a large majority of students feel safe at school, have never been in a fight at school, have never been injured or threatened at school, and have never taken a weapon to school. However, just as with illicit drug use, even small percentages for these safety issues can be serious. For example, of the 8th graders sampled, 5.37% have taken a weapon to school at least once in the past month. Of the 10th grade sample, 5.8% of students have taken a weapon to school, and of the 12th grade sample, 6.76% of students have taken a weapon to school. While the other safety issues show a decrease with increased grade level, the rate of taking a weapon to school increases with increased grade level.

According to survey results, 5.34% of 8th graders, 2.29% of 10th graders, and 2.58% of 12th graders indicated they had skipped school because they felt unsafe.

More Arizona youth indicated that they had been threatened or injured by someone at school. One out of ten 8th graders indicated that they had been threatened by someone or injured with a weapon at school. This percentage decreases with increased grade level, with 9.0% of 10th graders and 5.58% of 12th graders reporting that it had happened to them.

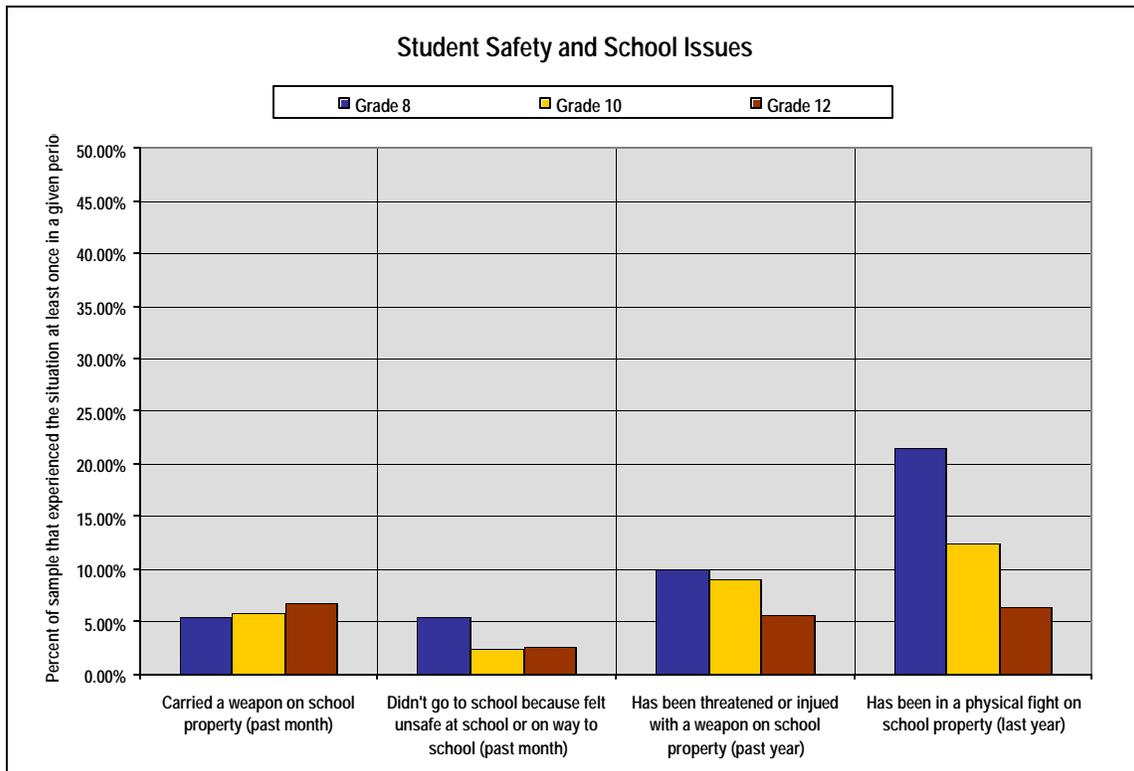
Finally, the safety issue with the highest rating is fighting on school property. Students in the 8th grade are the most likely to be in a physical fight at school, with 21.48% indicating they had been in a fight at least once in the last year. This rate decreases with increased grade level, with 12.37% of 10th graders and 6.46% of 12th graders indicating they had fought at school.

Table 24

Safety and School Issues

	Grade 8		Grade 10		Grade 12	
	0 Days	At least one day	0 Days	At least one day	0 Days	At least one day
During the past 30 days, on how many days did you carry a weapon such as a gun, knife, or club on school property?	94.63%	5.37%	94.20%	5.80%	93.24%	6.76%
During the past 30 days, on how many days did you not go to school because you felt you would be unsafe at school or on your way to or from school?	94.66%	5.34%	97.71%	2.29%	97.42%	2.58%
During the past 12 months, how many times has someone threatened or injured you with a weapon such as a gun, knife, or club on school property?	89.96%	10.04%	91.00%	9.00%	94.42%	5.58%
During the past 12 months, how many times were you in a physical fight on school property?	78.52%	21.48%	87.63%	12.37%	93.54%	6.46%

Figure 23



# Survey Results: Risk and Protective Factor Results

*Risk factors increase the likelihood that a student will engage in one or more problem behaviors.*

*Protective factors decrease the likelihood that a student will engage in problem behaviors.*

*Research indicates that students exposure to risk factors often leads to more substance use and delinquency.*

## ***About Risk and Protective Factors***

Research during the past 30 years supports the view that alcohol, tobacco, and other drug (ATOD) use; delinquency; school achievement; and other important outcomes in adolescence are associated with specific characteristics in the student's community, school, family environments, and individual characteristics. These characteristics are called *risk* or *protective* factors.

*Risk* factors are characteristics that are known to increase the likelihood that a student will engage in one or more problem behaviors. For example, one risk factor in the community environment is the existence of laws and norms favorable to drug use. In those communities where there is acceptance or tolerance of drug use, students are more likely to engage in ATOD use.

*Protective* factors are characteristics in the student's community, school, family, and individual environments that are known to decrease the likelihood that a student will engage in problem behaviors. For example, strong positive attachment or bonding to parents reduces the risk of an adolescent engaging in problem behaviors. The analysis of risk and protective factors is the most powerful paradigm available for understanding the genesis of both positive and negative adolescent behavioral outcomes and how the most successful adolescent prevention programs can be designed. (The risk and protective factors are described fully at the beginning of this report.)

There is a substantial amount of research showing that exposure of adolescents to a greater number of risk factors, irrespective of what the specific risk factors are, is associated with more substance use and delinquency. There is also evidence that exposure to a number of protective factors is associated with lower prevalence of these problem behaviors (Bry, McKeon, & Pandina, 1982; Newcomb, Maddahian, & Skager, 1987; Newcomb & Felix-Ortiz, 1992; Newcomb, 1995; Pallard, et. al, 1999; Pollard & Lofquist, 1999; Pollard, Hawkins & Arthur, 1999).

Many of the questions on the survey have been combined into risk and protective factor scales. This allows items that gather similar information to be summarized as a scale score. All of the scales were scored so that the higher the score the greater the risk for risk factors, and the greater the protection for protective factors. A student's risk or protective factor scale score is expressed as an average scale score. Because risk is associated with negative behav-

*The risk and protective factor method of prevention allows communities to measure levels of risk and protection among their youth, and then target prevention efforts to the specific needs of the community.*

*There are 18 risk factors and 10 protective factors measured through the Arizona survey, and the survey uses 24 risk factor scales and 9 protective factor scales to measure them.*

*Risk and Protective profiles have been sent to individual Arizona districts and schools to give communities a better idea of how to target prevention to their youth.*

ioral outcomes, it is better to have lower scores, not higher. Conversely, because protective factors are associated with better student outcomes, it is better to have protective factor scores with high values.

A benefit of using the risk and protective factor model in dealing with adolescent social problems is that it provides a method of measuring levels of risk and protection. Once the areas of highest risk and the areas of lowest protection are identified, they can be addressed by programs designed to reduce levels of risk and increase levels of protection. The decreases in risk and increases in protection will ultimately result in a reduction of the rate of youth problem behaviors. After the prevention programs have been implemented, the risk and protective factor levels can again be measured to determine the effectiveness of the intervention.

There are 18 risk factors and 10 protective factors measured through the Arizona survey, and the survey uses 24 risk factor scales and 9 protective factor scales to measure them. The questions on the survey are used to measure the 24 risk factor scales and nine protective factor scales. An item dictionary that lists the risk and protective factor scales and the questions they contain has been prepared and included in Appendix B for reference.

In order to make the results of the 2002 Survey more usable, risk and protective profiles have been developed that show the percentage of youth at each participating Arizona school district who are at risk and the percentage of youth with protection on each scale. The profiles that were sent to individual schools in March 2002 allow a comparison with the percentage of youth at risk for the entire state.

An advantage of having the data available from the risk and protective factor questions is that the ATOD use, antisocial behavior, and the percentage of youth at risk and with protection provide a baseline that can be used to compare the results from future surveys. A community can determine whether it is becoming more or less at risk in an area by comparing the survey results from one survey administration to the next. Through future student survey administrations; the state, schools, and communities that deliver prevention services can effectively evaluate their prevention efforts and determine if those efforts are having the desired effect of reducing risk and increasing protection in youth. These changes in risk and protection will, hopefully, result in the reduction of the level of youth problem behaviors in the community.

### ***How to Read the Risk and Protective Factor Charts***

In order to read the Risk and Protective Factor Charts (Figures 21-26), there are two features to keep in mind while scanning the chart: 1) **cut-points** help with distinguishing between students at-risk and those not-at-risk and 2) **dashed lines** showing comparisons to other state levels.

#### **Cut-Points**

Before the percentage of youth at risk on a given scale could be calculated, a scale value or cut-point needed to be determined that would separate the at-risk group from the not-at-risk group. The Prevention Needs Assessment (PNA) survey was designed to assess adolescent substance use, anti-social behavior and the risk and protective factors that predict these adolescent problem behaviors. The Arizona Youth Survey, and other surveys designed for other states and areas, follow the PNA format and have the same goal of gathering information on the prevention needs of students, schools, communities, and states. Since PNA surveys have been given to over 200,000 youth nationwide, it was possible to select two groups of youth, one that was more at risk for problem behaviors and another group that was less at-risk. A cut-point score was then determined for each risk and protective factor scale that best divided the youth from the two groups into their appropriate group, more at-risk or less at-risk. The criteria for selecting the more at-risk and the less at-risk groups included academic grades (the more at-risk group received “D” and “F” grades, the less at-risk group received “A” and “B” grades), ATOD use (the more at-risk group had more regular use, the less at-risk group had no drug use and use of alcohol or tobacco on only a few occasions), and antisocial behavior (the more at-risk group had two or more serious delinquent acts in the past year, the less at-risk group had no serious delinquent acts).

The cut-points that were determined by analyzing the results of the more at-risk and less at-risk groups will remain constant and will be used to produce the profiles for future surveys. Since the cut-points for each scale will remain fixed, the percentage of youth above the cut-point on a scale (at-risk) will provide a method for evaluating the progress of prevention programs over time. For example, if the percentage of youth at risk for family conflict in a community prior to implementing a community-wide family/parenting program was 60% and then decreased to 40% one year after the program was implemented, the program would be viewed as helping to reduce family conflict.

**Seven-State Norm Line**

Levels of risk and protection in the state are also compared to a more national sample. The dashed line on each risk and protective factor chart represents the percentage of youth at risk or with protection for the seven-state sample upon which the cut-points were developed. The seven states included in the norm group were Colorado, Illinois, Kansas, Maine, Oregon, Utah, and Washington. All the states have a mix of urban and rural students. For more information about risk and protective factors, please refer to the resources listed on the last page of this report under Contacts for Prevention.

## **Risk Factor Scores: Arizona 2002**

*Some of the lowest risk factor scores deal with Gang Involvement, Parental Attitudes Favorable to Drug Use, and Perceived Availability of Handguns*

*Some of the highest risk factor scores are in areas such as Perceived Availability of Drugs, Academic Failure, Peer Attitudes Favorable Towards Anti-social Behavior, and Interaction with Anti-social Peers.*

For a majority of the risk scales, Arizona youth had scores that were equal to or higher than the seven-state norm. This indicates that Arizona youth are at the same risk, or are at higher risk, than national youth. Again, risk factors are factors that have been shown to put students at risk for substance abuse and antisocial behaviors. Areas of high risk are more negative and prevention efforts should be focused on those areas. Areas of low risk are more positive and indicate which areas should be of less concern.

In this section of the report, the highest and lowest risk factor scale scores are discussed in an effort to identify which factors are of the most and least concern. Similar to the way that we read results for past month or lifetime substance use, the risk factor scores merely point out problem areas and the population of students (8th grade, 10th grade, etc.) having the most trouble in those areas. Also, in an effort to illustrate how Arizona risk compares to risk levels of students in seven other states, scores that are significantly higher or lower (by 10% or more) than the seven-state norm are discussed. When the Arizona rate is higher than the seven-state norm, it indicates that the risk scale is more of an issue for Arizona youth than for national youth. When the Arizona rate is lower than the seven-state norm, it indicates that Arizona youth are not as effected by that risk factor as youth in the seven-state sample. Both of these measures provide valuable information to gauge which factors need to be worked with the most in Arizona.

Table 25 and Figures 24-26, located on pages 71-72 illustrate levels of risk in each grade. *(Note: Again, read these results like substance use results are read. The risk factor scores merely point out problem areas and the population of students (8th grade, 10th grade, etc.) having the most trouble in those areas. The table and figures located on pages 71-72 provide a clearer depiction of the rates in relation to each other and in relation to the seven-state norm.)*

### **Low Risk Factor Scores: In Arizona and in Relation to the Seven-State Sample**

Factors with low risk indicate which areas that are not major problems for Arizona youth. Some of the lowest risk factor scores for Arizona, and in comparison to the seven-state norm, were found in the following categories:

- Gang Involvement—Scores ranged from 10.7% at risk in grade 12 to 21.7% at risk in grade 8 (approximately 20-30 percentage points lower than the seven-state norm).

- Parent Attitudes Favorable to Drug Use—Scores were 25.8% in grade 8 (approximately 17 percentage points lower than the seven-state norm).
- Perceived Availability of Handguns—Scores were 24.7% in grade 10 (approximately 17 percentage points lower than the seven-state norm)

These scores indicate, that in general, a minority of students are at risk in these areas, and that Arizona students have less risk in these areas than do students in seven other states. The survey results suggest that these are not significant problem areas that are putting Arizona students at risk for ATOD use and antisocial behavior. (Note: Survey results represent students in school.)

**High Risk Factor Scores:  
In Arizona and in Relation to the seven-state Sample**

Factors with high risk indicate which areas are major problems for Arizona youth. Some of the highest risk factor scores for Arizona, and in comparison to the seven-state norm, were found in the following categories:

- Perceived Availability of Drugs—Scores showed there was 60.1% at risk for grade 12 (approximately 18 percentage points higher than the seven-state norm).
- Peer Attitudes Favorable to Antisocial Behavior—Scores showed there was 54.5% at risk for grade 10 (approximately 12 percentage points higher than the seven-state norm).
- Academic Failure—Scores showed there was 52.3% at risk for grade 8 (approximately 10 percentage points higher than the seven-state norm).
- Interaction with Anti-social Peers—Scores showed there was 52.1% at risk for grade 8 (approximately 10 percentage points higher than the seven-state norm).

These scores indicate that these particular risk factors are effecting a significant number of Arizona students, putting them at risk for ATOD use and antisocial behaviors. Further, these rates are all over 10% higher than the seven-state norm, indicating that Arizona youth are more at risk in these areas than are students in seven other states. These results suggest that prevention planning should target these areas. It is also important to note that unlike ATOD use rates, which tend to increase with increased grade level, many of the risk factor rates do not increase as students get older. Often intervention efforts need to be targeted at students in middle school and lower high school grade levels. See the tables and figures on the following pages for more information.

*The survey indicates that the domains of family and school provide a considerable amount of protection.*

*Prevention planning should target these high risk factors.*

Table 25

2002 Arizona Risk Factor Scores	Grade 8	Grade 10	Grade 12
	2002	2002	2002
<b>Community Domain</b>			
Low Neighborhood Attachment	38.1	39.3	44.3
Community Disorganization	43.1	40.0	39.5
Transitions & Mobility	47.4	45.3	45.1
Laws & Norms Favor Drug Use	34.9	35.1	33.1
Perceived Availability of Drugs	39.9	50.5	60.1
Perceived Availability of Handguns	37.5	24.7	32.7
<b>Family Domain</b>			
Poor Family Management	43.1	41.5	46.2
Family Conflict	46.1	34.3	31.4
Fam History of Antisocial Behavior	40.5	37.7	35.5
Parent Attitudes Favorable to ASB	41.7	44.3	42.9
Parent Attitudes Favor Drug Use	25.8	44.0	45.2
<b>School Domain</b>			
Academic Failure	52.3	46.5	43.7
Low Commitment to School	41.2	45.4	44.6
<b>Peer-Individual Domain</b>			
Rebelliousness	40.0	40.9	38.6
Early Initiation of ASB	33.6	31.1	32.2
Early Initiation of Drug Use	40.3	39.0	40.6
Attitudes Favorable to ASB	46.3	54.5	53.3
Attitudes Favorable to Drug Use	37.4	47.2	46.4
Perceived Risk of Drug Use	47.9	45.3	47.6
Interaction with Antisocial Peers	52.1	48.2	47.8
Friend's Use of Drugs	41.9	44.8	41.3
Sensation Seeking	41.6	44.6	46.5
Rewards for ASB	38.0	34.6	40.1
Depressive Symptoms	48.2	43.8	39.7
Gang Involvement	21.7	13.6	10.7

Figure 24

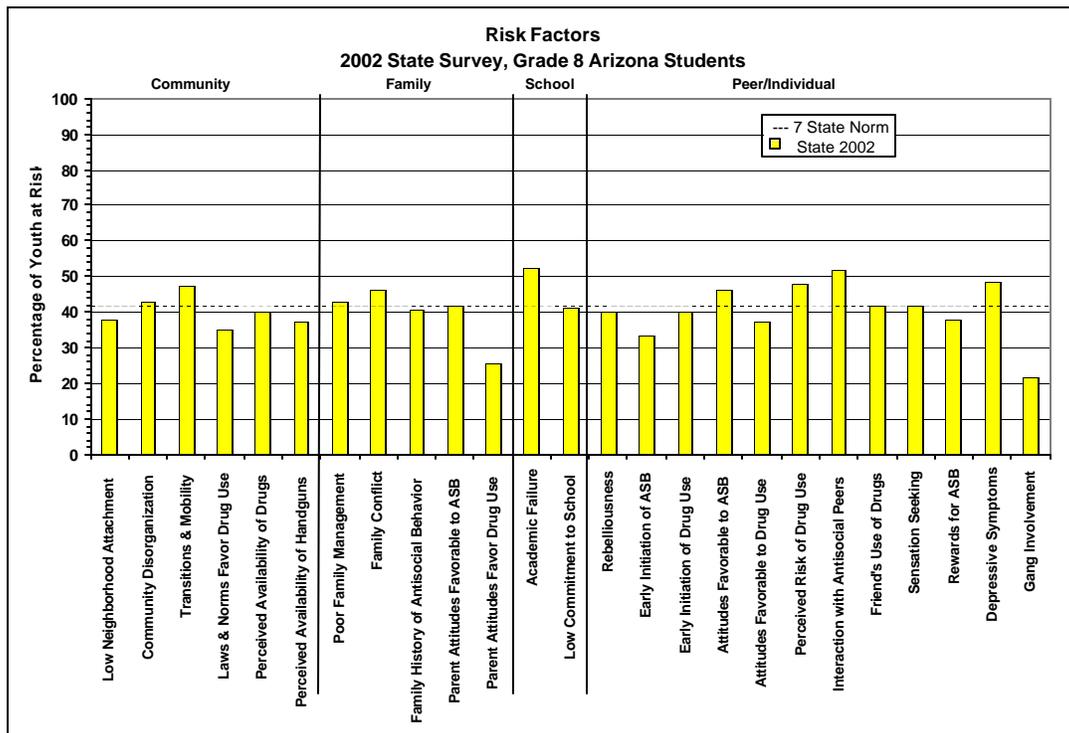


Figure 25

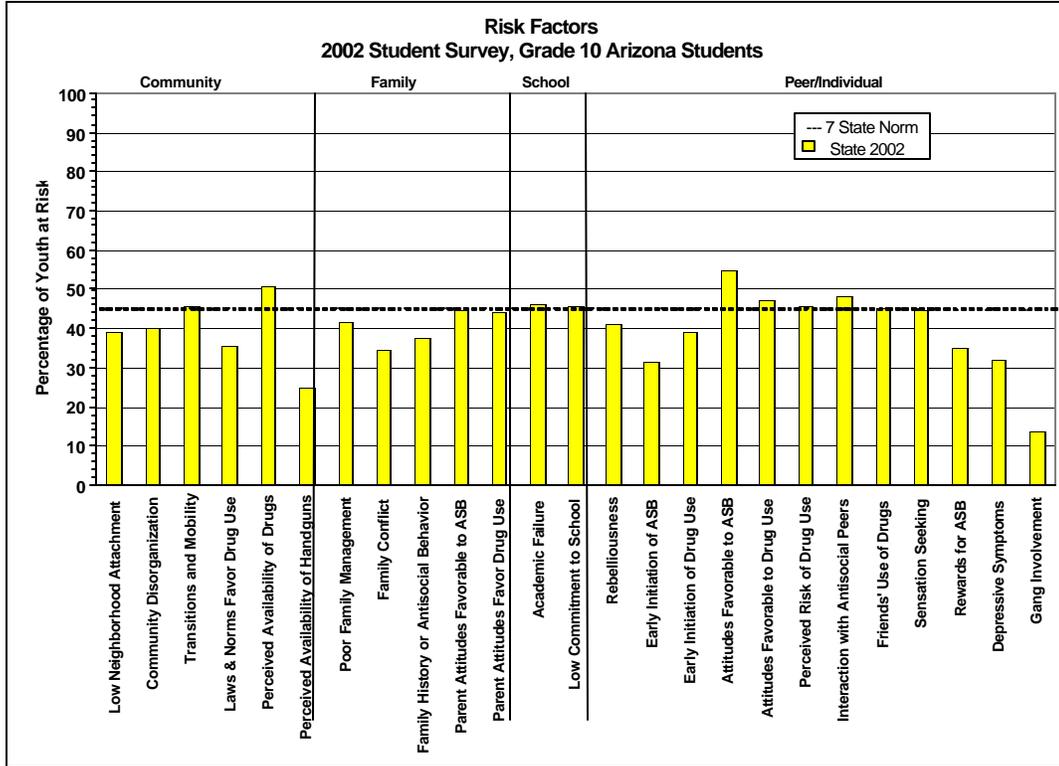
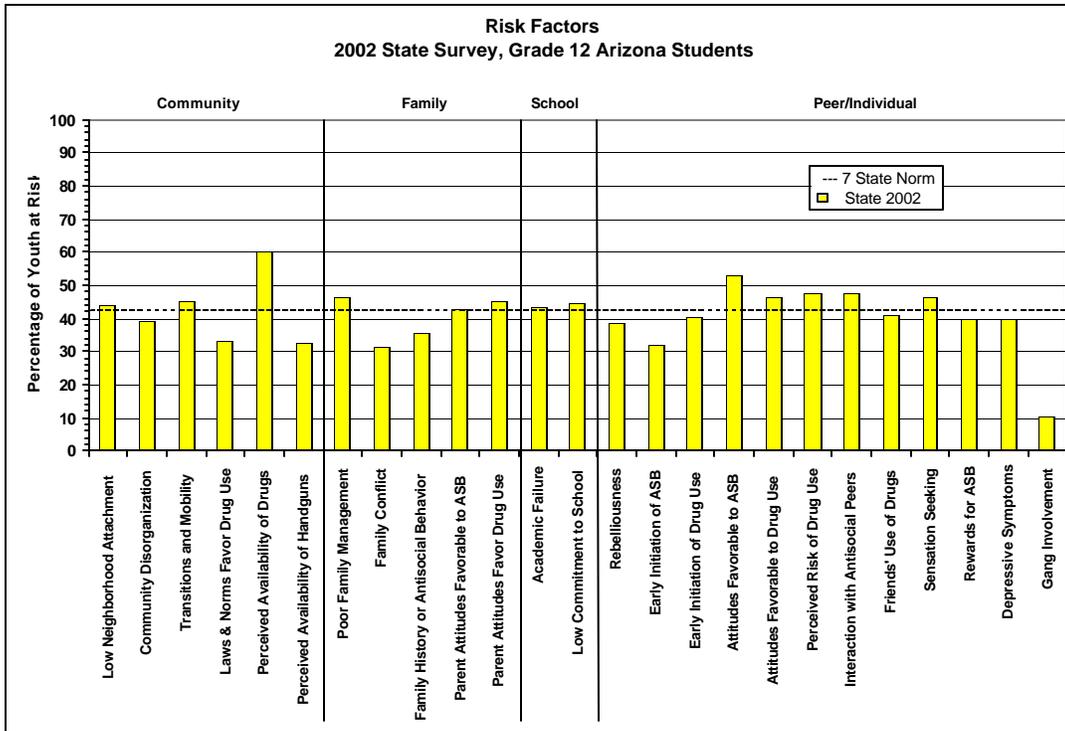


Figure 26



## **Protective Factor Scores: Arizona 2002**

*The survey indicates that the domains of family and school provide a considerable amount of protection.*

*The community domain does not encourage prosocial involvement as much as the family and school domains do.*

Overall, the protective factor scores for Arizona are equal to or less than the seven-state norm. This indicates that Arizona youth are at the same level of protection, or have lower protection, than youth in a seven-state sample. Also, in instances where the level of protection is higher in Arizona, no levels are over 10% higher than the norm. Arizona levels of protection are higher in the family and school domains. Again, protective factors are factors that have been shown to protect students and decrease their chances of abusing substances and participating in antisocial behaviors. Areas of low protection are more negative and prevention efforts should focus on those areas. Areas of high protection are more positive and indicate which areas should be of less concern.

In this section of the report, the highest and lowest protective factor scale scores are discussed in an effort to identify which factors should be of the most or least concern. Also, in an effort to illustrate how Arizona risk compares to risk levels of students in seven other states, scores that are significantly higher or lower (by 10% or more) than the seven-state norm are discussed. When the Arizona rate is higher than the seven-state norm, it indicates that the protective scale is less of an issue for Arizona youth than for national youth, and that Arizona youth have more protection in that area. When the Arizona rate is lower than the seven-state norm, it indicates that Arizona youth are not as protected in that area as are youth in the seven-state sample.

Table 26 and Figures 27-29, located on pages 75-76, illustrate more clearly the protective factor scores discussed here. *(Note: Again, read these results like substance use results are read. The protective factor scores merely point out positive areas, problem areas, and the population of students (8th grade, 10th grade, etc.) having the most trouble in those areas. The table and figures located on pages 75-76 provide a more clear depiction of the rates in relation to each other and in relation to the seven-state norm.)*

### **High Protective Factor Scores: In Arizona and in Relation to the seven-state Sample**

As for protective factor scores, some of the highest scores (indicating increased levels of protection) for Arizona, and in comparison to the seven-state norm, were found in the following factors:

- School Opportunities for Prosocial Involvement—Scores showed that 64.2% of 12th graders indicated protection (approximately 7 percentage points higher than the seven-

*High Protective scores were found in School Opportunities for Prosocial Involvement, Social Skills, Family Attachment, and Family Rewards for Prosocial Involvement.*

*Low Protective scores included Community Opportunities for Prosocial Involvement and Community Rewards for Prosocial Involvement.*

- state norm).
- Social Skills—Scores showed that 64.1% of 12th graders indicated protection (approximately 7 percentage points higher than the seven-state norm).
- Family Attachment—Scores showed that 61.5% of 12th graders indicated protection (approximately 4 percentage points higher than the seven-state norm).
- Family Rewards for Prosocial Involvement—Scores showed that 61.0% of 8th graders indicated protection (approximately 4 percentage points higher than the seven-state norm).

As most of the family domain scales for Arizona students in all grades are similar to (or greater than) the seven state norm, it is safe to suggest that Arizona students in general have a significant amount of interaction with their family, with encouragement to continue this interaction.

Also, we can see that the school domain provides protection for over half of Arizona students, and Arizona school domain rates are nearly all equal to, or greater than, the seven-state norm.

**Low Protective Factor Scores:  
In Arizona and in Relation to the seven-state Sample**

Some of the lowest protective factor scores (indicating smaller amounts of protection) were found in the following factors:

- Community Opportunities for Prosocial Involvement—Scores ranged from 43.6% protected in grade 10 to 40.7% protected in grade 8 (approximately 13-16 percentage point-slower than the seven-state norm)
- Community Rewards for Prosocial Involvement—Scores ranged from 42.3% in grade 10 to 31.9% in grade 8 (approximately 14-25 percentage points lower than the seven-state norm).

While these rates are not extremely low, they do indicate that the community domain does not encourage prosocial involvement as much as the family and school domains do. These rates also indicate areas where protection in Arizona is lower than protection on the seven-state norm level. These could be areas to target prevention, encouraging communities to reinforce and reward prosocial involvement more.

Table 26

2002 Arizona Protective Factor Scores	Grade 8	Grade 10	Grade 12
	2002	2002	2002
<b>Community Domain</b>			
Opportunities for Prosocial involvement	40.7	43.6	43.2
Rewards for Prosocial Involvement	31.9	42.3	37.4
<b>Family Domain</b>			
Fam Attachment	52.4	49.4	61.5
Opportunities for Prosocial Involvement	59.2	57.8	56.9
Rewards for Prosocial Involvement	61.0	56.5	57.7
<b>School Domain</b>			
Opportunities for Prosocial Involvement	56.2	58.6	64.2
Rewards for Prosocial Involvement	48.9	60.8	49.5
<b>Peer-Individual Domain</b>			
Social Skills	59.5	53.8	64.1
Belief in the Moral Order	50.0	58.9	45.4

Figure 27

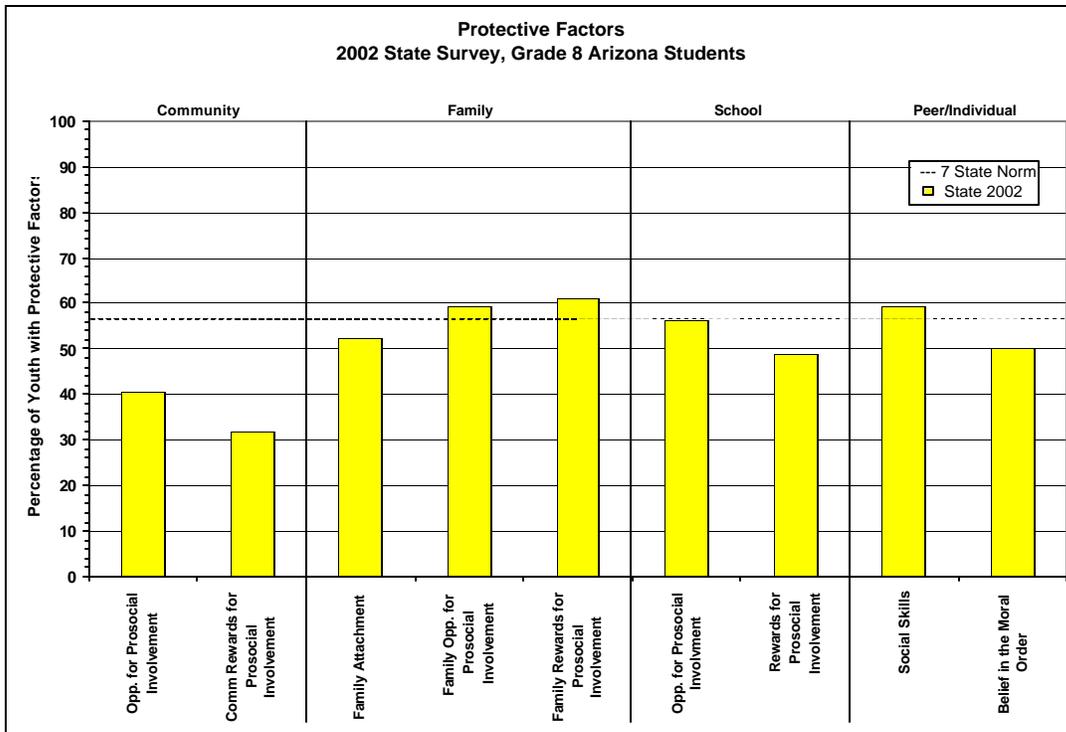


Figure 28

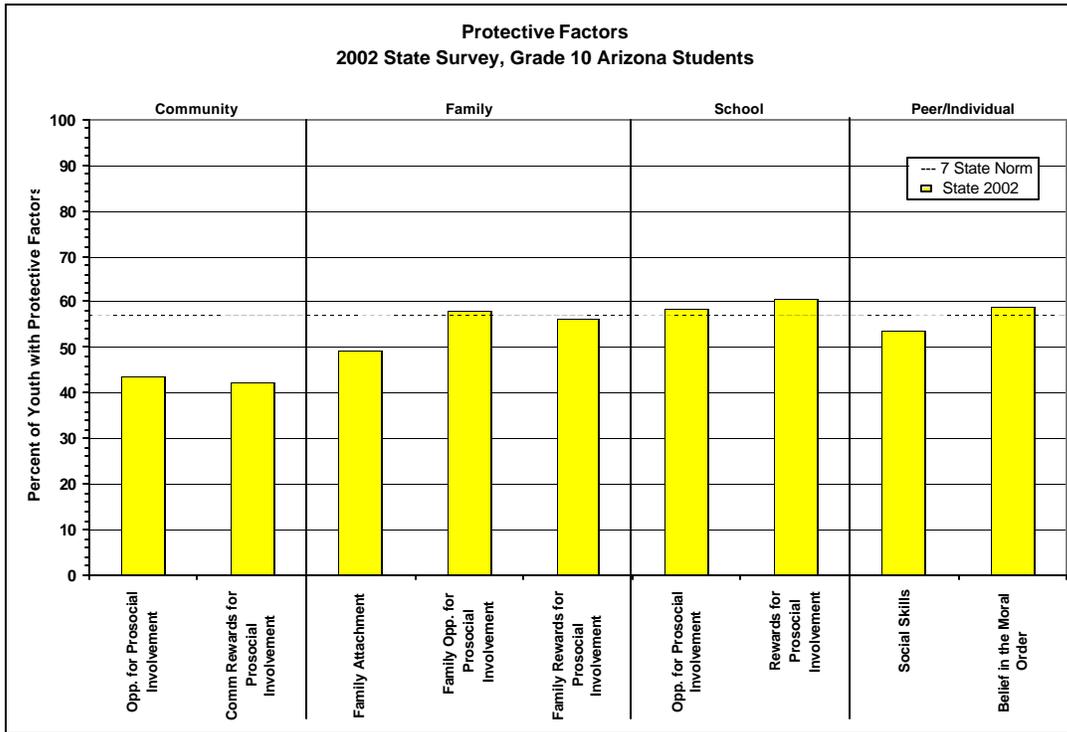
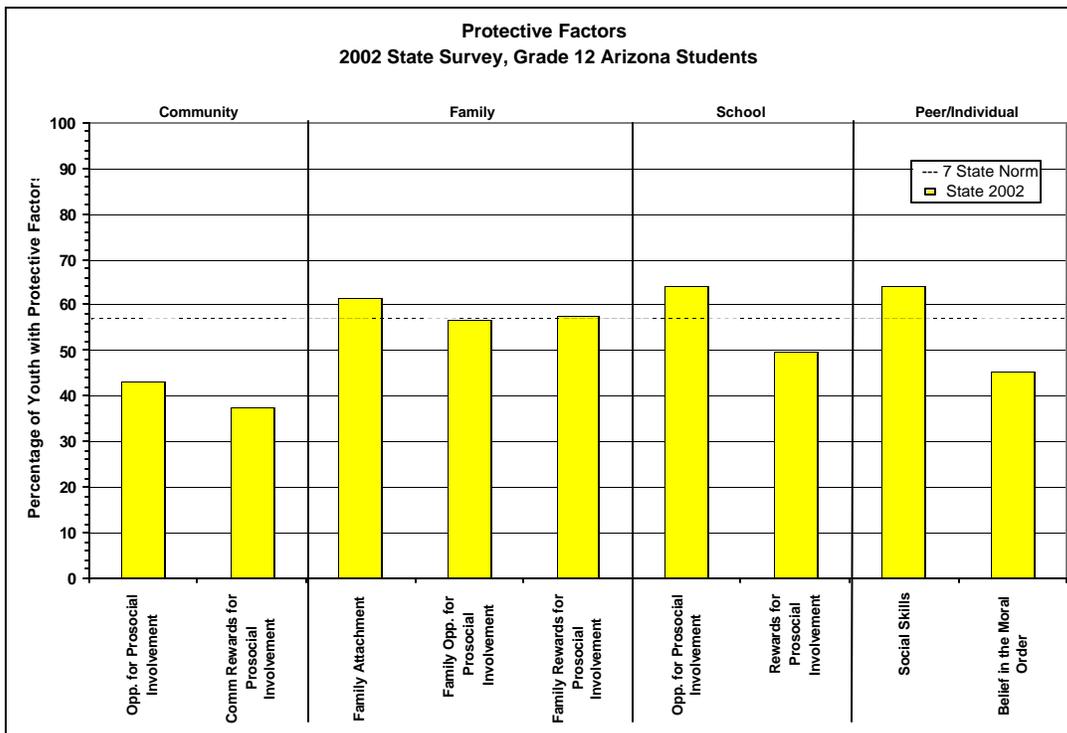


Figure 29



# 2002 Adult Substance Abuse Survey

Arizona Revised Statute §41-2416 mandates among other things that the Criminal Justice Commission shall report on the prevalence and frequency of adult substance use within the state of Arizona. The challenge of obtaining a representative sample of adult drug use behavior within the state is a substantial undertaking. Because of the logistics involved, Commission staff solicited the cooperation, input and involvement of Drug Treatment and Education Fund Coordinators throughout the state. Commission staff also incorporated research from the Arrestee Drug Abuse Monitoring Program (ADAM) study which is sponsored by the National Institute of Justice (NIJ) and is coordinated by staff from Arizona State University West. The ADAM study is composed of data from Maricopa and Pima counties which are the two largest counties in Arizona.

Data received from DTEF coordinators varied considerably. A review of the surveys suggests that there is a lack of uniformity in the collection and utilization of data pertaining to drug use. Information regarding treatment, prevention, intervention programs and strategies was limited by technology, resource constraints and data collection processes. The information collected can best be characterized as expert opinion as opposed to hard empirical data.

## ***Drug Treatment and Education Fund***

In November 1996, the people of Arizona passed the Drug Medicalization, Prevention and Control Act. This statute went into effect on December 6, 1996 as Arizona Revised Statutes (A.R.S.) § 13-901.01. The centerpiece of the Act is the diversion of certain drug offenders from prison. The Act requires a court to sentence first and second time offenders who are convicted of personal possession or use of a controlled substance to probation and drug treatment. The Act created a Drug Treatment and Education Fund (DTEF), which receives revenue from a liquor tax, to provide the education and treatment services required by the Act. The funds are administered by the Administrative Office of the Courts (AOC) and distributed to the 15 Superior Court probation departments to cover the costs of drug education and treatment programs, primarily for the prison ineligible probationer. Once this population is served, probation departments may use their remaining funds for the treatment of other probationers (discretionary probationers) who demonstrate a need for substance abuse treatment.

To gather information regarding adult substance use, all county coordinators involved in the Drug Treatment and Education Fund (DTEF) were contacted by the Arizona Criminal Justice Commission and asked to participate in a phone interview with Commission staff. The purpose of the interviews was to discuss probationer attitudes and behaviors about substance use in order to gauge adult use among the general adult population. These probation officers (DTEF Coordinators) were selected as an interview group because of their work with adult offenders relative to treatment. The highlights from those interviews are described in this section.

## ***Drug Treatment and Education Fund Coordinator Interviews***

Providing drug treatment with available funding to the probationers identified with substance abuse problems creates numerous challenges for the probation departments. Determining whether or not the probationer is eligible for treatment is the first step. Most of the counties determine whether or not an offender is eligible for substance abuse treatment in the pre-sentencing phase. The process is very similar throughout the State, most of the Counties have incorporated the Adult Substance Use Survey (ASUS). This is a standardized survey to determine whether or not the probationer is eligible for DTEF funds, which are used to assist in providing substance abuse treatment to the probationer. In 1996, the Administrative Office of the Supreme Court commissioned the use of the survey. A scoring system is used when assessing each probationer. DTEF coordinators indicated that the ASUS score is often factored together with one or more of the following to determine whether or not a probationer is eligible for treatment funds; an interview of the defendant; a review of police reports and court files, as well as a review of any available psychological and/or medical information if applicable.

Respondents were asked to describe the “typical attributes” that the substance abusers share in their communities. Responses suggested that it was very difficult to give an accurate profile of a “typical” drug-using offender. Common traits described which will have significant ramifications for resource deployment in Arizona included a White or Hispanic male, possessing limited education and sporadic or no employment. The typical user had a long history of drug abuse, starting out in their teens with alcohol and/or marijuana and progressing to other drugs and subsequent illegal behavior. They are often in an abusing family situation with the vast majority coming from dysfunctional families where individuals over 30 have a long criminal history for both drug violations and property crime. Once the user enters the criminal justice system, they tend to remain for a number of years.

The DTEF Coordinators were consistent in listing the four most abused substances (in no order) as, alcohol, marijuana, methamphetamine and cocaine. The coordinators further explained that the use of methamphetamines is particularly problematic due to the drug's low cost, high availability, and highly addictive traits. Also, methamphetamines often encouraged aggressive behavior and a significant amount of disruption in the lives of the probationer and his or her immediate and extended families. This aggressive behavior often creates a strain on limited community and governmental resources. Methamphetamine drug busts are dangerous for law enforcement and child protection groups. These groups are faced with utilizing limited resources to deal with the innocent victims of methamphetamine users.

DTEF coordinators reported the drug problems in their surrounding communities were either increasing or remained flat over the last two years. It is interesting to note that one of the two largest counties, Pima County, reported an increase in drug problems. They attributed the increase of reported drug use in Pima County to their proximity to the border; lack of employment opportunities; generational addiction and a local criminal justice system that will not tolerate illegal drug usage in their communities.

---

DTEF Coordinators were questioned about whether there had been an increase in the use of

“club drugs” such as ecstasy and an increase in prescription medications over the last two years. The DTEF coordinators indicated that they have found it very difficult to track the use of these specific substances. Anecdotally, several coordinators stated that often times, prescription drug abuse begins with the treatment of various health problems resulting in an addiction to subsequent treatment medications.

The most difficult and troublesome challenges facing DTEF Coordinators was reported to be an overall lack of adequate treatment services. In large part, the lack of adequate treatment services was directly attributed to inadequate funding. It was reported that, in some cases, the current funding would need to be doubled in order to cover the expenses associated with the costs of treating drug-abusing probationers. Approximately 30 percent of the coordinators indicated that inpatient funding is inadequate and therefore, often too expensive to be an option.

The information presented in the previous sections of this report has focused on qualitative data through the use of telephone interviews. Our objective was to provide a broad-spectrum look at what the fifteen counties are experiencing in regard to substance abuse among adult probationers. The following sections will focus on quantified data collected from arrestees in Arizona’s two largest counties, Maricopa and Pima, through the Arrestee Drug Abuse Monitoring Program.

### ***The Arrestee Drug Abuse Monitoring (ADAM) Program***

The Arrestee Drug Abuse Monitoring (ADAM) Program is a research program of the National Institute of Justice (NIJ) which provides program planning and policy information on drug use and other characteristics of arrestees in 35 U.S. cities through quarterly interviews of adult and juvenile arrestees in holding facilities. Arizona participates in this project at the holding facilities in the following sites:

- ◆ Madison Street Jail
- ◆ Mesa Police Department
- ◆ Glendale Police Department
- ◆ Pima County Jail

The Department of Administration of Justice at Arizona State University West has been responsible for managing ADAM data collection in Maricopa and Pima Counties. Maricopa County became an ADAM site in 1997, while Pima County was added in 1998. This portion of the report includes some excerpts from the recent publication *Drug Use, Treatment Needs, and Drug Markets in Arizona: Findings from the Arrestee Drug Abuse Monitoring Program 2000-2001*, disseminated in October, 2002. This report can be found in its entirety at [www.west.asu.edu/azadam/](http://www.west.asu.edu/azadam/)

To select a sample, ADAM staff randomly choose from newly booked arrestees during a specified two-week period of time. A trained interviewer asks the arrestee to participate in the study by presenting them with a consent form that explains the purpose of the study, the requirements of the study, and any risks or benefits related to the study. After a respondent agrees to participate, a questionnaire is administered and a urine specimen is collected for recent drug use testing.

Approximately 90 percent of arrestees approached typically agree to participate in the study, and 90 percent of the respondents agree to provide urine samples, yielding approximately 420 participants each quarter.

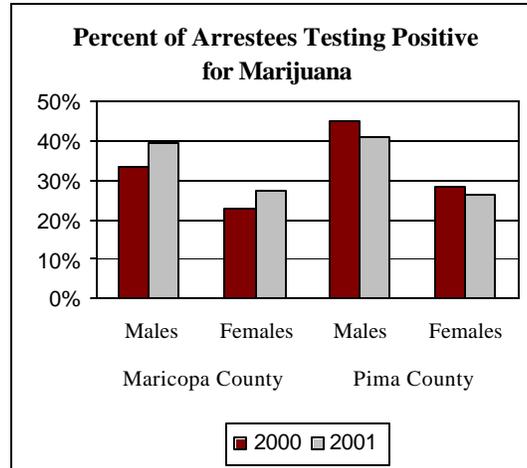
The ADAM data collected in Maricopa and Pima County provided information regarding arrestee demographics. It also corresponded well to the demographic information described by DTEF coordinators during the phone interviews conducted by Commission staff. After analyzing the demographic data obtained from the ADAM study in Maricopa and Pima counties, researchers at ASU West concluded that:

- ◆ Most arrestees in Maricopa County were White (43.8% of males and 45.9% of females), while nearly a third were Hispanic (34.6% of males and 26% of females).
- ◆ In Pima County, Hispanics comprised the majority of the arrestee population.
- ◆ One third of arrestees interviewed in Maricopa and Pima Counties had less than a high school degree. Another third of arrestees had a high-school degree or GED as their highest level of schooling.
- ◆ Only 4-5% of arrestees in either county had earned a 4-year college degree, though 20-28% of arrestees have earned some college credit or a 2-year degree.
- ◆ The unemployment rate among arrestees was high, with the rate for females around 12% higher than males.
- ◆ More arrestees were working in Maricopa County than in Pima County with a 5.4% difference for males and a 7.8% difference for females. (Rodriguez and Schaefer, 2002).

To illustrate a national comparison of drug use in Maricopa and Pima counties, a description of the data produced from the recent NIJ publication, *Preliminary Data on Drug Use and Related Matters Among Adult Male Arrestees: January-September, 2001* is provided. The NIJ publication only contains information on “adult males” while the most recent ADAM data in Arizona contains information on both male and female arrestees. Therefore, female comparisons are not available at this time.

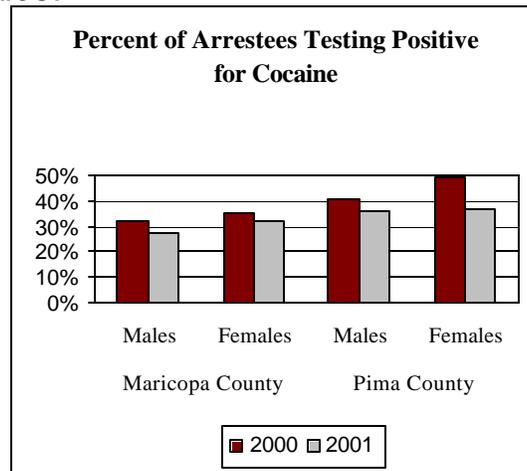
As illustrated, marijuana is the most commonly used drug among arrestees in both Maricopa and Pima Counties (excludes alcohol). In 2001, the marijuana usage in Maricopa County and Pima Counties among male arrestees was 39.4 percent and 41.4 percent respectively. Females reported a usage rate of 27.6 percent in Maricopa and 26.6 in Pima County. Of the 31 ADAM sites listed in NIJ’s most recent publication, the median for male arrestees testing positive for marijuana use was 41.6 percent for January thru September, 2001.

Figure 30



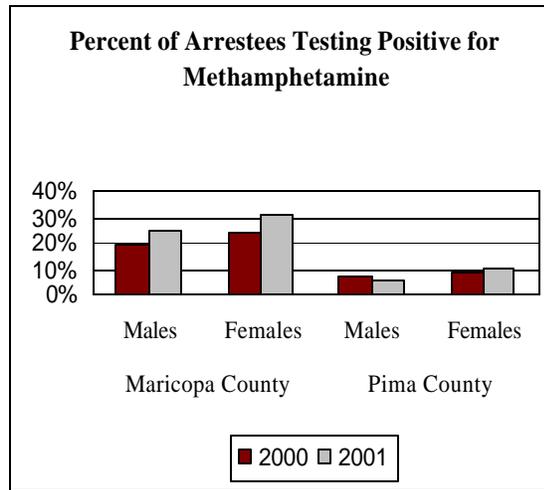
Cocaine was the second most frequently used drug in Maricopa and Pima Counties. (At this time the urinalysis testing is not designed to distinguish between rock and powder cocaine.) In 2001, the cocaine usage in Maricopa County and Pima County among male arrestees was 27.5 percent and 36.0 percent respectively. Females reported a usage rate of 31.9 percent in Maricopa and 36.7 in Pima County. Of the 31 ADAM sites listed in NIJ's most recent publication, the median for male arrestees testing positive for cocaine use was 30.4 percent for January thru September, 2001.

Figure 31



Methamphetamine usage in Maricopa County is on the rise for both male and female arrestees. In 2001, the methamphetamine usage in Maricopa County and Pima County among male arrestees was 25.0 percent and 5.3 percent respectively. Females reported a usage rate of 31.6 percent in Maricopa and 10.3 in Pima County. Of the 31 ADAM sites listed in NIJ's most recent publication, the median for male arrestees testing positive for methamphetamine use was 3.5 percent for January thru September, 2001. The trends in methamphetamine use in Maricopa County are very striking. Not only is the year over year increase significant, but the difference in reported use between Maricopa County and the other survey sites is dramatic; even more dramatic given that the NIJ's publication reports a 3.5 percent use rate including the 25 percent rate from Maricopa County.

Figure 32



The following tables outline the percent testing positive by gender for all offenses in Maricopa and Pima Counties. The table also illustrates the actual number of arrestees interviewed by ADAM staff.

Table 27

Maricopa County	Male		Female	
	2000	2001	2000	2001
<i>All Offenses</i>	(n=1,407)	(n=1,213)	(n=390)	(n=327)
Marijuana	33.7%	39.4%	23.1%	27.6%
Cocaine	31.9	27.5	35.0	31.9
Methamphetamines	19.1	25.0	24.1	31.6
Opiates	6.6	5.8	6.4	6.5
Any Drug	66.1	69.6	67.4	75.5

Table 28

Pima County	Male		Female	
	2000	2001	2000	2001
<i>All Offenses</i>	(n=546)	(n=453)	(n=122)	(n=128)
Marijuana	45.1	41.1	28.7	26.6
Cocaine	40.8	36.0	49.2	36.7
Methamphetamines	6.9	5.3	9.1	10.3
Opiates	8.8	7.0	17.2	9.4
Any Drug	71.7	64.9	75.4	61.7

Arizona ADAM is a valuable tool which can provide objective information to:

- ◆ Assess the dimensions of Arizona's particular substance abuse problems.
- ◆ Evaluate, in a low-cost manner, programs and interventions that serve to target criminally active population.
- ◆ Plan policy responses appropriate for those populations.

ADAM represents an important partnership with and among local, state, and national policymakers. NIJ designed ADAM to operate as a platform that allows policy-makers to customize aspects of the program to meet their specific needs. In October 2002, the administrative staff that oversees the ADAM project in Arizona invited local analysts, policymakers, and practitioners to form a Local Coordinating Councils (LCC's) "to promote a forum for feedback from the community and to incorporate community interests in future activities associated with the ADAM program" (Rodriguez and Schaefer, 2002). A facilitator and a "working group" has been established for both Maricopa and Pima County to devise the best strategy for promoting, identifying and imbedding the use of ADAM data for local and state agencies within Arizona. Additionally, the LCC's will promote the use of the data for other interested population such as those working in the field of prevention, research and planning and any other potential outreach population.

### ***SUMMARY AND CONCLUSIONS***

The challenge of obtaining information relative to the prevalence and frequency of substance abuse for adults in Arizona is formidable. Due to limited resources and the lack of data through the adult management information system, an in depth review of adult drug usage within the general population is currently not possible and may not be practical in the future. Rather, the Statistical Analysis Center has focused efforts on reviewing patterns of adult substance abuse within the criminal justice system as a means of assessment. Prior research conducted by the Statistical Analysis Center has employed feedback from DTEF coordinators and probation departments throughout the state as the exclusive measure for this report.

This method was replicated for this report with data being collected by Commission staff via telephonic interviews and surveys with each county adult probation department. This information was combined with DTEF summarized data received from the Administrative Office of the Courts and ADAM data from Maricopa and Pima counties in order to provide a better perspective regarding adult substance in Arizona.

Major findings and conclusions from a review of the information provided include:

- ◆ Marijuana is the most commonly used substance and cocaine use is second.
- ◆ Methamphetamines are particularly troublesome because of the high incidence of aggressive behavior associated with its use.

- ◆ The use of methamphetamines in adult arrestee's is significantly greater in Maricopa than in Pima County.
- ◆ The aggressive behavior associated with methamphetamines creates a strain on criminal justice and community resources.
- ◆ Responses suggested a need to better track social indicators which influence adult drug usage.
- ◆ The collection and utilization of meaningful data is limited by a lack of adequate information systems capable of capturing and tracking adult drug use data.
- ◆ The lack of adequate treatment services is the most difficult and troublesome challenge facing stakeholders.
- ◆ The lack of treatment services is directly related to inadequate funding.
- ◆ The description of a "typical" adult drug user was very similar when comparing the ADAM study data and the survey information from DTEF coordinators.

DTEF Coordinators noted that drug use appears to be increasing in a majority of the rural counties and in Pima, the second largest county in the state. This suggests that drug usage by adults at a statewide level continues to increase.

In subsequent years, Commission staff anticipates the use of data from additional sources in order to gain a broader picture of adult drug usage in Arizona. Potential enhancements to the report could include surveys and interviews being conducted through substance abuse treatment centers in Arizona and the analysis of the Adult Substance Abuse Survey data collected through the Administrative Office of the Courts.

# Findings

The Arizona Youth Survey, conducted in January and February 2002, gathered a plethora of information that can be used by the Arizona Criminal Justice Commission and the State of Arizona. Due to time and resource constraints, the data presented in this report merely skim the surface of the data gathered by the survey; however, the results will be highly beneficial in helping Arizona to identify needs of Arizona youth and to plan prevention and delinquency programs that fit the needs of Arizona youth. Overall, the results show that Arizona student use of Alcohol, Tobacco and Other Drugs (ATODs) is at levels that are similar to, or higher than, current national trends; that rates of delinquency and antisocial behavior are low, but significant; and that Arizona youth have higher levels of risk and lower levels of protection than students on a national level. The following is a summary of findings:

## ***Total Student Use of ATODs***

Survey participants in the 8th, 10th, and 12th grades indicated highest past-month and lifetime use of alcohol, tobacco products, and marijuana. A majority of students (69.2% in 2002) have used alcohol in their lifetime, 49.3% of students have used cigarettes in their lifetime, and 38.8% have used marijuana. As for past month use, nearly half (46.4%) of students have used alcohol in the past month. More Arizona students have used marijuana in the past month than have used cigarettes—20.5% have used marijuana compared to the 16.5% who have used cigarettes.

## ***Age of Initiation***

Age of Initiation is the average age of the first use of alcohol, tobacco, and other drugs. Students use cigarettes at a younger age (12.38 years) than they use alcohol or marijuana. Arizona students reported having their first drink of alcohol more than a year before they began drinking alcoholic beverages regularly. The age of first drink was 13.05 years, and the age of first regular drink was 14.41 years. As of this writing there is not a study available for national comparisons.

## ***ATOD Use by Gender***

For most substances, Arizona males use ATOD substances more than females. However, females do have higher use rates of some ATODs. Whether or not males or females had higher rates, for most substances, the differences in use were small. For example, in 2002, 44.5% of males used alcohol in the past 30-days compared to 48.4% of females. The greatest difference in usage can be seen in lifetime smokeless tobacco and cigarette use rates. For lifetime use, 13.9% of males indicated they had used smokeless tobacco, while 4.7% of females indicated use. For lifetime cigarette use, females use at a higher rate (49.7% for females compared to 41.8% of males).

## ***30-Day and Lifetime Alcohol Use***

Alcohol still is the most commonly used substance by Arizona students. In the past month 46.4% of students have used alcohol, and 69.2% of students have used alcohol in their lifetime. Of the students included in the Arizona Youth Survey sample, 23.7% indicated they had binge drank in the past two weeks. Use of alcohol increases with increased grade level; while 58.9% of 12th graders indicated 30-day alcohol usage in 2002, only 34.4% of 8th graders indicated usage. The Arizona

Youth Survey results, when compared to the national Monitoring the Future (MTF) results continue to show that Arizona students, in the past 30 days, have used more alcohol than students in the national sample. However, in looking at the lifetime results, Arizona rates and national rates are more comparable.

### ***30-Day and Lifetime Smokeless Tobacco Use***

In the past month, 4.8% of Arizona students have used smokeless tobacco, and 24.4% of students have used smokeless tobacco in their lifetime. Comparisons between the 2002 Arizona Youth Survey and the 2002 national MTF survey show differences in use, with students in the national sample using smokeless tobacco at higher rates of 30-day use, and lower rates of lifetime use, than students in the Arizona sample. The difference in national and Arizona rates indicate that more Arizona students experiment with smokeless tobacco, but more national students use smokeless tobacco on a regular basis.

### ***30-Day and Lifetime Cigarette Use***

Cigarette use increases with increased grade level. In the past month, 16.5% of Arizona students have used cigarettes, and 49.3% have used cigarettes at least once in their lifetime. For most grades, Arizona youth indicated lower 30-day and lifetime use rates of cigarettes than youth in the national MTF survey.

### ***30-Day and Lifetime Marijuana Use***

In the past 30 days, 20.5% of 8th, 10th, and 12th graders have used marijuana at least one time. While cigarette use is usually higher than marijuana use, results from the survey indicate that more Arizona youth have used marijuana in the past month than have used cigarettes (20.5% compared to 16.5%). In each grade, Arizona 30-day and lifetime use rates of marijuana were higher than national MTF use rates.

### ***30-Day and Lifetime Inhalant Use***

While use of other drugs tends to increase with increased grade level, a common pattern for inhalant use is to peak in middle school and decline significantly after the 8th grade. This trend can be seen in Arizona results as well. In 2002, 2.0% of 12th grades used inhalants in the past month and 6.5% of 8th graders. The difference in inhalant use trends may be related to the fact that younger students have more access to inhalants than they do other drugs. While 30-day inhalant use in Arizona is higher than national levels, Arizona lifetime use is lower than national levels. This indicates a higher rate of inhalant experimentation on the national level.

### ***30-Day and Lifetime Use of Other Illicit Drugs***

An overwhelming majority of students never try illicit drugs such as hallucinogens, methamphetamines, cocaine, steroids, heroin, barbiturates, and ecstasy. An even lower percentage of students regularly use these illicit drugs. Total past month use was 2.6% for hallucinogens, 3.3% for cocaine, 2.0% for methamphetamines, 1.2% for steroids, 1.3% for heroin, 2.3% for barbiturates, and 3.1% for ecstasy. Lifetime use of each illicit drug was less similar when looked at by grade. Of the

seven illicit drugs discussed in this section, Arizona 8th graders have experimented with ecstasy more than the other seven drugs—5.5% of 8th graders have tried ecstasy at least once. For 10th graders, 8.2% have tried ecstasy at least once in their lifetime. Further, lifetime use of ecstasy is above the national average for all grades and more than double in the 30 day use of 8<sup>th</sup> grade students. Hallucinogens were the drug most often experimented with by 12th graders—12.6% have tried hallucinogens at least once in their lifetime. Past month rates for hallucinogens, methamphetamines, cocaine, steroids, heroin, barbiturates, and ecstasy tended to be slightly higher for Arizona youth than for youth in the national sample. For lifetime use of the seven substances, national rates tended to be more similar to rates for Arizona youth.

### ***Perceived Availability of ATODs and Handguns***

In the domain of “community”, perceived availability is a measurement of how easy students believe it is to get ATODs and handguns. According to survey participants, cigarettes are perceived to be the easiest substance to get—65.4% of students indicated that it was “Sort of easy” or “Very easy” to get cigarettes. The survey also found that 64.1% of students indicated that alcohol (beer, wine, or hard liquor) was easy to get, and 64.0% indicated that marijuana was easy to get. The substance perceived as being least available was cocaine and other drugs—only 32.8% of students’ perceived these drugs to be “Sort of easy” or “Very easy” to get. Also, 25.8% indicated that handguns were easy to get. A comparison of the 2002 Arizona Youth Survey results to the national MTF survey results shows that students in Arizona believe that alcohol, tobacco, and other drugs are more difficult to get than students nationwide.

### ***Perceived Harmfulness of Cigarette and Marijuana Use***

Perceived Harmfulness measures the percentage of students who believed there was “Great risk” in using ATOD substances occasionally or often. The 2002 survey results show that students perceive experimental marijuana use to be the least harmful of ATOD substances—only 21.1% of students believed that there was great risk in trying marijuana once or twice. However, students indicated that they believed using marijuana more regularly was more harmful—48.9% believed that there was “Great risk” in smoking marijuana regularly. Students perceived the greatest risk in smoking one or more packs of cigarettes per day. The greatest perceived risk for Arizona students was in smoking one or more packs of cigarettes per day. A majority of students (62.8%) believed that there was “Great risk” in this use of cigarettes. A comparison of the 2002 Arizona Youth Survey results to the national MTF survey results shows that students in Arizona believe that there is less risk in using ATODs than students nationwide.

### ***Antisocial Behavior Frequency***

The Arizona Youth Survey also asks students how often they participated in delinquent behavior in the past year. Antisocial behaviors most often participated in by students were being suspended from school and being drunk or high at school. Antisocial behavior rates peaked in the 8th grade for five out of the eight behaviors. For the 8th grade, the greatest antisocial behavior participated in was being suspended from school. The antisocial behavior participated in by the most 10th and 12th graders was being drunk or high at school. The antisocial behavior with the highest rate of participation by all Arizona students was being drunk or high at school (19.6%). Rates of taking a handgun to school were the lowest (1.2%) of all student antisocial behaviors.

### ***Antisocial Behavior Frequency by Gender***

More Arizona males participate in all antisocial behaviors than females. Male and female antisocial behavior rates in 2002 differ by as little as 1.8% and as much as 7.0%. The antisocial behaviors most often participated in by males and females are being drunk or high at school, being suspended from school, and attacking someone. Great differences can be seen in all categories of antisocial behavior. For example, in the 2002 survey, 11.4% of males indicated that they had been arrested at least once in the past year, compared to 5.5% of females (one-half the male arrest rate). While 9.1% of males indicated that they had carried a handgun in their neighborhood, only 2.1% of females indicated that they had done the same. While these rates are relatively low for both genders, it is important to note that males participate in this behavior over 4 times more than females.

### ***Safety and School Issues***

Overall, a large majority of students feel safe at school, have never been in a fight at school, have never been injured or threatened at school, and have never taken a weapon to school. However, just as with illicit drug use, even small percentages for these safety issues can be serious. For example, of the 8th graders sampled, 5.37% have taken a weapon to school at least once in the past month. The least serious issue seems to be with students not going to school because they feel unsafe. Significantly more Arizona youth indicated that they had been threatened or injured by someone at school. One out of ten 8th graders indicated that they had been threatened by someone or injured with a weapon at school. Finally, the safety issue with the highest rate is fighting on school property. Students in the 8th grade are most likely to be in a physical fight at school, with 21.48% indicating they had been in a fight at least once in the last year.

Based upon the aforementioned findings, the following conclusions and recommendations are presented for future prevention strategies:

1. Students in Arizona believe that there is less risk in using ATOD than students nationally. This suggests that prevention efforts should emphasize the risks of drug usage when creating new or revising current prevention programs.
2. More Arizona youth used marijuana than cigarettes over the most recent 30 day survey period. Of the population of students using marijuana vs. students regularly using alcohol, students begin using marijuana at a younger age. Prevention programs should pay particular attention to the risks of marijuana usage when focusing on the risks involved in drug usage.
3. Students with a reported grade average of “D” are approximately 15 times more likely to have indicated use of alcohol in the past 30 days than “A” students. This finding suggests that planners, when planning for prevention programs, would benefit from placing an emphasis on students who are having trouble with academics. Academic failure is highly predictive for engagement in high-risk behaviors including drug usage.
4. Arizona youth indicated lower use rates of cigarettes than youth in the national MTF survey. The greatest increase in 30-day use occurs from middle school (8<sup>th</sup> grade) to high school (10<sup>th</sup> grade). These findings suggest that prevention efforts need to be focused on the younger student population.

5. Of the seven illicit drugs, ecstasy is one of the most experimented with by 8<sup>th</sup> and 10<sup>th</sup> graders. Additionally, 30 day use by 8<sup>th</sup> graders is twice the national average. This suggests the need to monitor the use of ecstasy by Arizona's youth in order to develop appropriate education, prevention and intervention opportunities.

The two lowest protective factor scores were Community Opportunities and Rewards for Prosocial Involvement. These scores indicate that the community does not encourage prosocial involvement as much as the family and school domains do. Further, these scores also indicate areas where protection in Arizona is lower than protection on the seven-state norm level. These could be areas to target for prevention efforts/programs and to encourage communities toward more reinforcement and rewards for prosocial involvement.

In general, the results from the Arizona Youth Survey show that Arizona student use of ATOD's is at levels that are similar to, or higher than, current national trends; that rates of delinquency and antisocial behavior are low and that Arizona youth have higher levels of risk and lower levels of protection than students on a national level.

## Summary

As indicated previously, this report does not attempt to present or interpret all of the data collected through the administration of the 2002 Arizona Youth Survey. Rather, this report is seen as a major step in the dissemination of risk and protective factor information in Arizona. Using risk and protective data as a focal point for drug prevention programs has proven effective in reducing drug use in communities. For this reason, it is essential to get risk and protective data into the hands of community members, school officials and policy makers. Given the limited resources available in current budgets, it is believed that this information will prove vital for the distribution and direction of future prevention and intervention strategies.

The ability to understand accurately the underlying factors — behaviors, attitudes, conditions or events — that increase and decrease the risk for criminal activities, provides a basis on which to bring about positive change. Risk factors are powerful tools for identifying and locating populations and individuals with a high potential for becoming violent, and they provide valuable targets for programs aimed at preventing or reducing violence.

During the upcoming year, the Arizona Criminal Justice Commission will continue to place an emphasis on strengthening and building partnerships for the purpose of effectively sharing and using the data collected through the Arizona Youth Survey. Although this report provides a statewide perspective, additional reports have been made available at both the county and school levels. It is anticipated that the Statistical Analysis Center staff, in collaboration with the state agencies discussed in this report, will coordinate presentations throughout different regions of the state. The primary goal will be to assist the decision makers in the interpretation of data specific to their region for the development of prevention and intervention strategies. The presentations will also make available evidence-based programs that have proven successful in addressing specific risk and/or protective factors.

The real value in the collection of risk and protective factor data is the potential for improving prevention and intervention strategies at a local level. An example of how this data could be used for the development of prevention and intervention strategies is currently being piloted in Maricopa County. The Regional Crime Prevention Strategy (RCPS) is a collaborative effort between the Maricopa County Juvenile Probation, the Arizona Criminal Justice Commission (ACJC), the Arizona Department of Health Services (ADHS), and the Arizona Prevention Resource Center (APRC) seeking to analyze the Arizona Youth Survey data in context with juvenile arrest data, social indicator data, demographic data and Program Inventory data. In the future, additional data layers may be added to this information to further enhance the strategic and community analysis of juvenile crime. The significance of the Regional Crime Prevention Strategy is that it is an initial effort toward the sharing and analysis of fundamental information needed to develop effective crime prevention alternatives. It is also hoped that the Regional Crime Prevention Strategy will serve as both a national and local model for other counties and jurisdictions.

The modification, expansion and implementation of the 2002 Arizona Youth Survey are a major accomplishment. Strategies are being developed to expand the use of the survey and to institutionalize the model at all levels of decision making in Arizona. Including both voluntary and selected sample schools, over 100 schools and 20,000 students participated in the 2002 Arizona Youth Survey. It is the goal of the 2004 Arizona Youth Survey to increase participation to over 200 schools and 40,000 students.

It is important to note that the Arizona Youth Survey fills a critical role within a statewide drug and gang strategy in providing information on the well-being of youth, families and communities. There is consensus on the need to collect and provide data and provide services in a collaborative manner. There is agreement by the Arizona Drug and Gang Council and Working Group (representing twelve state agencies) and the Arizona Juvenile Justice Commission that the Arizona Youth Survey, Social Indicators and Program Inventory should be instruments adopted by the state on an on-going basis to collect relevant data on youth, families, communities, and programs.

It is hoped that the successful administration of the Arizona Youth Survey will serve as a catalyst for continued efforts toward data driven decision-making and the use of evidence-based programming. State agencies are encouraged to continue efforts toward the development and sharing of critical information to local decision makers. Through the availability of this fundamental data, local decision makers can direct scarce funding toward needed prevention programming to serve the youth and families in their community.

## APPENDIX A

Sample copy of the  
ARIZONA STUDENT SURVEY  
PREPARED BY  
Southwest Prevention Center (FY 02)



1. How old are you?

- 10     11     12     13     14  
 15     16     17     18     19 or older

2. What grade are you in?

- 8th     10th     12th

3. Are you:

- Female     Male

4. What do you consider yourself to be?

(Choose one best answer)

- White, not of Hispanic Origin  
 B  
 American Indian/Native  
 S  
 Mexican American    Chicano  
 Mexican    Puerto Rican  
 Cuban    Central American  
 Other Spanish    South American  
 Asian or Pacific Islander  
 Chinese    Japanese  
 Filipino    Asian Indian  
 Hawaiian    Samoan  
 Korean    Guamanian  
 Vietnamese    Cambodian  
 Other Asian or Pacific Islander  
 Other (Please Specify \_\_\_\_\_)

5. Think of where you live most of the time. Which of the following people live there with you?

(Choose all that apply)

- Mother     Father     Other adults  
 Foster mother     Foster father     Sister(s)  
 Stepmother     Stepfather     Stepsister(s)  
 Grandmother     Grandfather     Brother(s)  
 Aunt     Uncle     Stepbrother(s)  
 Other children

6. How many brothers and sisters, including stepbrothers and stepsisters, do you have that are older than you?

- 0     1     2     3     4     5     6 or more

7. How many brothers and sisters, including stepbrothers and stepsisters, do you have that are younger than you?

- 0     1     2     3     4     5     6 or more

8. What is the language you use most often at home?

- English     Spanish     Another Language

9. What is the highest level of schooling your father completed?

- Completed grade school or less     Some school  
 Some high school     Completed college  
 Completed high school     Graduate or professional school after college  
 Do not know     Does not apply

10. What is the highest level of schooling your mother completed?

- Completed grade school or less     Some school  
 Some high school     Completed college  
 Completed high school     Graduate or professional school after college  
 Do not know     Does not apply

11. Putting them all together, what were your grades like last year?

- Mostly  F's    Mostly  D's    Mostly  C's    Mostly  B's    Mostly  A's

12. During the LAST FOUR WEEKS how many whole days of school have you missed?

- a. because of illness?**  
 None     2 days     4-5 days     11 or more days  
 1 day     3 days     6-10 days
- b. because you skipped or "cut"?**  
 None     2 days     4-5 days     11 or more days  
 1 day     3 days     6-10 days
- c. for other reasons?**  
 None     2 days     4-5 days     11 or more days  
 1 day     3 days     6-10 days

13. During the past 30 days, on how many days did you carry a weapon such as a gun, knife, or club on school property?

- 0 days     2-3 days     6 or more days  
 1 day     4-5 days

14. During the past 30 days, on how many days did you not go to school because you felt you would be unsafe at school or on your way to or from school?

- 0 days     2-3 days     6 or more days  
 1 day     4-5 days

15. During the past 12 months, how many times has someone threatened or injured you with a weapon such as a gun, knife, or club on school property?

- 0 times     2-3 times     6-7 times     10-11 times  
 1 time     4-5 times     8-9 times     12 or more times

16. During the past 12 months, how many times were you in a physical fight on school property?

- 0 times     2-3 times     6-7 times     10-11 times  
 1 time     4-5 times     8-9 times     12 or more times

17. In my school, students have lots of chances to help decide things like class activities and rules.

18. Teachers ask me to work on special classroom projects.

19. My teacher(s) notice when I am doing a good job and lets me know about it.

20. There are a lot of chances for students in my school to get involved in sports, clubs, and other school activities outside of class.

21. There are lots of chances for students in my school to talk with a teacher one-on-one.

22. I feel safe at my school.

23. The school lets my parents know when I have done something well.

	NO!	no	yes	YES!
17. In my school, students have lots of chances to help decide things like class activities and rules.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
18. Teachers ask me to work on special classroom projects.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
19. My teacher(s) notice when I am doing a good job and lets me know about it.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
20. There are a lot of chances for students in my school to get involved in sports, clubs, and other school activities outside of class.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
21. There are lots of chances for students in my school to talk with a teacher one-on-one.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
22. I feel safe at my school.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
23. The school lets my parents know when I have done something well.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>



34. I ignore rules that get in my way.

- Very false       Somewhat true
- Somewhat false       Very true

35. It is all right to beat up people if they start the fight.

- NO!       no       yes       YES!

36. It is important to be honest with your parents, even if they become upset or you get punished.

- NO!       no       yes       YES!

37. I do the opposite of what people tell me, just to get them mad.

- Very false       Somewhat true
- Somewhat false       Very true

38. I think it is okay to take something without asking if you can get away with it.

- NO!       no       yes       YES!

39. How many times have you done the following things?

Once a week or more
Two or three times a month
About once a month
Less than once a month
I've done it, but not in the past year
Never

- a. done what feels good no matter what.
- b. done something dangerous because someone dared you to do it.
- c. done crazy things even if they are a little dangerous.

40. Have you ever belonged to a gang?

- No, not interested
- No, but would like to
- Yes, in the past
- Yes, belong now
- Yes, but would like to get out

41. If you have ever belonged to a gang, what was the one major reason you joined?

- Protection/safety
- Friendship
- Parents are in a gang
- Other
- I have never belonged to gang

42. If you have ever belonged to a gang, did the gang have a name?

- Yes
- No
- I never have belonged to a gang

43. How many times in the past year (the last 12 months) have you:

40+ Times
30 to 39 Times
20 to 29 Times
10 to 19 Times
6 to 9 Times
3 to 5 Times
1 to 2 Times
Never

- a. been suspended from school?
- b. carried a handgun?
- c. sold illegal drugs?
- d. stolen or tried to steal a motor vehicle such as a car or a motorcycle?
- e. been arrested?
- f. attacked someone with the idea of seriously hurting them?
- g. been drunk or high at school?
- h. taken a handgun to school?

44. What are the chances you would be seen as cool if you:

Very good chance
Pretty good chance
Some chance
Little chance
No or very little chance

- a. smoked cigarettes?
- b. began drinking alcoholic beverages regularly, at least once or twice a month?
- c. smoked marijuana?
- d. carried a handgun?

45. You are looking at CD's in the music store with a friend. You look up and see her slip a CD under her coat. She smiles and says, "Which one do you want? Go ahead, take it while nobody's around." There is no one in sight, no employees or other customers. What would you do?

- Ignore her
- Grab a CD and leave the store
- Tell her to put the CD back
- Act like it is a joke, and ask her to put the CD back

46. It is 8:00 on a weeknight and you are about to go over to a friend's house when your mother asks you where you are going. You say "Oh, just going to go hang out with some friends. She says, "NO, you'll just get into trouble if you go out. Stay home tonight." What would you do now?

- Leave the house anyway
- Explain what you are going to do with your friends, tell her when you will get home, and ask if you can go out
- Not say anything and start watching TV
- Get into an argument with her

47. You are visiting another part of town, and you do not know any of the people your age there. You are walking down the street, and some teenager you do not know is walking toward you. He is about your size, and as he is about to pass you, he deliberately bumps into you and you almost lose your balance. What would you say or do?

- Push the person back
- Say "Excuse me" and keep on walking
- Say "Watch where you're going" and keep on walking
- Swear at the person and walk away

48. You are at a party at someone's house, and one of your friends offers you a drink containing alcohol. What would you say or do?

- Drink it
- Tell your friend, "No thanks, I don't drink" and suggest that you and your friend go and do something else
- Just say, "No thanks" and walk away
- Make up a good excuse, tell your friend you had something else to do, and leave

49. I think sometimes it is okay to cheat at school.

- NO!
- no
- yes
- YES!

50. I like to see how much I can get away with.

- Very false
- Somewhat true
- Somewhat false
- Very true

51. Sometimes I think that life is not worth it.

- NO!
- no
- yes
- YES!

52. At times I think that I am no good at all.

- NO!
- no
- yes
- YES!

53. All in all, I am inclined to think that I am a failure.

- NO!
- no
- yes
- YES!

54. In the past year, have you felt depressed or sad most days, even if you felt okay sometimes.

- NO!
- no
- yes
- YES!

55. How much do you think people risk harming themselves (physically or in other ways) if they:

- a. smoke one or more packs of cigarettes per day?
- b. try marijuana once or twice?
- c. smoke marijuana regularly?
- d. take one or two drinks of an alcoholic beverage (beer, wine, liquor) nearly every day?

Great risk	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Moderate risk	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Slight risk	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
No risk	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

**DRUG/ALCOHOL USAGE**

56. How frequently have you used smokeless tobacco during the past 30 days?

- Never
- About once a day
- Once or twice
- More than once a day
- Once or twice a week

57. How frequently have you smoked cigarettes during the past 30 days?

- Not at all
- Less than one cigarette per day
- One to five cigarettes per day
- About one-half pack per day
- About one pack per day
- About one and one-half packs per day
- Two packs or more per day

58. On how many occasions (if any) have you had beer, wine, or hard liquor during the past 30 days?

- 0 - occasions
- 1 - 2 occasions
- 3 - 5 occasions
- 6 - 9 occasions
- 10 - 19 occasions
- 20 - 39 occasions
- 40 or more occasions

59. Think back over the last two weeks. How many times have you had five or more alcoholic drinks in a row?

- None
- 1 time
- 2 times
- 3 - 5 times
- 6 - 9 times
- 10 or more times

60. On how many occasions (if any) have you used marijuana during the past 30 days?

- 0 - occasions
- 1 - 2 occasions
- 3 - 5 occasions
- 6 - 9 occasions
- 10 - 19 occasions
- 20 - 39 occasions
- 40 or more occasions

61. On how many occasions (if any) have you used LSD or other psychedelics during the past 30 days?

- 0 - occasions
- 1 - 2 occasions
- 3 - 5 occasions
- 6 - 9 occasions
- 10 - 19 occasions
- 20 - 39 occasions
- 40 or more occasions

62. On how many occasions (if any) have you used cocaine or crack in the past 30 days?

- 0 - occasions
- 1 - 2 occasions
- 3 - 5 occasions
- 6 - 9 occasions
- 10 - 19 occasions
- 20 - 39 occasions
- 40 or more occasions

63. On how many occasions (if any) have you sniffed glue, breathed the contents of an aerosol spray can, or inhaled other gases or sprays in order to get high during the past 30 days?

- 0 - occasions
- 1 - 2 occasions
- 3 - 5 occasions
- 6 - 9 occasions
- 10 - 19 occasions
- 20 - 39 occasions
- 40 or more occasions

64. On how many occasions (if any) have you taken methamphetamines in the past 30 days?

- 0 - occasions
- 1 - 2 occasions
- 3 - 5 occasions
- 6 - 9 occasions
- 10 - 19 occasions
- 20 - 39 occasions
- 40 or more occasions

65. On how many occasions (if any) have you used steroids without a doctor's permission during the past 30 days?

- 0 - occasions
- 1 - 2 occasions
- 3 - 5 occasions
- 6 - 9 occasions
- 10 - 19 occasions
- 20 - 39 occasions
- 40 or more occasions

PLEASE DO NOT WRITE IN THIS AREA

66. On how many occasions (if any) have you used heroin or other narcotics during the past 30 days?

- 0 - occasions
- 1 - 2 occasions
- 3 - 5 occasions
- 6 - 9 occasions
- 10 - 19 occasions
- 20 - 39 occasions
- 40 or more occasions

67. On how many occasions (if any) have you used Quaaludes, barbituates, or tranquilizers during the past 30 days?

- 0 - occasions
- 1 - 2 occasions
- 3 - 5 occasions
- 6 - 9 occasions
- 10 - 19 occasions
- 20 - 39 occasions
- 40 or more occasions

68. On how many occasions (if any) have you used ecstasy during the past 30 days?

- 0 - occasions
- 1 - 2 occasions
- 3 - 5 occasions
- 6 - 9 occasions
- 10 - 19 occasions
- 20 - 39 occasions
- 40 or more occasions

69. On how many occasions (if any) have you used derbisol during the past 30 days?

- 0 - occasions
- 1 - 2 occasions
- 3 - 5 occasions
- 6 - 9 occasions
- 10 - 19 occasions
- 20 - 39 occasions
- 40 or more occasions

### COMMUNITY-BASED PERCEPTIONS

70. If you wanted to get some beer, wine, or hard liquor (for example, vodka, whiskey, or gin), how easy would it be for you to get some?

- Very hard
- Sort of hard
- Sort of easy
- Very easy

71. If you wanted to get some cigarettes, how easy would it be for you to get some?

- Very hard
- Sort of hard
- Sort of easy
- Very easy

72. If a kid smokes marijuana in your neighborhood, would he or she be caught by the police?

- NO!
- no
- yes
- YES!

73. If you wanted to get drugs like cocaine, LSD, or amphetamines, how easy would it be for you to get some?

- Very hard
- Sort of hard
- Sort of easy
- Very easy

74. If a kid drank some beer, wine, or hard liquor (for example, vodka, whiskey, or gin) in your neighborhood, would he or she be caught by the police?

- NO!
- no
- yes
- YES!

75. If you wanted to get a handgun, how easy would it be for you to get one?

- Very hard
- Sort of hard
- Sort of easy
- Very easy

76. If a kid carried a handgun in your neighborhood, would he or she be caught by the police?

- NO!
- no
- yes
- YES!

77. If you wanted to get some marijuana, how easy would it be for you to get some?

- Very hard
- Sort of hard
- Sort of easy
- Very easy

78. If a kid smoked cigarettes in your neighborhood, would he or she be caught by the police?

- NO!
- no
- yes
- YES!

79. How wrong would most adults in your neighborhood think it is for kids your age:

	Not Wrong at All			
	A Little Bit Wrong			
	Wrong			
	Very Wrong			
a. to use marijuana?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
b. to drink alcohol?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
c. to smoke cigarettes?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

80. About how many adults have you known personally who in the past year have:

- a. used marijuana, crack, cocaine, or other drugs?
- None
  - 1 adult
  - 2 adults
  - 3 or 4 adults
  - 5 or more adults

b. sold or dealt drugs?

- None
- 1 adult
- 2 adults
- 3 or 4 adults
- 5 or more adults

c. done other things that could get them in trouble with the police, like stealing, selling stolen goods, mugging or assaulting others, etc.?

- None
- 1 adult
- 2 adults
- 3 or 4 adults
- 5 or more adults

d. gotten drunk or high?

- None
- 1 adult
- 2 adults
- 3 or 4 adults
- 5 or more adults

81. If I had to move, I would miss the neighborhood I now live in.

	NO!	no	yes	YES!
81. If I had to move, I would miss the neighborhood I now live in.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
82. My neighbors notice when I am doing a good job and let me know about it.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
83. I like my neighborhood.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
84. There are lots of adults in my neighborhood I could talk to about something important.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

82. My neighbors notice when I am doing a good job and let me know about it.

83. I like my neighborhood.

84. There are lots of adults in my neighborhood I could talk to about something important.

85. How much do each of the following statements describe your neighborhood?

	NO!	no	yes	YES!
a. crime and/or drug selling	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
b. fights	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
c. lots of empty or abandoned buildings	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
d. lots of graffiti	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

86. People move in and out of my neighborhood a lot.

- NO!     no     yes     YES!

87. How many times have you changed homes since kindergarten?

- Never     3 - 4 times     7 or more times  
 1 - 2 times     5 - 6 times

88. There are people in my neighborhood who are proud of me when I do something well.

- NO!     no     yes     YES!

89. Which of the following activities for people your age are available in your community?

- a. Sports teams  
 No     Yes, but I don't participate     Yes, and I participate
- b. Scouting  
 No     Yes, but I don't participate     Yes, and I participate
- c. Boys & girls clubs  
 No     Yes, but I don't participate     Yes, and I participate
- d. 4-H clubs  
 No     Yes, but I don't participate     Yes, and I participate
- e. Service clubs  
 No     Yes, but I don't participate     Yes, and I participate

90. Have you changed schools in the past year (the last 12 months)?

- No     Yes

91. I feel safe in my neighborhood.

- NO!     no     yes     YES!

92. How many times have you changed schools since kindergarten?

- Never     3 - 4 times     7 or more times  
 1 - 2 times     5 - 6 times

93. I would like to get out of my neighborhood.

- NO!     no     yes     YES!

94. Have you changed homes in the past year (the last 12 months)?

- No     Yes

95. There are people in my neighborhood who encourage me to do my best.

- NO!     no     yes     YES!

96. If you have a job (part-time or full-time), how much do you work?

- I do not have a job     30-40 hrs per week  
 Less than 20 hrs per week     More than 40 hrs per week

**FAMILY DOMAIN**

97. How wrong do your parents feel it would be for you to:

	Not Wrong at All			
	A Little Bit Wrong			
	Wrong			
	Very Wrong			

- a. drink beer, wine, or hard liquor (for example, vodka, whiskey, or gin) regularly (at least once or twice a month)?
- b. smoke cigarettes?
- c. smoke marijuana?
- d. steal anything worth more than \$5.00?
- e. draw graffiti, write things, or draw pictures on buildings or other property (without the owner's permission)?
- f. pick a fight with someone?

98. Have any of your brothers or sisters ever:

- a. drunk beer, wine, or hard liquor (for example, vodka, whiskey, or gin)?  
 No     Yes     I don't have any brothers or sisters
- b. smoke marijuana?  
 No     Yes     I don't have any brothers or sisters
- c. smoke cigarettes?  
 No     Yes     I don't have any brothers or sisters
- d. taken a handgun to school?  
 No     Yes     I don't have any brothers or sisters
- e. been suspended or expelled from school?  
 No     Yes     I don't have any brothers or sisters

99. The rules in my family are clear.

- NO!     no     yes     YES!

100. Has anyone in your family ever had a severe alcohol or drug problem?

- No     Yes

PLEASE DO NOT WRITE IN THIS AREA



**FAMILY DOMAIN**

	NO!	no	yes	YES!
101. People in my family often insult or yell at each other.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
102. When I am not at home, one of my parents knows where I am and who I am with.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
103. We argue about the same things in my family over and over.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
104. My parents want me to call if I am going to be late getting home.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
105. If you drank some beer, wine, or hard liquor (for example, vodka, whiskey, or gin) without your parents' permission, would you be caught by your parents?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
106. My family has clear rules about alcohol and drug use.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
107. If you carried a handgun without your parents' permission, would you be caught by your parents?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
108. If you skipped school without your parents' permission, would you be caught by your parents?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

109. My parents notice when I am doing a good job and let me about it.

- Never or almost never       Often  
 Sometimes                       All the time

110. Do you feel very close to your mother?  
 NO!       no       yes       YES!

111. Do you share your thoughts and feelings with your mother?  
 NO!       no       yes       YES!

112. My parents ask me what I think before most family decisions affecting me are made.  
 NO!       no       yes       YES!

113. How often do your parents tell you that they are proud of you for something you have done?

- Never or almost never       Often  
 Sometimes                       All the time

	NO!	no	yes	YES!
114. Do you share your thoughts and feelings with your father?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
115. Do you enjoy spending time with your mother?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
116. Do you enjoy spending time with your father?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
117. If I had a personal problem, I could ask my mom or dad for help.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
118. Do you feel very close to your father?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
119. My parents give me lots of chances to do fun things with them.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
120. My parents ask if I have gotten my homework done.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
121. People in my family have serious arguments.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
122. Would your parents know if you did not come home on time?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

123. How important were these questions?

- Not too important       Important  
 Fairly important       Very important

124. How honest were you in filling out this survey?

- I was very honest  
 I was honest pretty much of the time  
 I was honest some of the time  
 I was honest once in a while  
 I was not honest at all

## APPENDIX B

### Item-Construct Dictionary for the ARIZONA YOUTH SURVEY PREPARED BY Southwest Prevention Center (FY 01)

#### DEMOGRAPHICS

How old are you? 10 11 12 13 14 15 16 17 18 19 or older

What grade are you in? 6<sup>th</sup> 8<sup>th</sup> 10<sup>th</sup> 12<sup>th</sup>

Are you: Female Male (Q003)

What do you consider yourself to be? (Choose one best answer)

White, not of Hispanic Origin

Black or African American

American Indian/Native American, Eskimo, or Aleut

Spanish/Hispanic/Latino

Mexican American Chicano

Mexican Puerto Rican

Cuban Central American

Other Spanish South American

Asian or Pacific Islander

Chinese Japanese

Filipino Asian Indian

Hawaiian Samoan

Korean Guamanian

Vietnamese Cambodian

Other Asian or Pacific Islander

Other (Please Specify \_\_\_\_\_)

Think of where you live most of the time. Which of the following people live with you? (Choose all that apply)

Mother Father Other Adults

Foster Mother Foster Father Sister(s)

Stepmother Stepfather Stepsister(s)

Grandmother Grandfather Brother(s)

Aunt Uncle Stepbrother (s)

Other children

How many brothers and sisters, including stepbrothers and stepsisters, do you have that are older than you?

1 2 3 4 5 6 or more

How many brothers and sisters, including stepbrothers and stepsisters, do you have that are younger than you?

1 2 3 4 5 6 or more

What is the language you use most often at home? English Spanish Another Language

What is the highest level of schooling your father completed?

- Completed grade school or less
- Some high school
- Completed high school
- Some college
- Completed college
- Graduate or professional school after college
- Do not know
- Does not apply

What is the highest level of schooling your mother completed?

- Completed grade school or less
- Some high school
- Completed high school
- Some college
- Completed college
- Graduate or professional school after college
- Do not know
- Does not apply

If you have a job (part-time or full-time), how much do you work?

- I do not have a job
- Less than 20 hrs per week
- 30-40 hrs per week
- More than 40 hrs per week

## **COMMUNITY: Low Neighborhood Attachment**

I like my neighborhood, or the area around where I live. NO! no yes YES!

If I had to move, I would miss the neighborhood I now live in. NO! no yes YES!

I would like to get out of my neighborhood, or the area around where I live. NO! no yes YES!

## **COMMUNITY: Community Disorganization**

How much do each of the following statements describe your neighborhood, or the area around where you live?

- Crime and/or drug selling NO! no yes YES!
- Fights NO! no yes YES!
- Lots of empty or abandoned buildings NO! no yes YES!
- Lots of graffiti NO! no yes YES!

I feel safe in my neighborhood, or the area around where I live. NO! no yes YES!

## COMMUNITY: Transitions and Mobility

Have you changed homes in past year (the last 12 months) NO YES

How many times have you changed homes since kindergarten?  
Never 1-2 times 3-4 times 5-6 times 7 or more times

Have you changed schools in the past year (the last 12 months)? NO YES

How many times have you changed schools since kindergarten?  
Never 1-2 times 3-4 times 5-6 times 7 or more times

People move in and out of my neighborhood a lot. NO! no yes YES!

## COMMUNITY: Laws and Norms Favorable to Drug Use

How wrong would most adults in your neighborhood, or the area around where you live, think it is for kids your age:

To use marijuana? Very Wrong Wrong A Little Bit Wrong Not Wrong at all  
To drink alcohol? Very Wrong Wrong A Little Bit Wrong Not Wrong at all  
To smoke cigarettes? Very Wrong Wrong A Little Bit Wrong Not Wrong at all

If a kid drank some beer, wine, or hard liquor (for example, vodka, whiskey, or gin) in your neighborhood, or the area around where you live, would he or she be caught by the police? NO! no yes YES!

If a kid smokes marijuana in your neighborhood, or the area around where you live, would he or she be caught by the police? NO! no yes YES!

If a kid carried a handgun in your neighborhood, or the area around where you live, would he or she be caught by the police? NO! no yes YES!

If a kid smoked cigarettes in your neighborhood, or the area around where you live, would he or she be caught by the police? NO! no yes YES!

## COMMUNITY: Perceived Availability of Drugs

If you wanted to get some beer, wine, or hard liquor (for example, vodka, whiskey, or gin) how easy would it be for you to get some? Very hard Sort of hard Sort of easy Very easy

If you wanted to get some cigarettes, how easy would it be for you to get some? Very hard Sort of hard Sort of easy Very easy

If you wanted to get some marijuana, how easy would it be for you to get some? Very hard Sort of hard Sort of easy Very easy

If you wanted to get drugs like cocaine, LSD, or amphetamines, how easy would it be for you to get some? Very hard Sort of hard Sort of easy Very easy

If you wanted to get a handgun, how easy would it be for you to get one? Very hard Sort of hard Sort of easy Very easy

## **COMMUNITY: Opportunities for Positive Involvement**

There are lots of adults in my neighborhood I could talk to about something important. NO! no yes YES!

Which of the following activities for people your age are available in your community?

Sports teams Yes No

Scouting Yes No

Boys and girls clubs Yes No

4-H clubs Yes No

Service clubs Yes No

## **COMMUNITY: Rewards for Conventional Involvement**

My neighbors notice when I am doing a good job and let me know about it. NO! no yes YES!

There are people in my neighborhood, or the area around where I live, who encourage me to do my best. NO! no yes YES!

There are people in my neighborhood, or the area around where I live, who are proud of me when I do something well. NO! no yes YES!

## **FAMILY: Poor Family Management**

My parents ask if I have gotten my homework done. NO! no yes YES!

My parents want me to call if I am going to be late getting home. NO! no yes YES!

Would your parents know if you did not come home on time? NO! no yes YES!

When I am not at home, one of my parents knows where I am and who I am with. NO! no yes YES!

The rules in my family are clear. NO! no yes YES!

My family has clear rules about alcohol and drug use. NO! no yes YES!

If you drank some beer, wine, or hard liquor (for example, vodka, whiskey, or gin) without your parents' permission, would you be caught by your parents? NO! no yes YES!

If you skipped school without your parents' permission, would you be caught by your parents? NO! no yes YES!

If you carried a handgun without your parents' permission, would you be caught by your parents? NO! no yes YES!

## **FAMILY: Conflict**

People in my family often insult or yell at each other. NO! no yes YES!

People in my family have serious arguments. NO! no yes YES!

We argue about the same things in my family over and over. NO! no yes YES!

## **FAMILY: History of Antisocial Behavior**

Has anyone in your family ever had a severe alcohol or drug problem? No Yes

Have any of your brothers or sisters ever:

Drunk beer, wine, or hard liquor (for example,  
vodka, whiskey, or gin)? No Yes I don't have any  
Smoked marijuana? No Yes I don't have any  
Smoked cigarettes? No Yes I don't have any  
Taken a handgun to school? No Yes I don't have any  
Been suspended or expelled from school? No Yes I don't have any

About how many adults have you know personally who in the past year have:

Used marijuana, crack, cocaine, or other drugs? None 1 adult 2 adults 3 or 4 adults 5 or more adults  
Sold or dealt drugs? None 1 adult 2 adults 3 or 4 adults 5 or more adults  
Done other things that could get them in  
trouble with the police, like stealing,  
Selling stolen goods, mugging or assaulting  
others, etc? None 1 adult 2 adults 3 or 4 adults 5 or more adults  
Gotten drunk or high? None 1 adult 2 adults 3 or 4 adults 5 or more adults

## **FAMILY: Parental Attitudes Favorable Toward Drug Use**

How wrong do your parents feel it would be for you to:

Drink beer, wine, or hard liquor (for example,  
vodka, whiskey, or gin regularly (at least once  
or twice a month)? Very Wrong Wrong A Little Bit Wrong Not Wrong at All  
Smoke cigarettes? Very Wrong Wrong A Little Bit Wrong Not Wrong at All

Smoke marijuana? Very Wrong Wrong A Little Bit Wrong Not Wrong at All

## **FAMILY: Parental Attitudes Favorable to Antisocial Behavior**

How wrong do your parents feel it would be for you to:

Steal anything worth more than \$5.00? Very Wrong Wrong A Little Bit Wrong Not Wrong at All  
Draw graffiti, write things, or draw  
pictures on building or other property Very Wrong Wrong A Little Bit Wrong Not Wrong at All  
Pick a fight with someone? Very Wrong Wrong A Little Bit Wrong Not Wrong at All

## **FAMILY: Attachment**

Do you feel very close to your mother? NO! no yes YES!  
Do you share your thoughts and feelings with your mother? NO! no yes YES!  
Do you feel very close to your father? NO! no yes YES!  
Do you share your thoughts and feelings with your father? NO! no yes YES!

## **FAMILY: Opportunities for Positive Involvement**

My parents give me lots of chances to do fun things with them. NO! no yes YES!

My parents ask me what I think before most family decisions affecting me are made. NO! no yes YES!

If I had a personal problem, I could ask my mom or dad for help. NO! no yes YES!

## **FAMILY: Rewards for Conventional Involvement**

My parents notice when I am doing a good job,  
and let me know about it. Never or almost never Sometimes Often All the time

How often do your parents tell you that they are  
proud of you for something you have done? Never or almost never Sometimes Often All the time

Do you enjoy spending time with your mother? NO! no yes YES!

Do you enjoy spending time with your father? NO! no yes YES!

## **SCHOOL: Academic Failure**

Putting them all together, what were your grades  
like last year? Mostly F's Mostly D's Mostly C's Mostly B's Mostly A's

Are your school grades better than the grades of most students in your class? NO! No Yes YES!

## **SCHOOL: Little Commitment to School**

How often do you feel that the school work you are  
assigned is meaningful and important. Never Seldom Sometimes Often Almost Always

How interesting are most of your courses to you?  
Very interesting and stimulating Quite interesting Fairly interesting Slightly dull Very dull

How important do you think the things you are learning  
in school are going to be for your later life?  
Very important Quite important Fairly important Slightly important Not at all important

Now thinking back over the past year in school, how often did you:

Enjoy being in school? Never Seldom Sometimes Often Almost always  
Hate being in school? Never Seldom Sometimes Often Almost always  
Try to do y our best work in school? Never Seldom Sometimes Often Almost always

During the LAST FOUR WEEKS how many whole days of school have you missed

Because of illness? None 1 day 2 days 3 days 4-5 days 6-10 days 11 or more days  
Because you skipped or "cut"? None 1 day 2 days 3 days 4-5 days 6-10 days 11 or more days  
For other reasons? None 1 day 2 days 3 days 4-5 days 6-10 days 11 or more days

## **SCHOOL: Opportunities for Positive Involvement**

In my school, students have lots of chances to help decide things like class activities and rules. NO! no yes YES!

There are lots of chances for students in my school to talk with a teacher one-on-one. NO! no yes YES!

Teachers ask me to work on special classroom projects. NO! no yes YES!

There are a lot of chances for students in my school to get involved in sports, clubs, and other school activities outside of class. NO! no yes YES!

I have lots of chances to be part of class discussions or activities. NO! no yes YES!

### SCHOOL: Rewards for Conventional Involvement

My teacher(s) notices when I am doing a good job and lets me know about it. NO! no yes YES!

The school lets my parents know when I have done something well. NO! no yes YES!

I feel safe at my school. NO! no yes YES!

My teachers praise me when I work hard in school. NO! no yes YES!

### PEER-INDIVIDUAL: Rebelliousness

I do the opposite of what people tell me, just to get them mad. Very false Somewhat false Somewhat true Very true

I ignore rules that get in my way. Very false Somewhat false Somewhat true Very true

I like to see how much I can get away with. Very false Somewhat false Somewhat true Very true

### PEER-INDIVIDUAL: Early Initiation of Drug Use

How old were you when you first:

- Smoked marijuana? Never Have 10 or Younger 11 12 13 14 15 16 17 or older
- Smoked a cigarette, even just a puff? Never Have 10 or Younger 11 12 13 14 15 16 17 or older
- Had more than a sip or two of beer, wine, or hard liquor (for example
- Vodka, whiskey, or gin)? Never Have 10 or Younger 11 12 13 14 15 16 17 or older
- Began drinking alcoholic beverages regularly that is, at least once or twice a month? Never Have 10 or Younger 11 12 13 14 15 16 17 or older
- Tried smokeless tobacco? Never Have 10 or Younger 11 12 13 14 15 16 17 or older
- Used cocaine or crack? Never Have 10 or Younger 11 12 13 14 15 16 17 or older
- Used methamphetamines? Never Have 10 or Younger 11 12 13 14 15 16 17 or older
- Used LSD or other psychedelics? Never Have 10 or Younger 11 12 13 14 15 16 17 or older
- Sniffed glue, breathed the contents of an aerosol spray can, or inhaled other gases or sprays in order to get high? Never Have 10 or Younger 11 12 13 14 15 16 17 or older
- Taken steroids without a doctor's orders? Never Have 10 or Younger 11 12 13 14 15 16 17 or older

Used heroin or other narcotics? Never Have 10 or Younger 11 12 13 14 15 16 17 or older  
 Used derbisol? Never Have 10 or Younger 11 12 13 14 15 16 17 or older  
 Used Quaaludes, barbiturates,  
 or tranquilizers? Never Have 10 or Younger 11 12 13 14 15 16 17 or older  
 Used ecstasy? Never Have 10 or Younger 11 12 13 14 15 16 17 or older

## PEER-INDIVIDUAL: Early Initiation of Antisocial Behavior

How old were you when you first:

Got suspended from school? Never Have 10 or Younger 11 12 13 14 15 16 17 or older  
 Got arrested? Never Have 10 or Younger 11 12 13 14 15 16 17 or older  
 Carried a handgun? Never Have 10 or Younger 11 12 13 14 15 16 17 or older  
 Attacked someone with the idea of  
 seriously hurting them? Never Have 10 or Younger 11 12 13 14 15 16 17 or older

## PEER-INDIVIDUAL: Antisocial Behavior

How many times in the past year (the last 12 months) have you:

Been suspended from school?  
 Never 1to2 Times 3to5 Times 6to9 Times 10 to19 Times 20to29 Times 30to39 Times 40+ Times  
 Carried a handgun?  
 Never 1to2 Times 3to5 Times 6to9 Times 10 to19 Times 20to29 Times 30to39 Times 40+ Times

Sold illegal drugs?  
 Never 1to2 Times 3to5 Times 6to9 Times 10 to19 Times 20to29 Times 30to39 Times 40+ Times

Stolen or tried to steal a motor vehicle such as a car or motorcycle?  
 Never 1to2 Times 3to5 Times 6to9 Times 10 to19 Times 20to29 Times 30to39 Times 40+ Times

Been arrested?  
 Never 1to2 Times 3to5 Times 6to9 Times 10 to19 Times 20to29 Times 30to39 Times 40+ Times

Attacked someone with the idea of seriously hurting them?  
 Never 1to2 Times 3to5 Times 6to9 Times 10 to19 Times 20to29 Times 30to39 Times 40+ Times

Been drunk or high at school?  
 Never 1to2 Times 3to5 Times 6to9 Times 10 to19 Times 20to29 Times 30to39 Times 40+ Times

Taken a handgun to school?  
 Never 1to2 Times 3to5 Times 6to9 Times 10 to19 Times 20to29 Times 30to39 Times 40+ Times

During the past 30 days, on how many days did you carry a weapon such as a gun, knife, or club on school property?  
 0 days 1 day 2-3 days 4-5 days 6 or more days

During the past 12 months, how many times has someone threatened or injured you with a weapon such as a gun, knife, or club on school property?

0 times 1 time 2to3 times 4 to5 times 6 to7 times 8 to9 times 10 to 11 times 12 or more times

During the past 12 months, how many times were you in a physical fight on school property?

0 times 1 time 2to3 times 4 to5 times 6 to7 times 8 to9 times 10 to 11 times 12 or more times

## PEER INDIVIDUAL: Favorable Attitudes Towards Antisocial Behavior

How wrong do you think it is for someone your age to:

Take a handgun to school? Very Wrong Wrong A Little Bit Wrong Not Wrong at All  
 Steal anything worth more than \$5.00 Very Wrong Wrong A Little Bit Wrong Not Wrong at All  
 Pick a fight with someone Very Wrong Wrong A Little Bit Wrong Not Wrong at All  
 Attack someone with the idea of seriously hurting them? Very Wrong Wrong A Little Bit Wrong Not Wrong at All  
 Stay away from school all day when their parents think they are at school? Very Wrong Wrong A Little Bit Wrong Not Wrong at All

## PEER-INDIVIDUAL: Favorable Attitudes Towards Drug Use

How wrong do you think it its for someone your age to:

Drink beer, wine, or hard liquor (for example, vodka, whiskey, or gin) regularly (at least once or twice a month)? Very Wrong Wrong A Little Bit Wrong Not Wrong at All  
 Smoke cigarettes? Very Wrong Wrong A Little Bit Wrong Not Wrong at All  
 Smoke marijuana? Very Wrong Wrong A Little Bit Wrong Not Wrong at All  
 Use LSD, cocaine, amphetamines, or another illegal drug? Very Wrong Wrong A Little Bit Wrong Not Wrong at All

## PEER-INDIVIDUAL: Perceived Risks of Drug Use

How much do you think people risk harming themselves (Physically or in other ways) if they:

Smoke one or more packs of cigarettes per day? No risk Slight risk Moderate risk Great risk  
 Try marijuana once or twice? No risk Slight risk Moderate risk Great risk  
 Smoke marijuana regularly No risk Slight risk Moderate risk Great risk  
 Take one or two drinks of an alcohol beverage (beer, wine, liquor) nearly every day? No risk Slight risk Moderate risk Great risk

## PEER-INDIVIDUAL: Friends' Use of Drugs

Think of your four best friends (the friends you feel closest to). In the past year (12 months), how many of your best friends have:

Smoked cigarettes? None 1 2 3 4  
 Tried beer, wine, or hard liquor (for example, vodka, whiskey, or gin) when their parents didn't know about it? None 1 2 3 4  
 Used marijuana? None 1 2 3 4  
 Used LSD, cocaine, amphetamines, or other illegal drugs? None 1 2 3 4

## PEER-INDIVIDUAL: Interaction with Antisocial Peers

Been suspended from school? None 1 2 3 4  
 Carried a handgun? None 1 2 3 4  
 Sold illegal drugs None 1 2 3 4  
 Stolen or tried to steal a motor vehicle such as a car or a motorcycle? None 1 2 3 4  
 Been arrested? None 1 2 3 4  
 Dropped out of school? None 1 2 3 4

## PEER-INDIVIDUAL: Sensation Seeking

How many times have you done the following things:

Done what feels good no matter what.

Never I've done it, but not in the past year  
Less than once a month About once a month  
Two or three times a month Once a week or more

Done something dangerous because someone dared you to do it.

Never I've done it, but not in the past year  
Less than once a month About once a month  
Two or three times a month Once a week or more

Done crazy things even if they are a little dangerous.

Never I've done it, but not in the past year  
Less than once a month About once a month  
Two or three times a month Once a week or more

## PEER-INDIVIDUAL: Rewards for Antisocial Involvement

What are the chances you would be seen as cool if you:

Smoked cigarettes?

No or very little chance Little chance Some chance Pretty good chance Very good chance

Began drinking alcoholic beverages regularly, at least once or twice a month?

No or very little chance Little chance Some chance Pretty good chance Very good chance

Smoked marijuana?

No or very little chance Little chance Some chance Pretty good chance Very good chance

Carried a handgun?

No or very little chance Little chance Some chance Pretty good chance Very good chance

## PEER-INDIVIDUAL: Social Skills

You are looking at CD's in the music store with a friend. You look up and see her slip a CD under her coat. She smiles and says, "Which one do you want? Go ahead, take it while nobody's around." There is no one in sight, no employees or other customers. What would you do now?

Ignore her  
Grab a CD and leave the store  
Tell her to put the CD back  
Act like it is a joke, and ask her to put the CD back

It is 8:00 on a weeknight and you are about to go over to a friend's house when your mother asks you where you are going. You say, "Oh, just going to go hang out with some friends." She says, "No, you'll just get into trouble if you go

out. Stay home tonight.” What would you do now?

- Leave the house anyway
- Explain what you are going to do with your friends, tell her when you will get home, and ask if you can go out
- Not say anything and start watching TV
- Get into an argument with her

You are visiting another part of town, and you do not know any of the people your age there. You are walking down the street, and some teenager you do not know is walking toward you. He is about your size, and as he is about to pass you, he deliberately bumps into you and you almost lose your balance. What would you say or do?

- Push the person back
- Say “Excuse me” and keep on walking
- Say “Watch where you’re going” and keep on walking
- Swear at the person and walk away

You are at a party at someone’s house, and one of your friends offers you a drink containing alcohol. What would you say or do?

- Drink it
- Tell your friend, “No thanks, I don’t drink” and suggest that you and your friend go and do something else
- Just say, “No thanks” and walk away
- Make up a good excuse, tell your friend you had something else to do, and leave

## PEER-INDIVIDUAL: Belief in the Moral Order

I think it is okay to take something without asking if you can get away with it. NO! no yes YES!

I think it is okay to cheat at school. NO! no yes YES!

It is all right to beat up people if they start the fight. NO! no yes YES!

It is important to be honest with your parents, even if they become upset or you get punished. NO! no yes YES!

## OUTCOME: Gang Involvement

How old were you when you first: Never Have 10 or Younger 11 12 13 14 15 16 17 or older  
Belonged to a gang? Never Have 10 or Younger 11 12 13 14 15 16 17 or older  
Have you ever belonged to a gang? Yes No

If you have ever belonged to a gang, did the gang have a name? No I never have belonged to a gang

If you have ever belonged to a gang,  
what was the one major reason you joined? Protection/safety Friendship Parents are in a gang  
Other I never have belonged to a gang

Think of your four best friends ( the friends you feel closest to). In the past year (12 months), how many of your best friends have:

Been members of a gang? None 1 2 3 4

## Drug Outcomes

How frequently have you used smokeless tobacco during the past 30 days?

Never Once or twice Once or twice a week About once a day More than once a day

How frequently have you smoked cigarettes during the past 30 days?

Not at all Less than one cigarette per day One to five cigarettes per day About one-half pack per day  
About one pack per day About one and one-half packs per day Two packs or more per day

On how many occasions (if any) have you had beer, wine, or hard liquor during the past 30 days?

0-occasions 1-2 occasions 3-5 occasions 6-9 occasions 10-19 occasions 20-39 occasions 40 or more occasions

Think back over the last two weeks. How many times have you had five or more alcoholic drinks in a row?

None 1 time 2 times 3-5 times 6-9 times 10 or more times

On how many occasions (if any) have you used marijuana during the past 30 days?

0-occasions 1-2 occasions 3-5 occasions 6-9 occasions 10-19 occasions 20-39 occasions 40 or more occasions

On how many occasions (if any) have you used LSD or other psychedelics during the past 30 days?

0-occasions 1-2 occasions 3-5 occasions 6-9 occasions 10-19 occasions 20-39 occasions 40 or more occasions

On how many occasions (if any) have you used cocaine or crack during the past 30 days?

0-occasions 1-2 occasions 3-5 occasions 6-9 occasions 10-19 occasions 20-39 occasions 40 or more occasions

On how many occasions (if any) have you sniffed glue, breathed the contents of an aerosol spray can, or inhaled other gases or sprays in order to get high during the past 30 days?

0-occasions 1-2 occasions 3-5 occasions 6-9 occasions 10-19 occasions 20-39 occasions 40 or more occasions

On how many occasions (if any) have you taken methamphetamines in the past 30 days?

0-occasions 1-2 occasions 3-5 occasions 6-9 occasions 10-19 occasions 20-39 occasions 40 or more occasions

On how many occasions (if any) have you used derbisol during the past 30 days?

0-occasions 1-2 occasions 3-5 occasions 6-9 occasions 10-19 occasions 20-39 occasions 40 or more occasions

On how many occasions (if any) have you used heroin or other narcotics during the past 30 days?

0-occasions 1-2 occasions 3-5 occasions 6-9 occasions 10-19 occasions 20-39 occasions 40 or more occasions

On how many occasions (if any) have you used Quaaludes, barbiturates, or tranquilizers during the past 30 days?

0-occasions 1-2 occasions 3-5 occasions 6-9 occasions 10-19 occasions 20-39 occasions 40 or more occasions

On how many occasions (if any) have you used ecstasy during the past 30 days?

0-occasions 1-2 occasions 3-5 occasions 6-9 occasions 10-19 occasions 20-39 occasions 40 or more occasions

Think of your four best friends (the friends you feel closest to). In the past year (12 month), how many of your best friends have:

Attended a RAVE Party? None 1 2 3 4

## Other questions

Sometimes I think that life is not worth it. NO! no yes YES!

At times I think that I am no good at all. NO! no yes YES!

All in all, I am inclined to think that I am a failure. NO! no yes YES!

In the past year, have you felt depressed or sad most  
Days, even if you felt okay sometimes. NO! no yes YES!

How important were these questions? Not too important  
Important  
Fairly important  
Very important

How honest were you in filling out this survey?  
I was very honest  
I was honest pretty much of the time  
I was honest some of the time  
I was honest once in a while  
I was not honest at all