Prepared by:

Evaluation, Research and Development Unit
University of Arizona
P.O. Box 210462
Tucson, AZ 85721-0462
520-318-7259
www.evalrdu.org

Additional Contributors

Centers for Disease Control, Office of Smoking and Health
(core survey questions and dataset preparation)

ORC Macro
(sampling design, survey administration and data collection)

Arizona Department of Education
(survey coordination)

Thanks and Appreciation Are Extended to

The students who participated in the survey
And
The teachers and principals who facilitated their participation
# TABLE OF CONTENTS

**DEFINITION OF TERMS** ............................................................................................................vi

**EXECUTIVE SUMMARY** ............................................................................................................1

1. **INTRODUCTION** ...............................................................................................................2
   1.1. Design and Purpose of the Survey ..............................................................................2
   1.2. The Instrument ..........................................................................................................2
   1.3. Sampling .....................................................................................................................2
   1.4. School and Student Response Rates ...........................................................................3
   1.5. Weighting and Analysis .............................................................................................3
   1.7. Student Sample (Unweighted Counts) ........................................................................4
   1.8. Utility of the survey ....................................................................................................5

2. **RESULTS AND TRENDS** ............................................................................................................. 6

2.1. **PREVENTION** .............................................................................................................. 6
   2.1. Prevalence of Tobacco Use among Arizona Middle and High School Students ...... 6
   2.2. Access to Cigarettes and Other Tobacco Products ................................................... 24
   2.3. Influence of the Media .............................................................................................. 32

3. **CESSATION** ....................................................................................................................... 36
   3.1. Desire to Quit and Quit Attempts ............................................................................. 36
   3.2. Perception That They Would be Able Quit Smoking Now ...................................... 38
   3.3. Know Where to Get Help to Quit ............................................................................. 38
   3.4. Have Participated in a Quit Program ........................................................................ 39
   3.5. Use of Patch or Nicotine Gum .................................................................................. 40

4. **SECONDHAND SMOKE** ...................................................................................................... 41
   4.1. Exposure in Rooms and Cars .................................................................................... 41
   4.2. Comparing Exposure Rates from 2003 to 2005 ........................................................ 42
   4.3. Rules about Smoking in the Home ........................................................................... 45
   4.4. Students Bothered by Other People’s Cigarette Smoke ........................................... 47

5. **DISCUSSION OF FINDINGS** .............................................................................................. 48
   5.1. Prevention: Tobacco Use, Access to Tobacco Products and the Influence of the Media ................................................................................................................................................... 48
   5.2. Access to Cigarettes and Other Tobacco Products ................................................... 49
   5.3. Influence of the Media .............................................................................................. 50
   5.4. Cessation ................................................................................................................... 50
   5.5. Secondhand Smoke ................................................................................................... 50
   5.6. Survey limitations ..................................................................................................... 51

**APPENDIX** ............................................................................................................................... 52
List of Tables

Table 1. 2005 YTS Student and School Response Rates......................................................... 3
Table 2. Population Estimates for Arizona Residents Age 10–19 (2005) and Survey Population. 4
Table 3. Student Sample by Age.......................................................................................... 4
Table 4. Student Sample by Grade ....................................................................................... 5
Table 5. Student Sample by Gender ................................................................................... 5
Table 6. Students’ Self-Reported Current Smoking by Gender ............................................. 21
Table 7. Students’ Self-Reported Current Smoking by Race/Ethnicity .................................. 21

List of Figures

Figure 1. Students’ Self-reported Ever Use of Tobacco Products, YTS 2005 ......................... 7
Figure 2. Students’ Self-reported Use of Tobacco Products during the Past 30 days (Current Use), YTS 2005. ........................................................................................................ 7
Figure 3. Middle School Students’ Self-reported Ever Use of Tobacco, YTS 2000, 2003, 2005. 8
Figure 4. High School Students’ Self-reported Ever Use of Tobacco, YTS 2003, 2005 .......... 9
Figure 5. Middle School Students’ Self-reported Current Use of Tobacco, YTS 2000, 2003, 2005......................................................................................................................... 9
Figure 6. High School Students’ Self-reported Current Use of Tobacco, YTS 2003, 2005...... 10
Figure 7. Students’ Self-reported Tobacco Use by Grade, YTS 2005..................................... 11
Figure 8. Comparing Arizona Middle School Students’ Self-reported Current Tobacco Use with National Rates........................................................................................................ 12
Figure 9. Comparing Arizona High School Students’ Self-reported Current Tobacco Use with National Rates........................................................................................................ 12
Figure 10. Students Reporting Ever, Current, and Frequent Tobacco Use by Gender, YTS 2005................................................................................................................................. 13
Figure 11. Middle School Students’ Current Use of Tobacco Products by Gender, YTS 2005 .. 14
Figure 12. High School Students’ Current Use of Tobacco Products by Gender, YTS 2005 ..... 14
Figure 13. Middle School Students Reporting Ever, Current and Frequent Tobacco Use by Gender, YTS 2000, 2003, 2005 ............................................................... 15
Figure 14. High School Students Reporting Ever, Current and Frequent Tobacco Use by Gender, YTS 2003, 2005 (2000 not available)................................................................. 16
Figure 15. Students’ Self-reported Ever Use of Tobacco by Race/Ethnicity, YTS 2005......... 17
Figure 16. Students’ Self-reported Current Use of Tobacco by Race/Ethnicity, YTS 2005 ..... 17
Figure 17. Students’ Self-reported Frequent Use of Tobacco by Race/Ethnicity, YTS 2005 .... 18
Figure 18. Middle School Students Reporting Current Use of Tobacco by Race/Ethnicity, YTS 2000, 2003, 2005 ......................................................................................................... 18
Figure 19. High School Students Reporting Current Use of Tobacco by Race/Ethnicity, YTS 2003, 2005 ................................................................................................................... 19
Figure 20. Middle and High School Students Reporting Ever, Current and Frequent Smoking, YTS 2003& 2005.................................................................................................................. 20
Figure 21. Students’ Self-Reported Current Cigarette Smoking by Grade, YTS 2005........... 20
Figure 22. Middle and High School Students Reporting Current Smoking YTS 2000, 2003, 2005........................................................................................................................... 22
Figure 23. Middle and High School Students Reporting Current Smoking by Gender, YTS 2000, 2003, 2005
Figure 24. Middle School Students Reporting Current Cigarette Use by Race/Ethnicity, YTS 2000, 2003, 2005
Figure 25. High School Students Reporting Current Cigarette Use by Race/Ethnicity, YTS 2003, 2005
Figure 26. How Current Smokers under 18 Reported Getting Cigarettes, YTS 2005
Figure 27. How Current Tobacco Users under 18 Got Tobacco Products Other Than Cigarettes during the Past 30 Days, YTS 2005
Figure 28. Where Current Smokers under 18 Who Bought Cigarettes during the Past 30 Days Reported Buying Them, YTS 2005
Figure 29. Store Types Where Current Smokers under 18 Bought Cigarettes from a Store during the Past 30 Days Reported Buying Them, YTS 2005
Figure 30. Store Types Where Current Smokers Under 18 Who Bought Cigarettes Reported Buying during the Past 30 Days, Comparing YTS 2000, 2003 & 2005 Middle School Students
Figure 31. Stores Where Current Smokers under 18 Who Bought Cigarettes Reported Buying during the Past 30 Days, Comparing YTS 2003 and 2005 High School Students
Figure 32. Proof of Age Request of Current Smokers under 18 Who Bought Cigarettes from a Store during the Past 30 Days, YTS 2005
Figure 33. Refusal of Cigarette Sale to Current Smokers under 18 Who Bought or Attempted to Buy from a Store during the Past 30 Days, YTS 2005
Figure 34. Proof of Age Request and Sale Refusal to Current Smokers under 18 Who Bought Cigarettes from a Store during the Past 30 Days, YTS 2000, 2003 & 2005 Middle School Students
Figure 35. Proof of Age Request and Sale Refusal to Current Smokers under 18 Who Bought Cigarettes from a Store during the Past 30 Days, YTS 2003 and 2005 High School Students
Figure 36. Percent of Students Who Reported Seeing Actors Use Tobacco Some or Most of the Time on TV or in the Movies, YTS 2005
Figure 37. Percent of Students Who Reported Seeing Athletes Use Tobacco Some or Most of the Time on TV, YTS 2005
Figure 38. Percent of Students Who Reported They Had Seen or Heard Commercials on TV, the Internet, or on the Radio about the Dangers of Cigarette Smoking Almost Daily, Daily, or More than Once Per Day During the Past 30 Days, YTS 2005
Figure 39. Percent of Students Who Reported that Commercials Seen or Heard Definitely or Probably Changed the Way They Feel About Using Tobacco, YTS 2005
Figure 40. Percent of Students Who Reported They Would Definitely or Probably Use or Wear Something That Has a Tobacco Company Name or Picture on It, YTS 2005
Figure 41. Percent of Current Smokers Who Reported Wanting to Stop Smoking, YTS 2005
Figure 42. Percent of Current Smokers Who Reported Ever Trying to Quit Smoking Cigarettes during the Past 12 Months, YTS 2005
Figure 43. Number of Quit Attempts of Current Smokers, YTS 2005
Figure 44. Percent of Current Smokers Who Think They Would Be Able to Quit Smoking Cigarettes Now if They Wanted to
Figure 45. Percent of Current Smokers Who Know of a Place to Get Help to Quit Smoking, YTS 2005

Figure 46. Percent of Current Smokers Who Reported Ever Participating in a Quit Program, YTS 2005

Figure 47. Percent of Current Smokers Who Reported Ever Using The Patch of Nicotine Gum to Help Them Quit Smoking, YTS 2005

Figure 48. Exposure to Secondhand Smoke in Rooms and Cars, YTS 2005

Figure 49. Exposure to Secondhand Smoke in Rooms and Cars Comparing Students Who Live With a Smoker and Those Who Do Not, YTS 2005

Figure 50. Exposure to Secondhand Smoke in Rooms and Cars, Comparing Middle School Students in YTS 2003 and 2005

Figure 51. Exposure to Secondhand Smoke in Rooms and Cars, Comparing High School Students in YTS 2003 and 2005

Figure 52. Exposure to Secondhand Smoke in Rooms and Cars among Students Living with a Smoker, Comparing YTS 2003 and 2005

Figure 53. Exposure to Secondhand Smoke in Rooms and Cars among Students Not Living with a Smoker, Comparing YTS 2003 and 2005

Figure 54. Rules about Smoking in the Home, YTS 2005

Figure 55. Rules about Smoking in the Home, Comparing Students Who Live with a Smoker and Those Who Do Not, YTS 2005
DEFINITION OF TERMS

**Ever smokers or ever tobacco users.** *Ever users* of cigarettes, smokeless tobacco, cigars or cigarillos, pipe, bidis or kreteks are defined as students who have ever smoked (even one or two puffs), taken one dip of smokeless tobacco, or tried any other tobacco product in their lifetime.

**Current smokers or current tobacco users.** *Current users* of cigarettes, smokeless tobacco, cigars or cigarillos, pipe, bidis or kreteks are defined as students who reported product use on at least one of the 30 days prior to the survey.

**Frequent smokers or frequent tobacco users.** *Frequent users* of cigarettes, smokeless tobacco, cigars or cigarillos, pipe, bidis or kreteks are defined as students who reported product use on at least 20 of the 30 days prior to the survey.
EXECUTIVE SUMMARY

Youth who smoke or use other forms of tobacco are exposing themselves to products known to have serious health consequences. Because many adult smokers (and users of other tobacco products) report that they started smoking (or using) before the age of 18, it is important to monitor youth smoking and tobacco use trends. The long-term health implications of using tobacco products are not of concern to many youth who take up tobacco, even if they are aware of them. Monitoring use trends and understanding the attitudes, beliefs, and behaviors of youth regarding tobacco helps prevention educators, health practitioners, and other concerned adults design and implement effective prevention programs, counter-marketing strategies, and quit programs for youth.

This report presents data from the 2005 Arizona Youth Tobacco Survey on tobacco use prevalence rates (including smoking and other forms of tobacco), access to tobacco products, the influence of the media, information on desires and attempts to quit smoking, and exposure to secondhand smoke. This is the third iteration of the survey, previously conducted in 2000 and 2003. It was designed and implemented in coordination with the Centers for Disease Control, Office of Smoking and Health. The survey administration was coordinated with the Arizona Department of Education.

Long-term trends of student smoking show important declines – of over 30 percent – over the past ten or twelve years. It is highly likely that youth prevention programs have contributed to the decline. However, current tobacco use rates have become stable since 2003, and sustained efforts are needed, especially among high school aged youth, for the decline to continue.

Many students in Arizona (about one-third) continue to be exposed to secondhand smoke regularly in homes and cars where family members smoke. Rules that prohibit smoking in the home are far less frequent in households with smokers than households without smokers. The more that is discovered about the impact of secondhand smoke on youth, the more health practitioners and other public officials call for strategies to protect children from exposure in homes and cars where they spend much of their time.

With the help of its partners, the Arizona Department of Health Services will continue to monitor youth tobacco use to inform and shape the direction of tobacco prevention control in the state.
1. INTRODUCTION

1.1. Design and Purpose of the Survey

The 2005 Arizona Youth Tobacco Survey (YTS) was completed in the spring of 2005 and is the third in a series of biannual school-based surveys first implemented in the spring of 2000. The survey is designed to help monitor trends in tobacco use among public school students in grades 6 through 12 and to compare changes in rates over time. The survey also collects data on topics including: tobacco use; tobacco-related knowledge, attitudes and beliefs; access to tobacco products; exposure to environmental tobacco smoke; initiation and cessation; influence of family, friends and the media; and social, school and community interventions.

This report provides information on prevalence rates, access to tobacco, influence of the media, quitting smoking, and exposure to secondhand smoke. Subsequent reports will provide information on other topics covered in the survey.

The 2005 Arizona YTS was centrally coordinated by the Office of Tobacco Education and Prevention Program, under the Arizona Department of Health Services, in collaboration with the Arizona Department of Education and the Centers for Disease Control, Office on Smoking and Health (CDC).

1.2. The Instrument

The Arizona Youth Tobacco Survey uses a core set of questions developed by the Centers for Disease Control and Prevention, Office on Smoking and Health (CDC) to assist states with their tobacco control efforts. The Arizona YTS was administered simultaneously with the Arizona Youth Risk Behavior Survey in the spring of 2005 as part of a collaborative effort between the Arizona Department of Education (ADE) and the Arizona Department of Health Services (ADHS). The Arizona YTS contains 84 multiple-choice questions, including approximately 65 core questions from the CDC’s Youth Tobacco Survey. The questions cover prevalence, sources of tobacco products, attitudes and beliefs, environmental tobacco smoke, and media exposure modeled after the standard CDC recommended core YTS questionnaire. Results from the Arizona YTS can therefore be compared with results from other states and the National Youth Tobacco Survey conducted by the CDC.

1.3. Sampling

The sampling methods for the 2005 Arizona YTS were devised by the CDC and a subcontractor, ORC Macro. The sampling involved a two-stage cluster sampling design to obtain a representative sample of students at the state (but not county) level in grades 6-8 and grades 9-12. In the first sampling stage, district and charter schools were selected randomly within grade range. In the second sampling stage, classes were selected randomly from each middle and high school with equal probability sampling.
1.4. School and Student Response Rates

Classes from 38 district middle schools, 31 charter middle schools, 40 district high schools and 47 charter high schools were selected for the sample. All students in selected classes were eligible to participate.

Schools were given the discretion to administer active or passive parental consent forms, and 11 percent of the participating schools opted for active parental consent. The student and school response rates, presented below, are regarded as very good.

Table 1. 2005 YTS Student and School Response Rates

<table>
<thead>
<tr>
<th></th>
<th>Student</th>
<th>School</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Selected</td>
<td>Participated</td>
</tr>
<tr>
<td>Regular Middle</td>
<td>2247</td>
<td>2025</td>
</tr>
<tr>
<td>Charter Middle</td>
<td>1425</td>
<td>1230</td>
</tr>
<tr>
<td>Regular High</td>
<td>2281</td>
<td>1981</td>
</tr>
<tr>
<td>Charter High</td>
<td>1693</td>
<td>1358</td>
</tr>
<tr>
<td>Total</td>
<td>7646</td>
<td>6594</td>
</tr>
</tbody>
</table>

Source: ORC Macro, YTS Arizona School Sample

1.5. Weighting and Analysis

A weighting system was devised based on the probability of the selecting the school and selecting the classroom, a non-response adjustment factor for school size, a class adjustment factor calculated by school, a student-level non-response adjustment calculated by class, and a post-stratification adjustment factor calculated by gender, grade and race. The weighting system was designed to allow statewide inferences to be made concerning tobacco use risk behaviors for all public school students in grades 6-8 and grades 9-12.

The analyses presented in this report were calculated using SPSS version 14.0 using the sampling weights. In compliance with the survey methodology, all findings reported in this document are based on weighted data.


Table 2 below provides estimates of the Arizona population between the ages of ten and nineteen in 2005. The YTS primarily includes students between the ages of eleven and eighteen, but a small number of students below age eleven and above age eighteen are included. The table also provides the number of student respondents by race/ethnic group with and without the weighting scheme. Two racial/ethnic groups had a very low number of respondents: 171 Asian
students and 86 Native Hawaiian or other Pacific Islander students. Because these groups are so small, responses to questions presented by race/ethnicity are not reliable and therefore are not included in this report.

Table 2. Population Estimates for Arizona Residents Age 10–19 (2005) and Survey Population

<table>
<thead>
<tr>
<th></th>
<th>White, non-Hispanic</th>
<th>Hispanic/Latino</th>
<th>African American/Blacks</th>
<th>American Indian or Alaska Native</th>
<th>Asian or Pacific Islander</th>
<th>Not Identified</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number</td>
<td>472,392</td>
<td>291,134</td>
<td>32,898</td>
<td>64,043</td>
<td>15,409</td>
<td></td>
<td>875,876</td>
</tr>
<tr>
<td>% of Total Population</td>
<td>53.9%</td>
<td>33.2%</td>
<td>3.8%</td>
<td>7.3%</td>
<td>1.8%</td>
<td></td>
<td>100%</td>
</tr>
<tr>
<td>Number of Unweighted Survey Population</td>
<td>2961</td>
<td>2121</td>
<td>439</td>
<td>492</td>
<td>171**</td>
<td>171**</td>
<td>324</td>
</tr>
<tr>
<td>% of Unweighted Survey Population</td>
<td>44.9%</td>
<td>32.2%</td>
<td>7.0%</td>
<td>7.8%</td>
<td>2.6%</td>
<td></td>
<td>4.9%</td>
</tr>
<tr>
<td>% of Weighted Survey Population</td>
<td>49.1%</td>
<td>33.0%</td>
<td>4.6%</td>
<td>5.3%</td>
<td>2.2%</td>
<td></td>
<td>4.7%</td>
</tr>
</tbody>
</table>


1.7. Student Sample (Unweighted Counts)

The tables below present the number and percent of students by age, grade and gender. Unless otherwise specified, the findings and graphs in this report refer to the entire sample. If not, the unweighted count of the sub-sample for each particular graph is specified.

Table 3. Student Sample by Age

<table>
<thead>
<tr>
<th>Age</th>
<th>Number</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>11 years old or younger</td>
<td>440</td>
<td>7%</td>
</tr>
<tr>
<td>12 years old</td>
<td>987</td>
<td>15%</td>
</tr>
<tr>
<td>13 years old</td>
<td>1120</td>
<td>17%</td>
</tr>
<tr>
<td>14 years old</td>
<td>978</td>
<td>15%</td>
</tr>
<tr>
<td>15 years old</td>
<td>873</td>
<td>13%</td>
</tr>
<tr>
<td>16 years old</td>
<td>905</td>
<td>14%</td>
</tr>
<tr>
<td>17 years old</td>
<td>803</td>
<td>12%</td>
</tr>
<tr>
<td>18 years old or older</td>
<td>468</td>
<td>7%</td>
</tr>
<tr>
<td>Total</td>
<td>6594</td>
<td>100%</td>
</tr>
</tbody>
</table>
### Table 4. Student Sample by Grade

<table>
<thead>
<tr>
<th>Grade</th>
<th>Number</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>6th</td>
<td>1035</td>
<td>16%</td>
</tr>
<tr>
<td>7th</td>
<td>1073</td>
<td>16%</td>
</tr>
<tr>
<td>8th</td>
<td>1115</td>
<td>17%</td>
</tr>
<tr>
<td>9th</td>
<td>889</td>
<td>13%</td>
</tr>
<tr>
<td>10th</td>
<td>850</td>
<td>13%</td>
</tr>
<tr>
<td>11th</td>
<td>877</td>
<td>13%</td>
</tr>
<tr>
<td>12th</td>
<td>688</td>
<td>10%</td>
</tr>
<tr>
<td>Total</td>
<td>6594</td>
<td>100%</td>
</tr>
</tbody>
</table>

### Table 5. Student Sample by Gender

<table>
<thead>
<tr>
<th>Gender</th>
<th>Number</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Female</td>
<td>3385</td>
<td>51%</td>
</tr>
<tr>
<td>Male</td>
<td>3173</td>
<td>49%</td>
</tr>
<tr>
<td>Total</td>
<td>6594</td>
<td>100%</td>
</tr>
</tbody>
</table>

#### 1.8. Utility of the survey

The survey provides timely and reliable data on the prevalence of tobacco use among Arizona’s school-based youth and permits the formulation of trends over time. In addition, the survey:

1) increases our knowledge and understanding of youth’s attitudes and behaviors regarding tobacco use;
2) provides data relevant for enhancing the design, implementation, and evaluation of comprehensive tobacco prevention and control programs directed at Arizona youth;
3) combines with data from other sources to help develop strategies to target youth who are at higher risk of tobacco use;
4) allows for comparison of Arizona students’ tobacco use rates with those of students from other states and nationwide; and,
5) allows for the identification of issues in need of further research and study.
RESULTS AND TRENDS

2. PREVENTION

Prevention efforts include educational programs to steer young people away from using tobacco, controlling and monitoring where and how students obtain tobacco, and social marketing campaigns to influence young people’s choices about taking up tobacco. The first three sections of the report provide findings that are related to these three areas: tobacco prevalence rates, access to tobacco products and the influence of the media.

2.1. Prevalence of Tobacco Use among Arizona Middle and High School Students

This section of the report presents prevalence rates for students who reported using any type of tobacco product, not just cigarettes, since all forms of tobacco are covered in the survey and all pose health risks. Some students used more than one type of tobacco product.

Ever, Current and Frequent Tobacco Use, YTS 2005

About one-third of middle school students (31%) and over half of high school students (57%) reported ever trying some form of tobacco in their lifetime (Figure 1). Current use, defined as the use of any form of tobacco during the past 30 days, including just a puff of a cigarette or dip of chew, was reported by 17 percent of middle school students and 33 percent of high school students (Figure 2). Cigarettes were the most commonly used form of tobacco by both ever and current users in middle and high school. Current cigarette use was reported by eight percent of middle school students and 20 percent of high school students. Current use of cigars and cigarillos was five percent for middle school students and 16 percent for high school students. The rates for additional tobacco products are reported in Figures 1 and 2, below.
Frequent tobacco use, defined as use on 20 or more of the past 30 days, was reported by three percent of middle school students and nine percent of high school students. This level of use approaches that of adult tobacco users. About 66 percent of these students reported living with a smoker.
**Trends in Ever, Current and Frequent Tobacco Use, YTS 2000, 2003 and 2005**

Trends in ever, current and frequent tobacco use are presented separately for middle and high school students in Figures 3 to 6. Prevalence rates for specific tobacco products are reported only for the types of tobacco surveyed consistently across all three surveys.

**Trends in Ever Use**

Middle school students’ ever use of any tobacco product declined from 46 percent in 2000 to 31 percent in 2005, a decrease of 33 percent. The decrease in ever use applied to all forms of tobacco that the surveys collected data on across those years: cigarettes, cigars/cigarillos, smokeless, and bidis/kreteks (Figure 3).

![Middle School Students Reporting Ever, Current and Frequent Tobacco Use by Gender, YTS 2000, 2003, 2005](image)

Data on high school students’ tobacco use are available only for 2003 and 2005. (Owing to low response rates at the high school level, data pertaining to high school students from the 2000 YTS are not available). High school ever use of any tobacco product decreased from 62 percent in 2003 to 57 percent in 2005. The decrease in ever use applied to all forms of tobacco: cigarettes, cigarillos, smokeless, and bidis/kreteks (Figure 4).
**Trends in Current Use**

Trends in current use (past 30 days) for middle school students declined slightly for several specific tobacco products – cigarettes, cigar/illo, smokeless, and bidis/kreteks - from 2000 to 2005, but remained stable for overall tobacco product use in 2000 (17%) and 2005 (17%, Figure 5). (Use of pipe/hookah contributes to the 17 percent current overall tobacco use rates in 2005 - see Figure 1).

**Figure 5. Middle School Students’ Self-reported Current Use of Tobacco, YTS 2000, 2003, 2005**
Trends in current use (past 30 days) of any tobacco product for high school students increased from 26 percent in 2003 to 33 percent in 2005, an increase of 21 percent (Figure 6). Current use rates for cigarettes remained stable (from 19% to 20%), cigar/illos increased (from 12% to 16%), smokeless remained stable (from 5% to 4%), and bidis/kreteks decreased (from 6% to 2%). (Reported use of pipe/hookah among high school students contributes to the 2005 tobacco use rate - see Figure 2.)

Figure 6. High School Students’ Self-reported Current Use of Tobacco, YTS 2003, 2005

Figure 7 presents tobacco use by grade for ever, current, and frequent use in 2005. The overall trend shows that tobacco use typically rises in fairly regular increments at each grade level. The rate of change diminishes or tapers off between 11th and 12th grades. This shows that young people continue to take up tobacco from grade 6 through grade 11.
Comparing Tobacco Use by Grade in 2003 and 2005

Ever tobacco use was lower in all grades in 2005 than in 2003. Current tobacco use was higher in all grades in 2005 than in 2003. Frequent tobacco use rates were about the same in all grades in 2003 and 2005.


The most recent national student tobacco survey data available are for the 2004 National Youth Tobacco Survey conducted by the Centers for Disease Control. The national survey uses the same core questions as Arizona YTS. Overall, current use rates reported nationally among students were similar to rates reported in Arizona. In 2004, the national rate for current use of any tobacco product among middle school students was 12 percent. The current use rate for Arizona’s middle school students in 2005 was 17 percent. Current use rates for specific tobacco products among Arizona middle school students were nearly identical to the rates reported nationally (Figure 8).
Figure 8. Comparing Arizona Middle School Students’ Self-reported Current Tobacco Use with National Rates

![Comparing Arizona Middle School Students' Self-reported Current Tobacco Use with National Rates](image)

Figure 9 below shows that the current use rate for any tobacco product among Arizona high school students in 2005 was 33 percent compared to 28 percent nationally for high school students in 2004. The national rate for current cigarette use was 22 percent nationally for high school students in 2004, compared to 20 percent for high school students in Arizona in 2005. Comparison rates for other tobacco products are also presented in Figure 9.

Figure 9. Comparing Arizona High School Students’ Self-reported Current Tobacco Use with National Rates

![Comparing Arizona High School Students' Self-reported Current Tobacco Use with National Rates](image)

(Note: In Figures 8 and 9, it is not clear if national rates include hookah smoking because students were asked about smoking tobacco in a pipe. In Arizona, students were asked about pipe and hookah smoking separately.)
Students Reporting Ever, Current and Frequent Tobacco Use by Gender
In 2005, ever, current, and frequent tobacco use rates were higher for male students in middle school than for female students. The differences in use rates were three to four percent. In high school, ever use rates were similar for males and females, but current and frequent use rates were higher for males by five percent (Figure 10).

Figure 10. Students Reporting Ever, Current, and Frequent Tobacco Use by Gender, YTS 2005

Use of Specific Tobacco Products by Gender
Figures 11 and 12 present current use rates by gender for specific tobacco products. In middle school, the only product having higher use rates for males (7%) than females (3%) is cigar/illos (Figure 11). Among high school current users, males show higher use rates that females for cigar/illo (20% compared to 11%), smokeless (6% compared to 2%), and pipe/hookah (10% compared to 6%, Figure 16). Cigarette use is similar for males (21%) and females (19%, Figure 12).
Figure 11. Middle School Students’ Current Use of Tobacco Products by Gender, YTS 2005

Figure 12. High School Students’ Current Use of Tobacco Products by Gender, YTS 2005
Trends in Ever, Current and Frequent Use by Gender
Looking at trends in middle school ever use rates by gender over time, both males and females reported lower rates in 2003 and 2005 than in 2000 (Figure 13). However, current and frequent use rates in both males and females in middle school remained stable over time.

In high school, male and female ever use rates remained stable from 2003 to 2005 (data for 2000 are not available). However, both male and female current use rates increased from 2003 to 2005 (five percent for males and eight percent for females). Frequent use rates increased slightly for both males and females (2% each, Figure 14).
Tobacco Use Rates by Race/Ethnicity

There are important differences in ever, current and frequent tobacco use rates across racial/ethnic groups (see Figures 15 to 17 below). Findings for Asians and Hawaiian or Pacific Islanders are not reported due to low numbers of respondents.

American Indian students reported the highest use of tobacco in middle and high school for both ever and current use, and for frequent use in high school. The ever tobacco use rate for American Indians in middle school was higher by 18 percent than for any other ethnic group (55%), and was higher by 14 percent than for any other ethnic group in high school (76%). Current tobacco use rates were higher by nine percent in middle school (37%) and higher by 13 percent in high school (51%) than for any other ethnic group. Frequent use rates were higher by two to three percent than for any other racial/ethnic group in high school (17%).

It is important to recognize, however, that any use of tobacco for traditional or ceremonial purposes by American Indians was not recorded in the survey and may be contributing to these rates. In addition, the sample of American Indian students was small, and was located mostly in urban areas.

Current tobacco use rates were lowest for Whites (12%) in middle school. In high school, current use rates were lowest among African American/Blacks (26%). Hispanics (31%) and Whites (32%) showed similar rates.

Frequent use rates were lowest among Hispanics (3%) and Whites (3%) in middle school, and among Hispanics (7%) in high school.
Figure 15. Students’ Self-reported Ever Use of Tobacco by Race/Ethnicity, YTS 2005

Figure 16. Students’ Self-reported Current Use of Tobacco by Race/Ethnicity, YTS 2005

Figure 18 presents trends in current tobacco use rates for middle school students between 2000 and 2005. Overall, current tobacco use rates among middle school students decreased slightly for Whites (from 15% to 12%), remained stable for Hispanics (18% to 17%), increased slightly for African American/Blacks (18% to 20%) and increased considerably for American Indians (32% to 37%).
Figures 19 presents trends in current tobacco use rates for high school students between 2003 and 2005. Current use rates were higher for Whites (27% to 32%) and Hispanics (22% to 31%). Rates did not increase for American Indians and African American/Blacks.

Figure 19. High School Students Reporting Current Use of Tobacco by Race/Ethnicity, YTS 2003, 2005

Cigarette Smoking Prevalence Rates
This section of the report provides information on cigarette smoking only (no other tobacco products).

Figure 20 presents ever, current and frequent smoking rates for middle and high school students for 2003 and 2005. Ever smoking rates have decreased for middle and high school students since 2003. Current smoking rates have remained stable for middle and high school students, as have frequent smoking rates.
Figure 20. Middle and High School Students Reporting Ever, Current and Frequent Smoking, YTS 2003 & 2005

![Bar chart showing smoking rates for middle and high school students in 2003 and 2005.](chart.png)

Figure 21 presents current smoking rates by grade. Current smoking ranges from four percent in grade 6 to 18 percent in grade 12, which is slightly lower than the rates reported in grades 10 (19%) and 11 (20%).

Figure 21. Students’ Self-Reported Current Cigarette Smoking by Grade, YTS 2005

![Line graph showing self-reported current smoking rates by grade.](chart.png)
Table 6 presents current smoking rates by gender. In both middle and high school, current smoking rates are very similar for males and females.

Table 6. Students’ Self-Reported Current Smoking by Gender

<table>
<thead>
<tr>
<th></th>
<th>Middle School</th>
<th>High school</th>
</tr>
</thead>
<tbody>
<tr>
<td>Female Current Smokers</td>
<td>7%</td>
<td>19%</td>
</tr>
<tr>
<td>Male Current Smokers</td>
<td>9%</td>
<td>21%</td>
</tr>
</tbody>
</table>

Table 7 presents current smoking rates by race/ethnicity. In middle school, current smoking rates for Whites (6%), Hispanics (8%) and African American/Blacks (9%) were lower than rates reported by American Indians (22%).

In high school, African American/Blacks (14%) reported lower rates than Hispanics (18%) and Whites (21%). The highest rates were reported by American Indians (38%) and may include uses for traditional or ceremonial purposes that are not identified in the survey.

Table 7. Students’ Self-Reported Current Smoking by Race/Ethnicity

<table>
<thead>
<tr>
<th></th>
<th>Middle School</th>
<th>High school</th>
</tr>
</thead>
<tbody>
<tr>
<td>White</td>
<td>6%</td>
<td>21%</td>
</tr>
<tr>
<td>Hispanic</td>
<td>8%</td>
<td>18%</td>
</tr>
<tr>
<td>American Indian/Alaska Native</td>
<td>22%</td>
<td>38%</td>
</tr>
<tr>
<td>African American/Blacks</td>
<td>9%</td>
<td>14%</td>
</tr>
</tbody>
</table>

Trends in Cigarette Smoking, YTS 2000, 2003 and 2005

In Middle and High School
Trends in current cigarette smoking show a decrease in middle school from 11 percent in 2000 to eight percent in 2005 (Figure 22). In high school, rates for 2003 and 2005 remained stable at about 20 percent (data for 2000 are not available).
By Gender
Trends in current smoking rates by gender show that fewer females in middle school reported smoking in 2005 (7%) than in 2000 (11%). Rates for males dropped slightly in middle school after 2000, but remained stable from 2003 to 2005, at nine percent. In high school, rates for males remained stable at around 20 percent, but female rates were slightly higher (19 vs. 18 percent in 2005, Figure 23).
By Race/Ethnicity

Middle School
In middle school current smoking decreased among Whites, Hispanics, and African American/Blacks (Figure 24).

Figure 24. Middle School Students Reporting Current Cigarette Use by Race/Ethnicity, YTS 2000, 2003, 2005

<table>
<thead>
<tr>
<th>Race/Ethnicity</th>
<th>2000</th>
<th>2003</th>
<th>2005</th>
</tr>
</thead>
<tbody>
<tr>
<td>White</td>
<td>10</td>
<td>7</td>
<td>6</td>
</tr>
<tr>
<td>Hispanic</td>
<td>13</td>
<td>9</td>
<td>8</td>
</tr>
<tr>
<td>American Indian/Alaska Native</td>
<td>19</td>
<td>22</td>
<td>22</td>
</tr>
<tr>
<td>African American/Black</td>
<td>13</td>
<td>13</td>
<td>9</td>
</tr>
</tbody>
</table>

High School
In high school, current smoking rates remained stable from 2003 to 2005 among Whites, Hispanics, and African American/Blacks. Rates were slightly lower among American Indian/Alaska Natives, but not dependably so (Figure 25).
2.2. Access to Cigarettes and Other Tobacco Products

How and Where Students Reported Getting Tobacco
Youth access to tobacco products has been a major focus of concern in tobacco control efforts across the country. Federal and state laws in Arizona make it illegal for merchants to sell tobacco to youth under 18. Nonetheless, students in Arizona are able to get tobacco from multiple sources, both social and commercial.

Figure 26 presents data on ways that current cigarette smokers under 18 reported getting their cigarettes. The majority of current smokers reported getting their cigarettes from social sources, such as bumming them from a friend, or bumming them from a family member. Borrowing or bumming from a friend was more common than from a family member, and friends under 18 were the most common social source (MS = 25%, HS = 22%). Paying for cigarettes (i.e. using money to purchase them) was reported by eight percent of middle school current smokers and 20 percent of high school current smokers. However, the largest single source for obtaining cigarettes for middle school smokers was “some other way”, that is, a way not included in the answer options. Eighteen percent of high school smokers also reported getting them “some other way”. Surveillance surveys like the YTS have not been successful at identifying all the sources youth have for obtaining cigarettes. This indicates a need to conduct qualitative research, such as interviews and focus groups with youth to help identify alternative sources.
Figure 26. How Current Smokers under 18 Reported Getting Cigarettes, YTS 2005

Figure 27 presents data on how current users of tobacco products other than cigarettes acquired them. The answer option from the previous question “I paid for them” was divided into two separate responses for this question: “I bought them in a store such as a gas station, convenience store, grocery store or drugstore” and “I gave someone else money to buy them for me”.

Social sources remain high in both middle (53%) and high school (40%). Borrowing or bumming tobacco from a friend or family member under 18 (26%) was the method reported most frequently by middle school current tobacco users. Giving someone else money to buy tobacco (26%) was the method reported most frequently by high school current tobacco users. In terms of buying tobacco, both middle and high school current tobacco users were more likely to give someone else money to buy tobacco (MS=16%, HS=26%) than to buy it in a store (MS = 12%, HS = 18%). About one-fifth of middle school students (20%) reported getting tobacco “some other way”. This was true for 16 percent of high school students.
Where Current Smokers Buy Cigarettes

Figure 28 presents data about where current cigarette smokers in middle and high school buy cigarettes, including social and commercial sources. These data present responses only for current smokers who reported that they bought cigarettes during the past 30 days. The majority of high school students under 18 either bought cigarettes in a store, such as a gas station, convenience store, grocery store or drug store (24%) or they gave someone else money to buy them (32%). Middle school students reported buying cigarettes from someone they know under 18 (18%), giving someone else money to buy them (23%), from a store (12%) or from someone over 18 (12%). However, many reported buying cigarettes some other way (31%). Very few current smokers reported buying on the internet (MS = 1%, HS = 1%).
Looking more closely at the stores where current smokers reported buying cigarettes during the past 30 days, gas stations and convenience stores ranked highest among high school smokers, followed by “other” stores and tobacco shops. For middle school smokers “other” stores, gas stations, and tobacco shops ranked highest (Figure 29).

Figure 29. Store Types Where Current Smokers under 18 Bought Cigarettes from a Store during the Past 30 Days Reported Buying Them, YTS 2005
When comparing data from 2000 to 2005 on stores where middle school current smokers reported buying cigarettes, few differences exist other than gas stations increasing over time and the identification of tobacco shops as an additional commercial source (16% reporting buying there in 2005, Figure 30). The “other” places category remains high and unexplained. For high school smokers (Figure 31) responses are similar in 2003 and 2005, with tobacco shops again identified as a commercial source (for 13% in 2005). Gas stations and convenience stores were highly ranked in both years.

**Figure 30. Store Types Where Current Smokers Under 18 Who Bought Cigarettes Reported Buying during the Past 30 Days, Comparing YTS 2000, 2003 & 2005 Middle School Students**
Vendors Requesting Proof of Age
To get a sense of the extent of merchant compliance with statutes forbidding the sale of tobacco to underage youth, the students were questioned on whether they were asked to show proof of age when they bought or attempted to buy cigarettes in a store during the past 30 days. Among current smokers who reported buying cigarettes in a store during the past 30 days, 71 percent of middle school students and 64 percent of high school students reported they were not asked to show proof of age (Figure 32).
Students were also asked if someone in a store refused to sell them cigarettes during the past 30 days because of their age. Seventy-five percent of high school students and 64 percent of middle school students who attempted to buy cigarettes in a store during the past 30 days reported that no one refused to sell them cigarettes because of their age (Figure 33).
Comparing data from 2000 to 2005, among the students who bought or attempted to buy cigarettes in a store, reported requests for proof of age for middle school cigarette purchasers increased from 13 percent in 2000 to 29 percent in 2005. Student reports of sales refusals were 24 percent in 2000, increased to 39 percent in 2003 and decreased to 25 percent in 2005 (Figure 34).

Figure 34. Proof of Age Request and Sale Refusal to Current Smokers under 18 Who Bought Cigarettes from a Store during the Past 30 Days, YTS 2000, 2003 & 2005 Middle School Students

Data from high school cigarette purchasers show that, from their reports, the request for proof of age was lower in 2005 (36%) than in 2003 (55%), and sales refusals were slightly higher in 2005 (36%) than in 2003 (33%).

Figure 35. Proof of Age Request and Sale Refusal to Current Smokers under 18 Who Bought Cigarettes from a Store during the Past 30 Days, YTS 2003 and 2005 High School Students
2.3. Influence of the Media

The American Legacy Foundation, the Campaign for Tobacco Free Kids, and other organizations have devoted considerable energy and resources to gain a better understanding of the impact of the media, especially tobacco companies’ advertising campaigns, on young people taking up tobacco and on their smoking behaviors. The questions related to media on the YTS do not provide comparable scope or depth of information on this subject, but they do give us an indication of the relationship between students viewing smoking in the media, using articles with tobacco branding, hearing messages in the media on the dangers of tobacco use and their smoking behaviors.

In addition to being the target of direct marketing on the part of tobacco companies, youth are exposed to adult smoking in the mass media, especially on television and in the movies. Viewing admired television, sports, and movie stars using tobacco is believed to present an influential role model promoting tobacco use to youth. In this survey, students were asked how often they saw actors and athletes using tobacco on television and/or in the movies when they watched them. The majority reported seeing actors use tobacco some or most of the time: 79% of middle school students and 83% of high school students. Far fewer students reported seeing athletes use tobacco some or most of the time: 27% of middle school students and 23% of high school students.

However, how much influence seeing actors and athletes use tobacco has on students’ tobacco use is not clear. In the YTS, never smokers reported slightly lower levels (79%) of seeing actors on TV and in the movies use tobacco some or most of the time than ever smokers (85%) and current smokers (84%, Figure 36). About the same differences were reported about seeing athletes use tobacco some or most of the time among never smokers (23%), ever smokers (28%) and current smokers (30%, Figure 37).

Figure 36. Percent of Students Who Reported Seeing Actors Use Tobacco Some or Most of the Time on TV or in the Movies, YTS 2005

<table>
<thead>
<tr>
<th></th>
<th>Percent of Students Who Reported Seeing Actors Use Tobacco Some or Most of the Time on TV or in the Movies, YTS 2005</th>
</tr>
</thead>
<tbody>
<tr>
<td>never smoker</td>
<td>79</td>
</tr>
<tr>
<td>ever smoker</td>
<td>85</td>
</tr>
<tr>
<td>current smoker</td>
<td>84</td>
</tr>
</tbody>
</table>
Figure 37. Percent of Students Who Reported Seeing Athletes Use Tobacco Some or Most of the Time on TV, YTS 2005

![Bar chart showing the percent of students who reported seeing athletes use tobacco some or most of the time on TV, YTS 2005](image)

However, there is evidence that counter marketing campaigns in the media may influence students’ views about tobacco use. Counter marketing campaigns are conducted locally and nationally to educate youth about the dangers of tobacco use. Arizona students were asked whether they had seen or heard commercials about the dangers of cigarette smoking on TV, the Internet, or the radio during the past 30 days. About 33 percent of middle school students and 34 percent of high school students said they had seen or heard commercials daily, almost daily or more than once per day during the past 30 days. However, about 35 percent of middle school students and 26 percent of high school students said they had not seen or heard any ads during the past 30 days. So, while many students are seeing and hearing ads fairly regularly, there are quite a few students who are not receiving messages about the dangers of tobacco in the media on a regular basis.

Figure 38. Percent of Students Who Reported They Had Seen or Heard Commercials on TV, the Internet, or on the Radio about the Dangers of Cigarette Smoking Almost Daily, Daily, or More than Once Per Day During the Past 30 Days, YTS 2005

![Bar chart showing the percent of students who reported seeing commercials about the dangers of cigarette smoking during the past 30 days, YTS 2005](image)
For those students who reported they had seen or heard ads, it is important to know if the ads had any effect. Among the students who reported seeing or hearing ads during the past 30 days, 62 percent in middle school and 52 percent in high school reported that the commercials had definitely or probably changed the way they feel about using tobacco. Looking at the rates across never, ever, and current smokers, 60 percent of never smokers, 52 percent of ever smokers and 44 percent of current smokers said that the ads changed the way they feel about using tobacco (Figure 39). That is, the ads had a positive impact on a number of students in all groups, but less on current smokers than ever or non-smokers. This suggests that there is an opportunity to provide continuous, regular messaging about the harms of tobacco that may be effective in contributing to changing social norms for youth over time. Ever and current smokers show more resistance to the impact of the messages than never smokers, but a continuous messaging strategy using multiple sources, including influential role models, may be worthwhile.

Figure 39. Percent of Students Who Reported that Commercials Seen or Heard Definitely or Probably Changed the Way They Feel About Using Tobacco, YTS 2005

![Bar chart showing the percent of students who reported that commercials definitely or probably changed the way they feel about using tobacco, broken down by never, ever, and current smokers. The rates are 60% for never smokers, 52% for ever smokers, and 44% for current smokers.]

Tobacco companies target youth with advertising paraphernalia such as lighters, t-shirts, hats and sunglasses. The appeal of these items is much stronger among ever and current smokers than never smokers. Only 16 percent of never smokers reported they would definitely or probably use or wear something with a tobacco company name or picture on it. In contrast, this was true for 46 percent of ever smokers and 53 percent of current smokers (Figure 40). Counter marketing campaigns might be helpful in reducing this appeal.
Figure 40. Percent of Students Who Reported They Would Definitely or Probably Use or Wear Something That Has a Tobacco Company Name or Picture on It, YTS 2005

<table>
<thead>
<tr>
<th>Category</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>never smoker</td>
<td>16</td>
</tr>
<tr>
<td>ever smoker</td>
<td>46</td>
</tr>
<tr>
<td>current smoker</td>
<td>53</td>
</tr>
</tbody>
</table>
3. CESSATION

This section of the report presents data on current smokers’ responses to questions about quitting. The number of respondents is included in each graph since current smokers are a subset of the total sample.

3.1. Desire to Quit and Quit Attempts

In 2005, about half of the current smokers in middle and high school reported that they want to quit smoking cigarettes (about 52%, Figure 41). Supportive evidence of this desire is presented in Figure 42, which shows that just under half the current smokers reported they had actually tried to quit smoking during the past twelve months (45% of current smokers in middle and high school). These findings are identical to what was reported by current smokers in 2003.

*Figure 41. Percent of Current Smokers Who Reported Wanting to Stop Smoking, YTS 2005*
When asked how many times in their lifetime they had tried to quit smoking, close to half of current smokers reported none (MS = 44%, HS = 48%). Twenty-six percent of middle school and 18 percent of high school current smokers reported trying to quit once. About 30 percent in middle school and 33 percent in high school had tried to quit two or more times (Figure 43). While many students report multiple quit attempts, success at quitting once they have reached current smoking status appears to be difficult, as it is for adults.
3.2. **Perception That They Would be Able Quit Smoking Now**

Despite the fact that many reported they had resumed smoking shortly after attempting to quit, 71 percent of middle school current smokers and 85 percent of high school current smokers reported that they would be able to quit smoking now if they wanted to (Figure 44). Tobacco prevention specialists believe this perception reflects students’ unrealistic assessment of the difficulty of quitting smoking (demonstrated above), and their ability to convince themselves that they are not truly addicted. It is possible that once they reach the “current smoking” stage, which for many means a dosage of nicotine at more regular intervals, it is harder to go back to irregular or occasional smoking, or to no smoking at all.

*Figure 44. Percent of Current Smokers Who Think They Would Be Able to Quit Smoking Cigarettes Now if They Wanted to*

<table>
<thead>
<tr>
<th>Percent of Current Smokers Who Think They Would Be Able to Quit Smoking Cigarettes Now if They Wanted to YTS 2005 (N = 848)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Yes</strong></td>
</tr>
<tr>
<td>Middle School</td>
</tr>
<tr>
<td>High School</td>
</tr>
</tbody>
</table>

3.3. **Know Where to Get Help to Quit**

About half of the current smokers in middle and high school reported they knew of a place to get help to quit smoking (Figure 45).
Figure 45. Percent of Current Smokers Who Know of a Place to Get Help to Quit Smoking, YTS 2005

![Bar chart showing percent of current smokers who know of a place to get help to quit smoking by school level (N = 844).]

3.4. **Have Participated in a Quit Program**

Few current smokers reported they had ever participated in a quit tobacco program (MS = 9%, HS=12%, Figure 46).

Figure 46. Percent of Current Smokers Who Reported Ever Participating in a Quit Program, YTS 2005

![Bar chart showing percent of current smokers who reported ever participating in a quit program by school level (N = 941).]
3.5. **Use of Patch or Nicotine Gum**

Fewer than 10 percent of current smokers said they had ever used the patch or nicotine gum to help them quit smoking (Figure 47). There is no consensus in the tobacco cessation literature or the medical community about the use of nicotine replacement therapy by teenagers.

*Figure 47. Percent of Current Smokers Who Reported Ever Using The Patch of Nicotine Gum to Help Them Quit Smoking, YTS 2005*
4. SECONDHAND SMOKE

Secondhand smoke contains cancer causing chemicals and contributes to numerous diseases in both adults and children. The impact of secondhand smoke on young people’s health is heightened due to their ongoing physiological development. Young people are particularly vulnerable to exposure to secondhand smoke at home and in cars.

4.1. Exposure in Rooms and Cars

Students were asked on how many of the past seven days they had been in the same room or the same car with someone who was smoking cigarettes. Among middle school students 45 percent reported exposure to cigarette smoke at least once in a room during the past week, and 32 percent reported exposure at least once in a car. Among high school students, 56 percent reported exposure to cigarette smoke in a room at least once during the past week, and 40 percent reported exposure in a car at least once (Figure 48).

Repeated exposure in a room (three or more times in the past week) was reported by 33 percent of middle school students and 42 percent of high school students. Repeated exposure in a car was reported by 17 percent of middle school students and 22 percent of high school students.

Figure 48. Exposure to Secondhand Smoke in Rooms and Cars, YTS 2005

![Exposure to Secondhand Smoke in Rooms and Cars](image)

Figure 49 compares exposure to secondhand smoke between students who live with a smoker and those who do not. Differences in exposure rates between the two groups are high. One exposure in a room during the past seven days was reported by 74 percent of students living with a smoker compared to 35 percent of students not living with a smoker. One exposure in a car during the past seven days was reported by 64 percent of those living with a smoker compared to 18 percent of those who do not.
The difference in multiple exposures in rooms and cars is particularly pronounced. Exposure three or more times in a room was reported by 54 percent of those who live with a smoker compared to 12 percent of those who do not. Multiple exposures in a car were reported by 42 percent of those living with a smoker and six percent of those who do not.

Figure 49. Exposure to Secondhand Smoke in Rooms and Cars Comparing Students Who Live With a Smoker and Those Who Do Not, YTS 2005

<table>
<thead>
<tr>
<th></th>
<th>Live with a Smoker</th>
<th>Do Not Live with a Smoker</th>
</tr>
</thead>
<tbody>
<tr>
<td>at least once during the past 7 days in a room</td>
<td>74</td>
<td>35</td>
</tr>
<tr>
<td>at least three times during the past 7 days in a room</td>
<td>54</td>
<td>12</td>
</tr>
<tr>
<td>at least once during the past 7 days in a car</td>
<td>64</td>
<td>18</td>
</tr>
<tr>
<td>at least three times during the past 7 days in a car</td>
<td>42</td>
<td>6</td>
</tr>
</tbody>
</table>

4.2. **Comparing Exposure Rates from 2003 to 2005**

Reports of exposure rates among middle school students in 2005 were slightly lower in three categories than they were in 2003. Reports of exposure at least once in a room were 49 percent in 2003 and 45 percent in 2005. Reports of single exposure in a car were lower by three percent (35% to 32%) and multiple exposures in a car were lower by five percent (22% to 17%). Multiple exposures in a room were higher by four percent (Figure 50).
Among high school students, multiple exposures in a room increased by 7% between 2003 and 2005, from 35 to 42 percent. Multiple exposures in a car remained stable at 22 percent. Single exposure in a room decreased by four percent, from 60 to 56 percent, and single exposure in a car remained stable (Figure 51).

Figure 51. Exposure to Secondhand Smoke in Rooms and Cars, Comparing High School Students in YTS 2003 and 2005
When comparing exposure rates of students living with a smoker from 2003 to 2005, rates for a single exposure in a room decreased slightly (by three percent) and single exposure in a car remained stable. Multiple exposures in a room decreased by four percent and multiple exposures in a car remained stable (Figure 53).

*Figure 52. Exposure to Secondhand Smoke in Rooms and Cars among Students Living with a Smoker, Comparing YTS 2003 and 2005*

From 2003 to 2005, exposure rates of students *not* living with a smoker decreased more for exposures in a room (by eight percent for single exposure and five percent for multiple exposures) than in a car (by two percent for single and multiple exposures, Figure 53).
Figure 53. Exposure to Secondhand Smoke in Rooms and Cars among Students Not Living with a Smoker, Comparing YTS 2003 and 2005

### 4.3. Rules about Smoking in the Home

This is a new question added to the 2005 YTS to gain more information from students about whether and where smoking is allowed in the home. Over half of middle school (58%) and high school students (55%) reported that smoking is not allowed anywhere inside their home. Just over one-third of middle and high school students (34% each) reported that smoking is allowed in some places or at some times in their home. Nine percent of middle school students and 11 percent of high school students reported that smoking is allowed anywhere in their home (Figure 54).
Rules about smoking in the home vary considerably with or without the presence of a smoker in the home. Seventy-two percent of students who do not live with a smoker reported that smoking is not allowed anywhere in the home. Only 30 percent of students who live with a smoker reported that smoking is not allowed anywhere in the home (Figure 55). This is extremely important because it demonstrates that there is an opportunity to educate parents who smoke at home about the risks of secondhand smoke to their children. Parents who smoke at home could be targeted with media campaigns to implement smoking bans in their homes. Smoking bans may provide an extra incentive for their children not to take up smoking or at least not to smoke inside the home.
4.4. **Students Bothered by Other People’s Cigarette Smoke**

A new question was added to the 2005 YTS regarding students’ reactions to smoke from other people’s cigarettes. Most students (74%) reported that they were definitely or probably bothered by other people’s cigarette smoke. Among students not living with a smoker, 80 percent reported they were bothered by other people’s cigarettes smoke (68% definitely and 12% probably). This was true for 66 percent of students living with a smoker (52% definitely and 14% probably).

Responses were quite different for students who are current smokers. Only 35 percent of current smokers reported that other people’s cigarette smoke definitely or probably bothered them, compared to 81 percent of non-smokers.
5. DISCUSSION OF FINDINGS

5.1. Prevention: Tobacco Use, Access to Tobacco Products and the Influence of the Media

There are mixed results in trends regarding tobacco use rates among middle and high school students since 2000, the first year of the YTS.

Ever tobacco use (trying any form of tobacco sometime in one’s life) is going down. Ever tobacco use (or lifetime use rates for all tobacco products combined) has decreased for middle school students from 46 percent in 2000 to 31 percent in 2005, a decrease of 33 percent. The rates for high school students decreased from 62 percent in 2003 to 57 percent in 2005, a decrease of nine percent. This suggests that experimentation with tobacco products has decreased in recent years.

Current tobacco use (using any form of tobacco even minimally at least once during the past 30 days) has remained stable since 2000 for middle school students, but has increased for high school students from 26 percent in 2003 to 33 percent in 2005. Because current use included students who used tobacco only once during the past month, it is important to recognize that all current users were not necessarily regular users.

Frequent tobacco use (using on 20 or more of the past 30 days) was stable. It is fair to assume that frequent users (three percent of middle school students and nine percent of high school students) are approaching addiction or are already addicted to tobacco.

Current smoking rates have declined slightly among middle students (from 11% in 2000 to 8% in 2005) but have remained constant in high school students since 2003 (at about 20%).

Data from other Arizona youth surveillance instruments allow for examination of longer-term trends (see Appendix). Among high school students current smoking declined from 31 percent in 1997 to 20 percent in 2005, a decrease of 35 percent. Rates for middle school students have declined from 19 percent in 1997 to 8 percent in 2005, a decrease of over 50 percent. Current smoking has decreased substantially since 1995, but rates have not decreased noticeably since 2002.

A look at prevalence by race/ethnicity across YTS surveys (2000 to 2005) shows that rates have not changed markedly for any particular group (the numbers sampled for Asians and Hawaiian/Pacific Islanders are too small to give reliable estimates). Whites, Hispanics, and African American/Blacks in middle school show slight declines in current smoking across the three surveys. Small increases appear regarding overall tobacco use by American Indians in middle school and Whites and Hispanics in high school. Current smoking rates by ethnic group show little change in high school.

Regarding tobacco use by gender for all products, females have slightly lower use rates than males. However, proportional shifts in tobacco use by gender are not occurring. Ever tobacco
use went down for both males and females in middle school, but current use remained stable. In high school, ever use remained stable and current use increased for both males and females. Current smoking may have decreased slightly for both males and females in middle school and remained stable for both in high school.

Although much progress has been made over the past ten years in curbing tobacco use, current use rates have stabilized in the past two to three years. One of the most important trends in the data shows that current tobacco use rates (including smoking) jump substantially from middle to high school. This is not a new development. When looking at the trend by grade, current tobacco use and smoking rates increase incrementally at each grade level. That is, as students get older, more take up tobacco and use it on a regular basis. This indicates that opportunities continue to exist beyond middle school and into high school to steer young people away from experimentation and regular use of tobacco. It also indicates that providing effective interventions to high school students may be a tough challenge. Curbing tobacco use among high school dropouts is even more difficult.

5.2. Access to Cigarettes and Other Tobacco Products

Students under 18 reported they acquired tobacco products through social sources and social networks more than through commercial venues. Social sources are friends, acquaintances and family members. Commercial venues are stores such as gas stations, tobacco shops, convenience stores, grocery stores and drug stores.

Monetary exchange for tobacco products other than cigarettes was reported by 28 percent of middle school current tobacco users (12 percent reported buying in a store and 16 percent reported giving someone else money to buy tobacco) and 44 percent of high school current tobacco users (18 percent reported buying in a store and 26 percent reported giving someone else money to buy tobacco).

Paying for cigarettes was reported by eight percent of middle school current smokers and 34 percent of high school current smokers. A number of students reported getting cigarettes “some other way,” which may include a monetary exchange.

Although a small proportion of students reported buying cigarettes from commercial sources, only about one-third of those who bought in a store reported they were asked for proof of age or were refused a sale because of their age. A higher proportion of purchasers in high school reported request for proof of age than purchasers in middle school.

Clamping down on tobacco sales to minors in commercial venues is extremely important but will not curtail youth’s access to tobacco as social sources are more difficult to regulate. Conducting inspections of retail tobacco vendors that are close to schools and to places where young people congregate may help. Informing the public about the extent and dangers of social sources of tobacco for youth is also needed. Consideration might be given to developing communications that would discourage sales by older to younger persons, or even to friends.
5.3. **Influence of the Media**

About the same proportion of never, ever and current smokers in middle and high school reported seeing actors or athletes use tobacco on TV and in the movies. How much impact this has on their taking up tobacco is not clear, especially when compared to the influence of family and friends. About one third of never, ever and current smokers reported seeing or hearing commercials about the dangers of tobacco on TV, the internet or the radio almost daily, daily or more than once a day. This shows that there is an opportunity to increase the messaging received by many students. Ever and current smokers showed more resistance to changing the way they feel about using tobacco because of the messages, but many students in all groups reported that the messages changed the way they feel about using tobacco: 60 percent of never smokers, 52 percent of ever smokers, and 44 percent of current smokers (close to half of the last category). Ever and current smokers showed much more interest in using or wearing something that has a tobacco company name or logo on it than never smokers (16%). In Arizona, it appears that there is an opportunity to conduct well crafted counter marketing campaigns targeting high school students in particular, since little other prevention programming reaches them.

5.4. **Cessation**

About half of current smokers in middle and high school reported a desire to quit smoking, and just under half reported trying to quit sometime during the past twelve months. About one-third reported two or more quit attempts. Nonetheless, their perceptions about being able to quit now if they wanted to were high (MS = 71%, HS = 85%). About half of current smokers reported knowing of a place to get help quitting. About 10 percent participated in a quit program, and fewer than 10 percent ever used a patch or nicotine gum to help them quit.

If students truly want to quit smoking, they need help to quit successfully. An examination of successful quit programs and approaches to quitting that appeal to youth is in order. In addition, strategies to get smokers who aren’t interested in quitting (about half) to consider it would also be beneficial.

5.5. **Secondhand Smoke**

In 2005, about half of students in Arizona were exposed to secondhand smoke at least once during the week previous to the survey. The frequency of students’ exposure varied substantially with the presence of a smoker in the home. Forty-one percent of students reported living with someone who smokes, that is, about two out of five students. Students living with a smoker reported far higher rates of being exposed to secondhand smoke once or multiple times in a room or a car during the previous week than students not living with a smoker. Rates were reported at two to five times higher, with three-quarters of students living with a smoker exposed at least once in a room during the previous week. Students living with a smoker reported slight decreases in the number of exposures in a room during the past seven days, but not in cars, since 2003.

Rules about smoking in the home also varied substantially based on the presence of a smoker in the home. About one-third of students living with a smoker reported that smoking was not allowed anywhere in their home compared to three-quarters of students not living with a smoker.
This means that two-thirds of students living with a smoker (or about 30 percent of all students) are exposed to secondhand smoke on a regular basis at home.

Most students reported that they are bothered by other people’s cigarette smoke (about three-quarters). However, only about 25 percent of students who were current smokers reported so.

Information about the harms of secondhand smoke is constantly being updated by researchers and scientists. The more that is discovered, especially with regard to children, the more health practitioners and other public officials call for strategies to protect children and youth from secondhand smoke in homes and cars, where they are most likely to be exposed. There are important social and health costs to having large numbers of youth exposed to secondhand smoke. Efforts to get smokers in Arizona to refrain from smoking in the home and in cars would be a good first step to alleviating those costs.

5.6. Survey limitations
There are important limitations to surveillance methodology and to this survey in particular:

1) The prevalence rates reported are based on self-reported behaviors, are estimates and are meant to capture general trends. The most important functions of the survey are to detect general trends and to uncover points of interest for further inquiry and study.

2) The data in this survey are representative of the public school student population. Private schools, parochial schools, juvenile detention centers and other special schools are not included in the survey. This limitation is important because of existing evidence demonstrating that adolescents who are not in school (and those with high numbers of absences) have higher rates of tobacco use than do adolescents who are in school. This is known to be true for high school drop-outs in particular.
ENDNOTES

Current tobacco prevalence rates of youth (in-school youth) in Arizona are based on their reports of having smoked even a single puff of a cigarette during the past 30 days. The trend among high school students between 1995 and 2005 shows that prevalence rates peaked in 1997 at 31 percent, fell to 19 percent in 2004, and remained steady in 2005 at 20 percent (showing no statistically significant change). Among middle school students, prevalence rates peaked in 1997 at 19 percent and declined to eight percent in 2005. Rates for both middle and high school students have remained stable since 2002.

### Arizona Data Sources

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<thead>
<tr>
<th>Year</th>
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<tbody>
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<td>1995 -1999</td>
<td>AZ Substance Abuse Survey (ACJC)</td>
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<tr>
<td>2000</td>
<td>AZ Youth Tobacco Survey (ADHS/ADE/CDC)</td>
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<tr>
<td>2002</td>
<td>Arizona Youth Survey (ACJC)</td>
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</tr>
<tr>
<td>2005</td>
<td>AZ Youth Tobacco Survey (ADHS/ADE/CDC)</td>
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