

# **2006 Iowa Youth Tobacco Survey Full Document Summary**

*A summary report of findings and risks to Iowa youth with  
reference to tobacco products.*

Prepared by:  
Don Shepherd PhD.  
Center for Health Statistics  
Iowa Department of Public Health

For the  
Division of Tobacco Use Prevention and Control  
Iowa Department of Public Health  
Lucas State Office Building  
321 East 12<sup>th</sup> Street  
Des Moines, Iowa 50319  
Bonnie E. Mapes, Division Director

## ***Division Mission***

***To establish a comprehensive partnership among state government,  
local communities, and the people of Iowa to foster a social and  
legal climate in which tobacco use becomes undesirable and  
unacceptable***

## TABLE OF CONTENTS

	Page
List of Figures/Tables . . . . .	3
Acknowledgements . . . . .	4
I. Introduction . . . . .	5
II. Executive Summary . . . . .	7
III. 2006 Iowa Youth Tobacco Survey Findings . . . . .	15
A. Lifetime Tobacco Use Prevalence Rates: <b>Middle and High School (Total and by Sex)</b> . . . . .	15
1. Percent Ever:	
a. Used any tobacco . . . . .	16
b. Smoked Cigarettes . . . . .	16
c. Used Smokeless Tobacco . . . . .	17
B. Current (Past 30 Days) Tobacco Use Prevalence rates:	
<b>Middle and High School(Total and by Sex)</b> . . . . .	18
1. Percent Current (Past 30 Days) Who:	
a. Used any tobacco . . . . .	19
b. Smoked Cigarettes . . . . .	19
c. Smoked Cigars . . . . .	20
d. Used Smokeless Tobacco . . . . .	21
e. Others Used (Pipe Tobacco, Bidis, Kreteks) . . . . .	22
f. Any Tobacco Use by Grade In School . . . . .	23
C. Frequent (20 or More Days of Past 30 Days) Tobacco Use Prevalence Rates: <b>Middle and High School (Total and by Sex)</b> . . . . .	23
1. Percent Frequently (20 or More Days of Past 30 Days):	
a. Smoked Cigarettes . . . . .	24
b. Used Smokeless Tobacco . . . . .	24
D. Tobacco Dependence Prevalence Rates: <b>Middle and High School (Total and by Sex)</b> . . . . .	25
1. Percent Dependent Symptoms:	
a. Smoke 6+ Cigarettes Per Smoking Day . . . . .	25
b. Feel Need to Smoke Every Day . . . . .	25
E. Projected Future Tobacco Use Prevalence Rates: <b>Middle and High School (Total &amp; by Sex)</b> . . . . .	26
1. Percent Who Think Will Definitely/Probably Smoke Cigarettes:	
a. Next Year . . . . .	26
b. Five Years from Present . . . . .	26
F. Second Hand Smoke Exposure: <b>Middle and High School (Total and by Sex)</b> . . . . .	27
1. Percent Who Report:	
a. On 1 or More of Last 7 Days in Same Room with Cigarette Smoker . . . . .	27
b. On 1 or More of Last 7 Days Rode in a Car with Cigarette Smoker . . . . .	27
G. Tobacco Brand Preferences: <b>Middle and High School Current Smokers</b> . . . . .	28
1. Percent Who:	
a. Prefer Tobacco Brands . . . . .	28
b. Usually Smoke Menthol Cigarettes . . . . .	28

## TABLE OF CONTENTS (CONTINUED)

H. Quitting Experiences: <b>Middle and High School Current Smokers (Total and by Sex)</b>	29
1. Percent Who:	
a. Want to Stop Smoking Cigarettes	29
b. Think Could Quit Cigarette Smoking If They Wanted To	30
c. Tried to Quit Smoking at Least Twice	30
I. Purchasing Behavior: <b>Middle and High School Current Smokers/Smokeless Tobacco Users Under the Age of 18 (Total and by Sex)</b>	31
1. Percent Who:	
a. In Past 30 Days Place Usually Bought Cigarettes From	31
b. Place Bought Last Pack of Cigarettes at	31
c. Past 30 Days Bought Cigarettes in Store and Asked Proof of Age	31
d. Past 30 Days Refused Cigarette Purchase Because of Age	31
e. In Past 30 Days Place Usually Bought Smokeless Tobacco	31
J. Tobacco-Related Attitudes: <b>Middle and High School (Total and by Sex)</b>	32
1. Percent Who Probably or Definitely Think:	
a. People Can Get Addicted to Tobacco Just Like Cocaine or Heroin	33
b. Young People Who Smoke Cigarettes Have More Friends	33
c. Smoking Cigarettes Makes Young People Look Cool or Fit In	33
d. Young People Risk Harm if Smoke 1-5 Cigarettes Per Day	34
e. Safe to Smoke a Year or Two, as Long as You Quit After That	34
f. Others Cigarette Smoke is Harmful to Self	34
g. Tobacco Companies Misled Young People	35
K. Tobacco Exposure: <b>Middle and High School (Total and by Sex)</b>	35
1. Percent Who Most/Some of Time:	
a. Watch TV/Movies that Show Actors Using Tobacco	36
b. Watch TV that Shows Athletes Using Tobacco	36
c. When Using Internet, See Internet Ads for Tobacco	36
d. When Go to Store See Tobacco Ads	36
2. Percent Who:	
a. In Past 12 Months Received Anything With Tobacco Company Name/Picture	37
b. Have One or More Smokers Among Four Closest Friends	37
c. Have One or More Smokeless Tobacco Users Among Four Closest Friends	37
d. Live with Someone Who Smokes	37
L. Tobacco Prevention Activity Exposure: <b>Middle and High School Students</b>	37
1. Percent Who:	
a. Have Been Told by a Parent/Guardian of the Dangers of Tobacco Use	37
b. At School Practiced Ways to Say “NO” to Tobacco	37
c. Past 12 Months Part of Community Event Discouraging Tobacco Use	37
d. Have Seen or Heard Anti-Smoking Commercials in Past 30 Days	37
e. Have Seen Anti-Smoking News Stories or Programs on TV	37
f. JEL questions	38
IV. Causes/Implications	13
V. Footnotes	40
VI. Technical Tables	39-40

# LIST OF FIGURES/TABLES

	Page
Figure 1. Ever Use Any Tobacco Products (In Percent)	15
Figure 2. Middle School: Ever Use Any Tobacco Products by Sex (In Percent)	15
Figure 3. High School: Ever Use Any Tobacco Products by Sex (In Percent)	15
Figure 4. Ever Use Cigarettes (In Percent)	16
Figure 5. Middle School: Ever Use Cigarettes by Sex (In Percent)	16
Figure 6. High School: Ever Use Cigarettes by Sex (In Percent)	16
Figure 7. Ever Use Smokeless Tobacco (In Percent)	17
Figure 8. Middle School: Ever Use Smokeless Tobacco by Sex (In Percent)	17
Figure 9. High School: Ever Use Smokeless Tobacco by Sex (In Percent)	17
Figure 10. Current (Past 30 Days) Use of Any Tobacco Products (In Percent)	18
Figure 11. Middle School: Current (Past 30 Days) Use of Any Tobacco Products by Sex (In Percent)	18
Figure 12. High School: Current (Past 30 Days) Use of Any Tobacco Products by Sex (In Percent)	18
Figure 13. Current (Past 30 Days) Cigarette Use (In Percent)	19
Figure 14. Middle School: Current (Past 30 Days) Cigarette Use by Sex (In Percent)	19
Figure 15. High School: Current (Past 30 Days) Cigarette Use by Sex (In Percent)	19
Figure 16. Current (Past 30 Days) Cigar Use (In Percent)	20
Figure 17. Middle School: Current (Past 30 Days) Cigar Use by Sex (In Percent)	20
Figure 18. High School: Current (Past 30 Days) Cigar Use by Sex (In Percent)	20
Figure 19. Current (Past 30 Days) Smokeless Tobacco Use by Sex (In Percent)	21
Figure 20. Middle School: Current (Past 30 Days) Smokeless Tobacco Use by Sex (In Percent)	21
Figure 21. High School: Current (Past 30 Days) Smokeless Tobacco Use by Sex (In Percent)	21
Figure 22. Current (Past 30 Days) Any Tobacco Use by Grade in School (In Percent)	22
Figure 23. Current (Past 30 Days) Any Tobacco Use by Grade in School (In Percent)	23
Figure 24. Frequent (20 or More of Past 30 Days) Cigarette Use (In Percent)	24
Figure 25. Frequent (20 or More of Past 30 Days) Smokeless Tobacco Use (In Percent)	24
Figure 26. In Past 30 Days Smoked 6 or More Cigarettes Per Smoking Day (In Percent)	24
Figure 27. Feel Need a Cigarette Every Day (In Percent)	25
Figure 28. Future Intent to Smoke Cigarettes: Next Year (In Percent)	25
Figure 29. Future Intent to Smoke Cigarettes: In Five Years (In Percent)	26
Figure 30. Second Hand Smoke Exposure: One or More of Last 7 Days in Same Room With Cigarette Smoker (In Percent)	26
Figure 31. Second Hand Smoke Exposure: One or More of Last 7 Days Rode in Car With Cigarette Smoker (In Percent)	27
Figure 32. Current (Past 30 Days) Cigarette Brand Usually Smoked (In Percent)	28
Figure 33. Middle School Current Past 30 Days Smokers: Cigarettes Usually Smoke are Menthol by Sex (In Percent)	28
Figure 34. High School Current Past 30 Days Smokers: Cigarettes Usually Smoke are Menthol by Sex (In Percent)	28
Figure 35. Current (Past 30 Days) Cigarette Smokers: Wants to Stop Smoking Now (In Percent)	29
Figure 36. Current (Past 30 Days) Cigarette Smokers: Think Could Quit if Wanted (In Percent)	29
Figure 37. Current (Past 30 Days) Cigarette Smokers: Tried Quitting Two or More Times (In Percent)	30
Figure 38. Middle School Current (Past 30 Days) Cigarette Smokers: Tried Quitting Two or More Times by Sex (In Percent)	30
Figure 39. High School Current (Past 30 Days) Cigarette Smokers: Tried Quitting Two or More Times by Sex (In Percent)	30
Figure 40. Current (Past 30 Days) Cigarette Smoker Under Age 18: How Usually Get Own Cigarettes (In Percent)	31
Figure 41. Definitely/Probably Think: People Using Tobacco Can Get Addicted Just Like Using Cocaine/Heroin (In Percent)	32
Figure 42. Definitely/Probably Think: Young People Who Smoke Cigarettes Have More Friends (In Percent)	32
Figure 43. Definitely/Probably Think: Smoking Cigarettes Makes Young People Look Cool/Fit In (In Percent)	33
Figure 44. Definitely/Probably Think: Young People Risk Harming Themselves if Smoke From 1-5 Cigarettes Per Day (In Percent)	33
Figure 45. Definitely/Probably Think: Safe to Smoke Only a Year or Two, as Long as Quit After That (In Percent)	34
Figure 46. Definitely/Probably Think: Smoke From Other People's Cigarettes Harmful To You (In Percent)	34
Figure 47. Most/Some of Time Observe Tobacco Users/Ads (In Percent)	35

## LIST OF FIGURES/TABLES (Continued)

Figure 48. Tobacco Exposure (In Percent)	36
Figure 49 Involved in Activities to discourage smoking.	37
Figure 50. Just Eliminate Lies (JEL) Exposure	38
Table 1. Number of Surveys Completed in 2006 Iowa Youth Tobacco Survey	39
Table 2. Selected Tobacco Product Use Prevalence Rates, Including 95% Confidence Intervals (CIs): Middle and High School	39
Table 3. Selected Tobacco Product Use Prevalence Rates, Including 95% Confidence Intervals (CIs): Middle School by Sex	40
Table 4. Selected Tobacco Product Use Prevalence Rates, Including 95% Confidence Intervals (CIs): High School by Sex	40

**Acknowledgements: The successful completion of this project was made possible by the combined efforts of:**

**Selected Iowa high school and middle school administration, staff and students**  
**Iowa community partnership tobacco grantee staff**  
**Centers for Disease Control & Prevention (CDC), Office on Smoking and Health, Atlanta, Georgia**

**Editing and technical support provided by:**  
**Maggie O'Rourke and Sieglinde Prior, Division of Tobacco Use Prevention & Control**  
**Joann Muldoon, Center for Health Statistics and Vital Records, IDPH**

## INTRODUCTION

With funds obtained from the Master Settlement Agreement between the states and tobacco companies, each state in the nation has the opportunity to implement a sustained and comprehensive tobacco control program for their youth. Data collection (a requirement for needs assessment and evaluation) is an integral part of any comprehensive tobacco control program. The Office on Smoking and Health, National Center for Chronic Disease Prevention and Health Promotion, Centers for Disease Control and Prevention (CDC) was assigned the task of coordinating each state's data collection efforts. The CDC developed a core set of questions that would be included in each state's survey of its adolescent population and provided technical assistance to the states regarding sample selection and appropriate data analysis techniques. The Youth Tobacco Surveys were intended to enhance the capacity of each state to design, implement and evaluate comprehensive tobacco control programs.

The 2006 Iowa Youth Tobacco Survey (IYTS) questionnaire included the CDC recommended questions and several state added questions. A copy of the 2006 survey instrument can be obtained by contacting Maggie O'Rourke, Iowa Department of Public Health, Division of Tobacco Use Prevention and Control, Lucas State Office Building, Des Moines, Iowa 50319-0075. The population base (grades 6 through 12) and sampling design recommended by the CDC were also adopted in Iowa. A multistage sampling design was used. The first stage involved a random selection of public schools proportional to their enrollment size, followed by a random selection of classes within each school.

Those students that did choose to participate completed an anonymous and confidential self administered questionnaire that included questions concerning their: demographics (age, sex, grade in school and race/ethnicity), use of tobacco products, second hand smoke exposure, purchasing habits, tobacco-related knowledge and attitudes, tobacco-related media and advertising exposure, and tobacco prevention program exposure.

A total of 65 schools in Iowa were selected to participate in the 2006 IYTS: 25 middle schools (grades 6 through 8) and 40 high schools (grades 9 through 12). Twenty-three of the middle schools and 38 of the high schools provided data (a 92% middle school and 95% high school response rate). Within these schools, students in grades 6 through 12 in the second period classrooms were asked to participate. There were 1,892 middle school students selected to participate and 1,670 (88%) completed a useable questionnaire. There were 2,618 high school students selected to participate and 2,278 (87%) completed a useable questionnaire. The overall response rate, including both schools and students, was 81% for the middle school sample and 83% for the high school sample. The questionnaires were completed September 2006 through the 2006-2007 school years, with the last date of a survey being held in March, 2007.

Weighting is used to help insure that the sample of respondents who actually completed the questionnaire matches the population it was intended to represent. Weighting changes the data in a way that makes the results of data analysis more likely to provide reliable and valid population estimates.

The weighting procedure developed by the CDC for the 2006 IYTS is somewhat complex in terms of its actual mathematical application, but it is relatively simple in terms of its objectives. A weighting factor was applied to each student record (the responses to the 2006 IYTS questionnaire) to adjust for non-response at the school and student level, and for varying probabilities of selection. The weights were then adjusted so that the weighted proportion of

students in each grade and gender matched those proportions in the Iowa student population. While complex in its application, this weighting procedure is simply a method that helps insure, given some assumptions, that the sample of students completing the 2006 IYTS actually matches the population of students it is intended to represent. In short, the tobacco-related prevalence rate estimates obtained from the weighted 2006 IYTS sample are more likely than those based on an unweighted 2006 IYTS sample to match the actual prevalence rates in the total population of 6<sup>th</sup> through 12<sup>th</sup> graders in Iowa.

Unfortunately, the 2006 IYTS sample is too small to provide meaningful county based analyses. Prevalence rate estimates based on samples with less than 50 students are typically untrustworthy. Iowa has 99 counties and a total sample of only 3,946 students in grades 6 through 12 would obviously leave several counties with little or no representation. Even if every county was equally represented, and they are not, there would at best be slightly less than 40 students (3,946 divided by 99) from each county, a number that is considerably below the sample size adequate to produce trustworthy prevalence rate estimates. The 2006 IYTS data do, however, provide a very useful descriptive profile of Iowa's middle and high school, both male and female, students' tobacco-related behaviors and attitudes.

The purpose of this report is to: 1) help tobacco control program planners and administrators more comprehensively identify the extent and kinds of tobacco control program needs in Iowa, and 2) provide data that can be used to make resource allocation decisions that are based on objectively identified needs.

This report is restricted to descriptive profiles, with a focus on identifying middle vs. high school and male vs. female differences. Because all surveys are subject to sampling and measurement error, the differences observed in this report may not be real. Statistical tests of significance can be used as a means to identify real differences, but at this exploratory stage of analysis practical significance is even more important. That is, if the differences observed are not large enough to be of practical consequence (differences large enough to justify resource allocation decisions), then small, but statistically significant differences, are of little value for the purposes of this report.

From both a statistical and practical perspective, the larger the differences observed, the more important those differences are in terms of identifying program needs and making resource allocation decisions. While not binding in any respect in terms of either statistical or practical significance, a couple of general guidelines are offered for the reader's consideration. A 5 percent difference would be a statistically significant difference in most, but not all, instances with samples of the size included in this report. Perhaps 10 percent or larger might be more appropriate for identifying practical significance. Our readers may have a better appreciation of what is of practical significance for a specific purpose, but at least these general criteria provide some guidelines to follow.

In addition, Tables 2 through 4 provide the 95 percent confidence intervals (CIs) for a selected number of the tobacco use prevalence rates reported in this analysis. These confidence intervals mean that we can be 95 percent confident that the actual prevalence rates are within that many percentage points (either larger or smaller) of the observed prevalence rates in this sample. Readers should note that most, but not all, of the confidence intervals are smaller than 5 percent.

Finally, the author of this report has provided some inferences regarding the causes/implications of the differences observed. It must be kept in mind that these inferences are the author's speculations about what might be happening and that others might draw different, but equally valid, inferences from the same observed differences. Also, these inferences are the

sole responsibility of the author and do not necessarily reflect the opinions of the agencies involved in the 2006 Iowa Youth Tobacco Survey.

## *Executive Summary*

This summary highlights the results of the 2006 Iowa Youth Tobacco Survey.

The Iowa Youth Tobacco Survey (IYTS) is conducted every two years and began in 2000. The Iowa Department of Public Health, Division of Tobacco Use Prevention and Control conducted the 2006 IYTS to monitor youth tobacco use and to measure the effectiveness of youth tobacco-use prevention and cessation programs within Iowa.

In the 2006 – 2007 school years, 61 public middle and high schools participated in the IYTS. Of the students participating in the survey, more than 87 % (3,286) of middle and high school students completed a useable questionnaire. In order to guarantee responses by participating students were representative of all middle and high school students in Iowa, weighting methods designed by the Centers for Disease Control and Prevention were used. The reported results fall within 95 % confidentiality ratios. The confidential, anonymous and self-administered survey solicited students' responses on personal demographics, tobacco use, tobacco purchasing options, quit attempts, secondhand smoke exposure, tobacco related media exposure, general attitudes about tobacco and knowledge of the Just Eliminate Lies (JEL) campaign. A comprehensive review of the results is available in the Iowa 2006 Youth Tobacco Survey Report.

Current (past 30 days) cigarette use is reported by 4 % of Iowa's middle school students (grades 6 through 8) and 22.5 % of Iowa's high school students (grades 9 through 12). The percentages of Iowa high school and middle school students who smoke remain below the most recently available national averages for youth smoking. More than half of all middle school and high school students who are current smokers expressed a desire to quit smoking at the time of the interview.

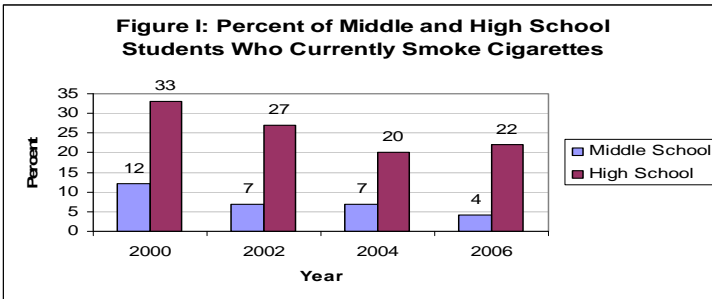
Gas stations are the primary source for high school cigarette purchases. Middle school students reported cigarette purchases were acquired through "other" routes, for example social sources. Iowa has state and federal laws prohibiting the sale of cigarettes to minors. Though Iowa's venter compliance with these laws is 90 %, youth do know where to go to purchase their cigarettes.

The youth-led Just Eliminate Lies (JEL) program has notable success in high schools where more than 73 % of high school students recognize the JEL program and believe it is doing a good job of getting the anti-tobacco message out to youth. The vast majority of those who have heard of JEL believe that it has changed their views of the tobacco industry (76 %). Unfortunately, significantly fewer middle school students have seen or heard of JEL (37 %).

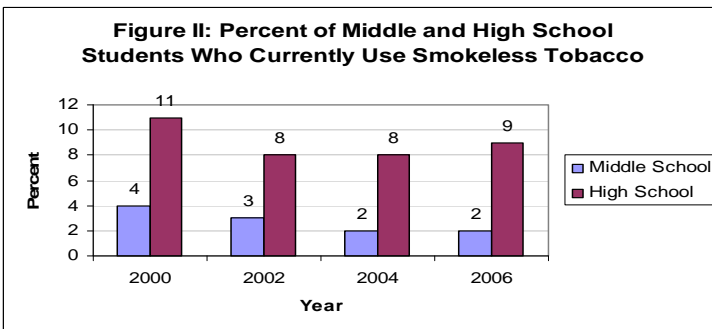
Though high school students did not alter significantly in attitudes about smoking from 2004 (probably think young smokers have more friends, probably thought smoking makes young people look cool, probably think young people risk harm smoking, probably think safe to smoke a year or two), middle school students did indicate lowered belief that young smokers have more friends, smoking makes young people look cool and thinking it is safe to smoke for year or two. More middle school students also reported that young people risk harm when smoking.

## Smoking Prevalence:

To determine the prevalence of tobacco use, students were asked about their use of cigarettes or smokeless tobacco. Students were considered to be current cigarette or smokeless users if they reported using cigarettes or smokeless tobacco within the past 30 days.



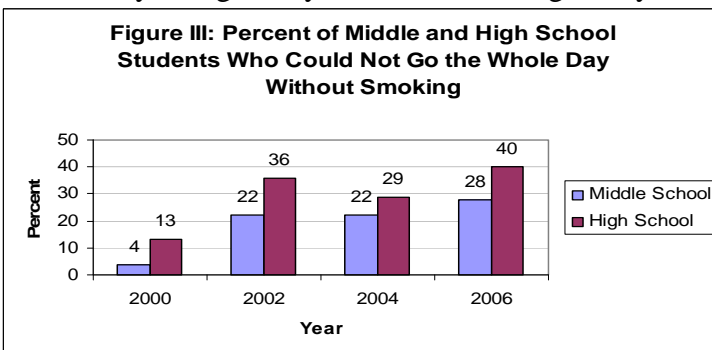
Current cigarette use among high school students has increased slightly since 2004. Middle school students have dropped in cigarette use.



Current smokeless tobacco use in middle school remained the same. High school students slightly increased their use of smokeless tobacco.

## Addiction

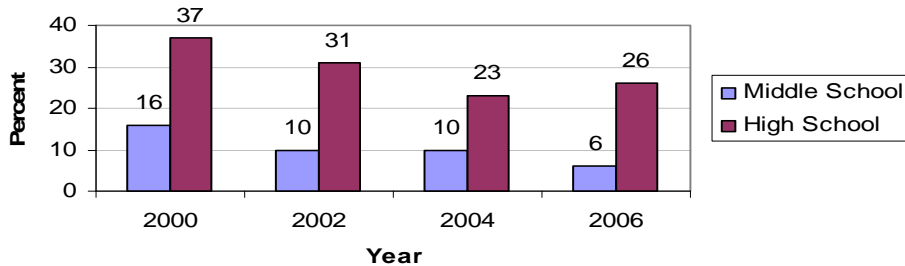
To measure addiction to cigarette smoking and future tobacco use, students who smoked were asked if they thought they could go the whole day without smoking and all students were asked if they thought they would be smoking next year.



The percent of both high school and middle school students who feel like they could not go the whole day without smoking has increased since 2004.

Though quit attempts in the past year have increased (see Figure VI), more high school students report the need to smoke daily and believe they will be smoking in one year. This data may indicate that middle and high school current smokers are becoming addicted at earlier ages.

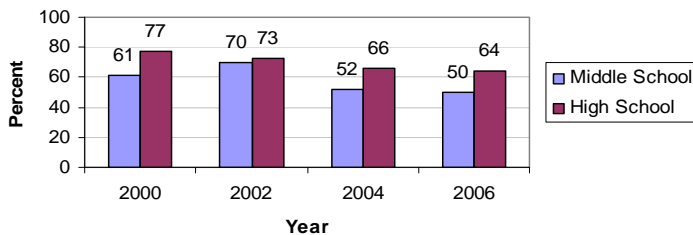
**Figure IV: Percent of Middle and High School Students Who Think They Will Smoke Cigarettes Next Year**



The intention to smoke cigarettes increased for high school students and decreased for middle school students.

## Second Hand Smoke Exposure

**Figure V: Percent of Middle and High School Students Who Spent >1 Day out of 7 in the Same Room With a Smoker**

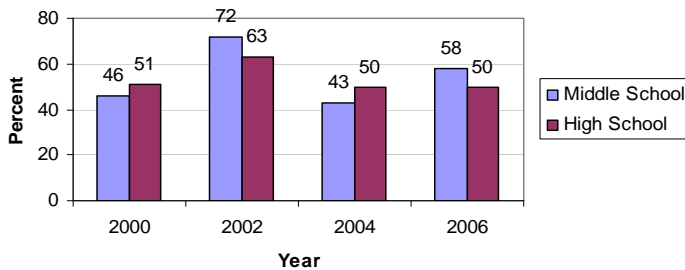


Exposure to secondhand smoke decreased slightly for both groups of students.

## Cessation

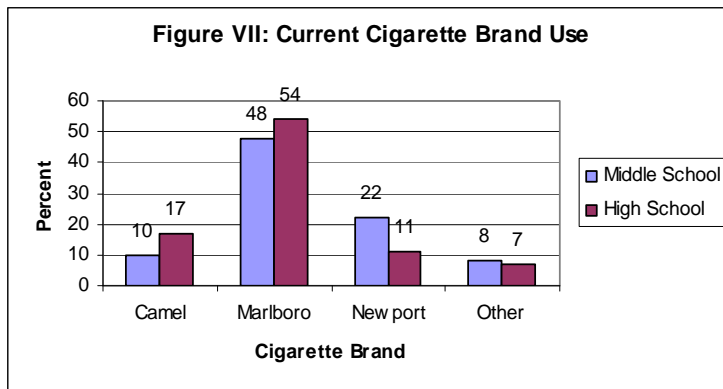
Students were asked if they wanted to or tried to quit smoking within the past 12 months. Almost three fourths of high school smokers and two thirds of middle school smokers think they probably or definitely could quit. Over one fourth have tried to quit two or more times.

**Figure VI: Percent of Middle and High School Students Who Tried to quit in the Past Year**



More middle school students tried to quit in the past year, while high school student quit attempts stayed the same as 2004.

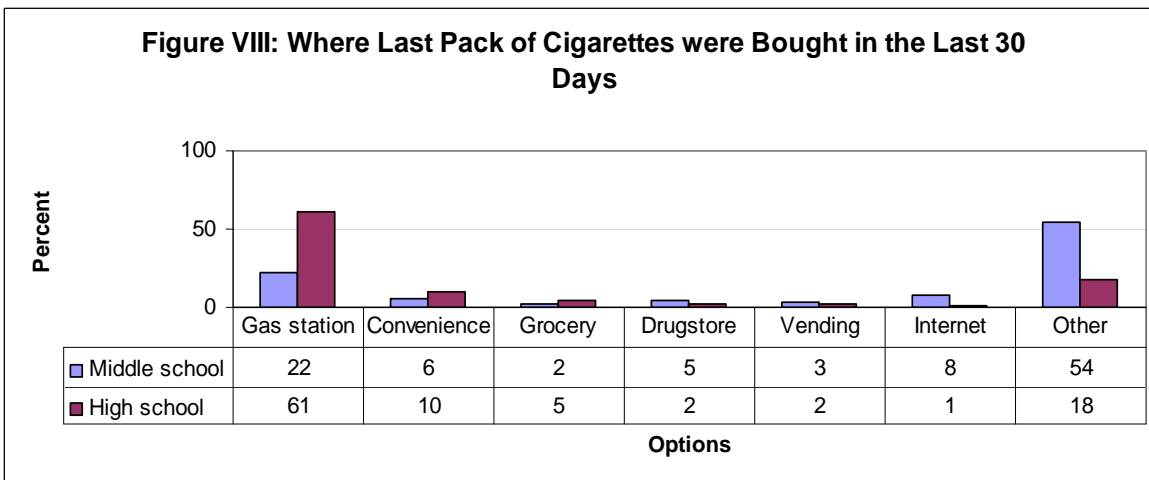
## Current Brand Use



Marlboro is the cigarette brand of choice for both middle and high school students. More female middle and high school current smokers are more likely to smoke menthol cigarettes than male current smokers.

## Tobacco Sources for Youth Tobacco Users

The survey asked student tobacco users how they usually purchased tobacco products. Gas stations are common places for both middle and high school students to purchase their last pack of cigarettes in the past 30 days.



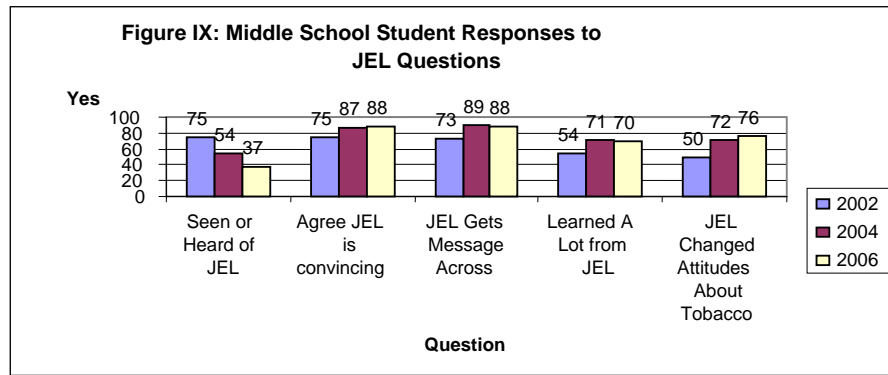
## Just Eliminate Lies (JEL) Youth-led Campaign



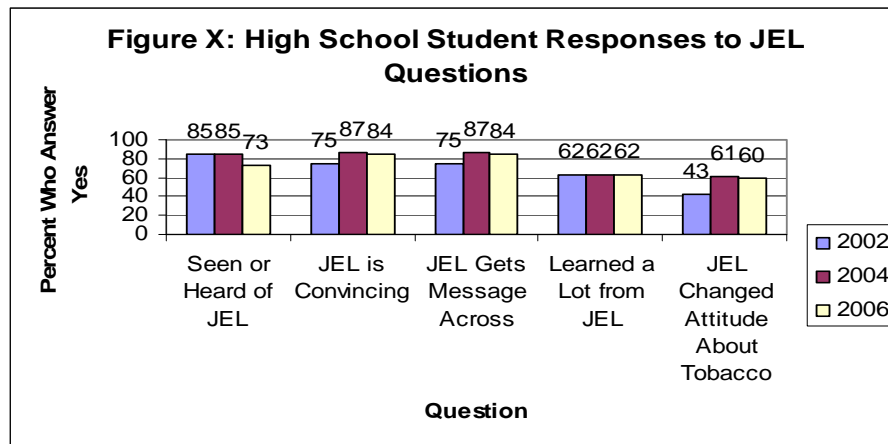
By and large, tobacco use among middle and high school students in Iowa has decreased since 2000. However, as Figure IX shows, there has been a significant decrease in the number of middle school students who have “seen or heard of the Just Eliminate Lies” campaign. Though

middle school students who are exposed to the JEL program report they have “learned a lot from JEL” since 2002, it is apparent that JEL must include its outreach to middle school students.

Percent Who Answer



JEL’s outreach to high school students continues to be effective (Figure X). Students state that JEL is “convincing”, “gets message across”, and “has changed their attitudes about the tobacco industry”.



## Smoking and Asthma

Starting in 2004 the Iowa Youth Tobacco Survey included survey questions about smoking and asthma. To assess whether students who smoked had higher rates of asthma or reported increased absence from school due to illness, students were asked whether they ever had asthma, currently had asthma, how many asthma episodes or attacks they had, and how many days of missed school they had due to illness.

While both smoking and having asthma are risk factors for having missed at least one day of school in the past month, middle and high school youth who both have asthma and smoke were at especially high risk of missing multiple days of school. Compared to students who do not smoke, middle school and high school students who smoke are more likely to have ever had asthma, to have current asthma, to have had an asthma attack in the past year and to have missed multiple days of school in the past month.

The following bullet points are highlights of the asthma related data analysis.

- In middle school, 36% of smokers had ever had asthma vs. 19% of non smokers.
- In high school, 24% of smokers had ever had asthma vs. 20% of nonsmokers.
- Current asthma prevalence rates were 25% higher among smoking high school students and 60% higher among smoking middle school students compared to nonsmokers.
- While both smoking and having asthma are risk factors for having missed at least one day of school in the past month, middle and high school youth who both have asthma and smoke were at especially high risk of missing multiple days of school.

About 75% of middle students with asthma and 60% of high students with asthma who smoked missed one or more day of school in the past 30 days.

Only about 35% of youth with asthma who were nonsmokers missed any school in the past month.

- More than 10% of high school students who had asthma and smoked missed 10 or more days of school in the past month. Among middle school students with asthma who smoked, about 5% missed 10 or more days of school. Of those with asthma who did not smoke, only 1%-2% of students missed 10 or more days of school, a proportion comparable to that of students without asthma..
- Overall, 60% of students who smoked and 35% of students who did not smoke missed a day of school in the past month.
- About 15% of middle and high school students report having current asthma, while about 20% report having ever had asthma.
- About 10% of middle school and 15% of high school students report having had an asthma attack in the past 12 months.

**Note: Not all 96 questions included in the 2006 IYTS questionnaire have been included in this report. For specific analysis of questions please contact Maggie O'Rourke at the Division of Tobacco Use Prevention and Control at 515-281-6225.**

## **Causes/Implications provided by the author:**

Tobacco product experimentation by Iowa's 6th through 12th graders is widespread. An estimated 54,427 students currently use any tobacco product. The number of those experimenting in Iowa's 6th through 12th grade has increased since the 2002 IYTS report with an estimated increase of four percentage points for high school students but a decrease of two percentage points for middle school students. Although gains are continuing to be made in the middle school population, the picture is not so good for the high school population.

Current tobacco product use increases with each progression in grade level. Obviously, prevention programs are needed at every grade level.

While many students who experiment with tobacco products do not move from the experimental phases of tobacco use to regular and/or dependent use in grades 6 through 12, there is evidence to suggest that many do. All the tobacco product experimenters need to be exposed to secondary prevention programs that are designed to keep them from going beyond the experimental stage of use. It is estimated that about half of middle and high school students in Iowa who are currently dependent on a tobacco product will be killed by their habit, losing an average of 20-25 years of nonsmoking life expectancy. Clearly any effort to reduce these outcomes would be beneficial.

There is every indication to believe that tobacco product use is not going away in the near future. Program planners involved in both prevention and treatment need to be aware that an estimated 47,886 of Iowa's middle and high school students expect to be smoking cigarettes one year into the future, and 32,009 think they will be smoking five years into the future. Females are just as likely as males to think they will be smoking in the future.

Iowa's middle and high school students, both males and females, are widely exposed to second hand smoke. From two thirds to two fifths of Iowa students reported being present on one or more of the last seven days in either a room or car with a smoker. The extent of the danger posed by this exposure is uncertain, but it is likely that programs designed to reduce this exposure would reduce health-related costs in the future.

The Marlboro brand of cigarettes remains the most popular brand in Iowa by a wide margin. It enjoys the allegiance of 54 percent of high school current smokers and just under 50 percent of middle school current smokers. It is unknown how Marlboro has achieved such a dominant brand preference in Iowa, but its success obviously makes it a prime target for tobacco reduction programs.

The use of menthol cigarettes seems to be growing among Iowa's middle and high school smokers, particularly among females. Over half of middle school female current smokers prefer menthol cigarettes.

About half of Iowa's high school current cigarette smokers and even more of its middle school smokers express a desire to quit smoking. Female smokers were more likely to express such a desire. Almost three fourths of high school smokers and two thirds of middle school smokers think they probably or definitely could quit. This is despite the fact that over one fourth have tried to quit two or more times. There does appear to be some discrepancy between what several of Iowa's students think they can do and what they have in fact failed to do in the past.

Most of Iowa's middle and high school students who smoke and are under age 18 (the legal purchasing age for cigarettes) usually obtain their cigarettes from acquaintances – others buy for them or borrow from others. Vending machines are the least reported source of cigarettes. Programs that would discourage Iowa's older students from letting their younger peers use them as resources to obtain tobacco products would obviously be beneficial.

Most of Iowa's middle and high school students have appropriate tobacco-related attitudes that should discourage their use of tobacco products. Still, for one reason or another, the majority of Iowa's students do experiment with tobacco products. Obviously, while it is important that students understand that: tobacco can be addictive; smoking does not produce friends; smoking is not cool; and smoking can be harmful - there must be other attitudes that influence the decision to use tobacco products. These attitudes need to be identified and added to the educational programs that discourage tobacco use.

Other factors that might mitigate the impact of the attitudes described above include tobacco product ad exposure and tobacco-using role model exposure. Iowa's middle and high school students are exposed to tobacco product ads and tobacco-using role models and peers. Though only a minority report exposure through any particular channel, there are several channels through which exposure can occur. Reducing this exposure in print, Internet, movies and TV, as well as at home and among peers, would be beneficial.

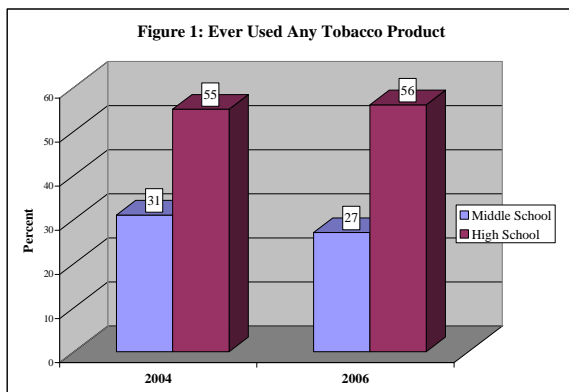
Finally, it is apparent that Iowa's middle and high school students are exposed to state and national media campaigns that focus on the dangers of smoking and secondhand smoke. Still, again, most have at least experimented with tobacco product use. Only a very small percentage of Iowa's students remembered participating in a current school year role-playing exercise that helps students say "NO" to tobacco use or remembered participating in a community program designed to discourage young people from smoking, although more of this did seem to go on in middle school than high school. Assuming that it is never too late to benefit from tobacco prevention exposure, there is a need for more tobacco product prevention programs for every grade at the local level: family, school and community. Over 80 percent of Iowa's students agree JEL (Just Eliminate Lies) counter-marketing ads are convincing and believable. Over 80 percent of Iowa's students also believe JEL (Just Eliminate Lies) is doing ok or very well in getting their anti-tobacco message across to people their age. Over 60 percent of Iowa's students have learned something or a lot from the JEL (Just Eliminate Lies) campaign, and again over 60 percent said the JEL program changed their attitudes toward the tobacco industry. Unfortunately, while the middle school students were slightly more positive on these feelings about JEL, less than half of middle school students as high school students reported having heard the JEL messages.

In short, the Iowa Youth Tobacco Survey (IYTS) clearly indicates a widespread need for primary and secondary tobacco prevention programs in Iowa, as well as treatment intervention programs, that can help Iowa's middle and high school students avoid tobacco product use and/or quit using tobacco products. It is also apparent that some needs are greater than others and that programs can be targeted in ways to maximize their benefit.

Finally, if resources are to continue to be matched to needs, the tobacco-related attitudes and behaviors of Iowa's middle and high school students must be monitored over time. Also, if any progress is to be made in identifying which of the tobacco-related prevention and intervention programs that might be developed have the most impact, it will be necessary to monitor the tobacco-related beliefs and behaviors of Iowa's students over time. The administration of the IYTS survey should continue in the future with methodology to ensure representation of all middle and high school students.

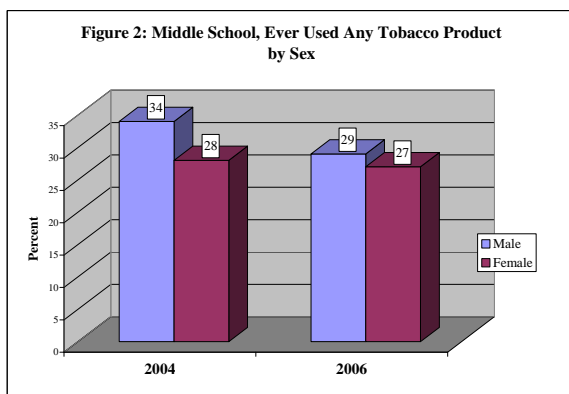
# 2006 IOWA YOUTH TOBACCO SURVEY FINDINGS

## LIFETIME TOBACCO USE PREVALENCE RATES: Middle and High School (Total and by Sex)

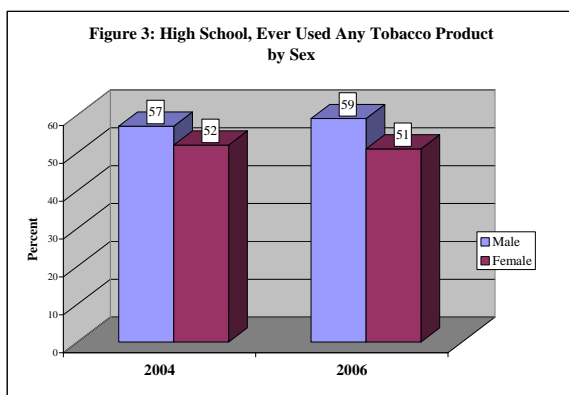


56% of Iowa's high school students (an estimated 86,222 students in grades 9 through 12) have tried some kind of tobacco product in their lifetime.

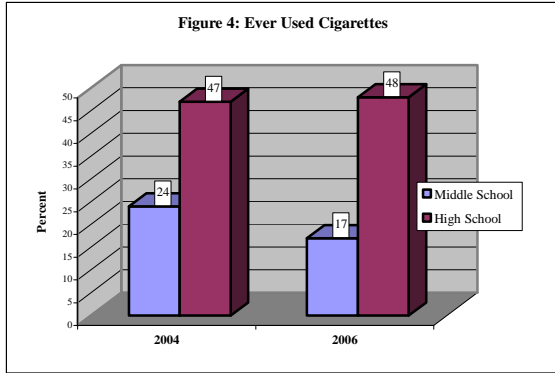
27% of Iowa's middle school students (an estimated 27,685 students in grades 6 through 8) have tried some kind of tobacco product in their lifetime.



Middle school males were only slightly more likely than middle school females to have tried some kind of tobacco product in their lifetime.

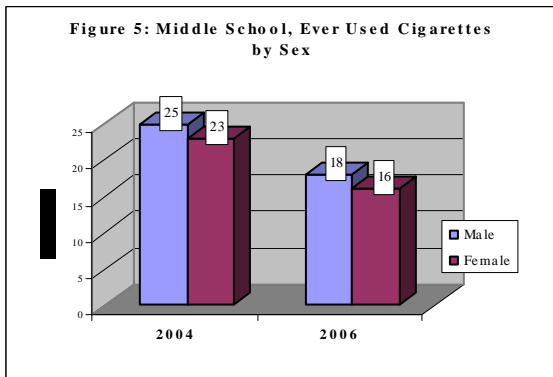


The difference in lifetime use of any tobacco product between males and females is larger in the high school sample than in the middle school sample. This is likely due to the earlier maturation of girls.

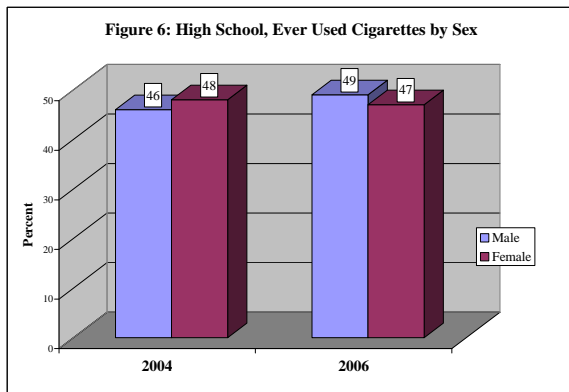


Of the 56% of Iowa’s high school students who have experimented with some kind of tobacco product in their lifetime, the vast majority have included cigarettes in their experimentation. 48% of Iowa’s high school students (an estimated 72,631 students) have tried cigarettes in their lifetime.

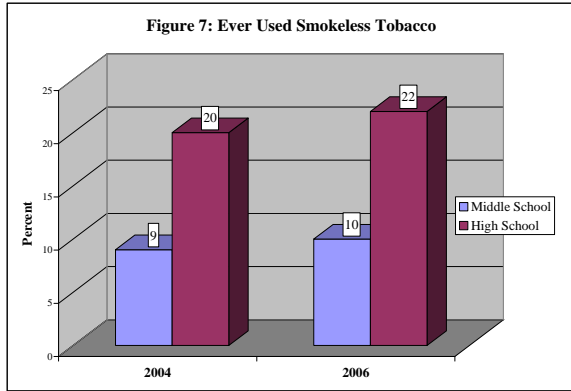
Similarly, most middle school students who have tried some kind of tobacco product in their lifetime included cigarettes in their experimentation. 17% of Iowa’s middle school students (an estimated 17,485 students) have tried cigarettes in their lifetime. This is down seven percentage points from 2004.



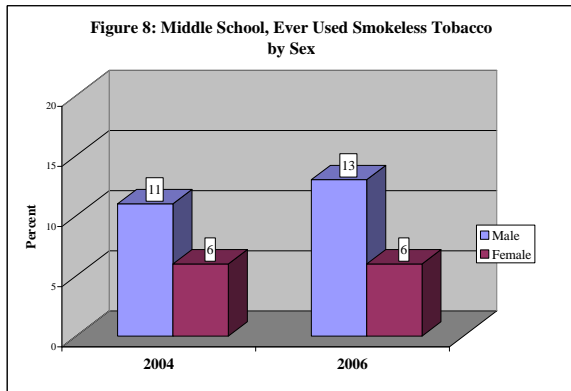
Middle school males are a little more likely than middle school females to have tried cigarettes in their lifetime.



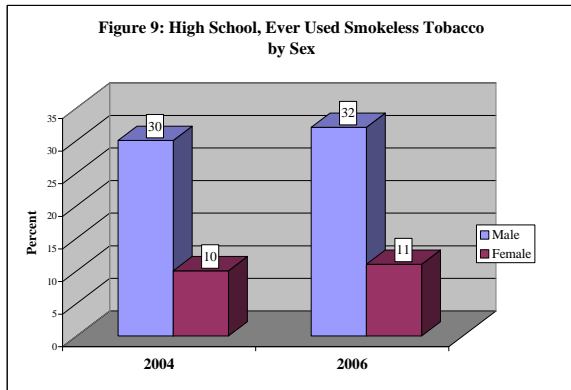
The difference in lifetime use of cigarettes between males and females is no larger in the high school sample than in the middle school sample.



Smokeless tobacco experimentation occurs much less often than smoking tobacco experimentation. Still, 22% of Iowa's high school students (an estimated 33,276 students) and 10% of middle school students (an estimated 10,261 students) have tried smokeless tobacco at some time in their lifetime. This is up a percentage point or two from 2004.

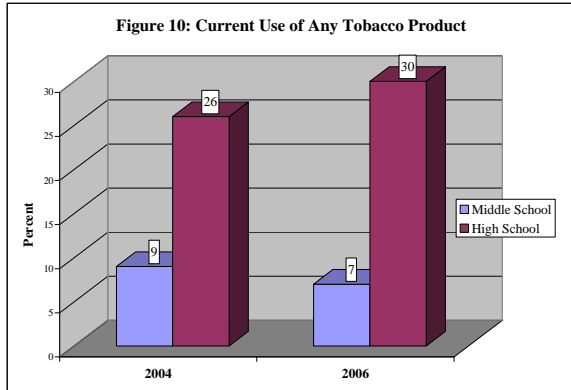


Middle school males are more than twice as likely as middle school females to have ever tried smokeless tobacco. The sex differences remain quite large for this tobacco product.



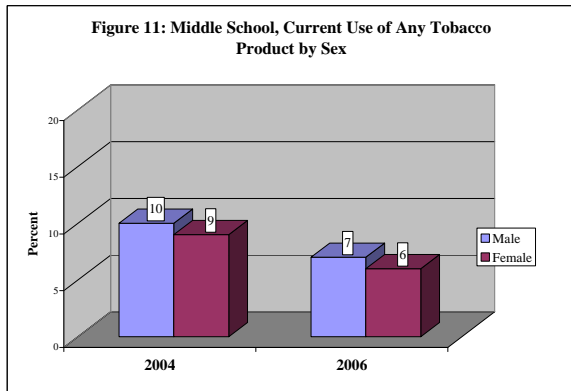
High school males are nearly three times as likely as their female counterparts to have ever tried smokeless tobacco. Furthermore, the sex difference has widened slightly since 2004 in both middle and high school.

**CURRENT (PAST 30 DAYS) TOBACCO USE PREVALENCE RATES:  
Middle and High School (Total and by Sex)**

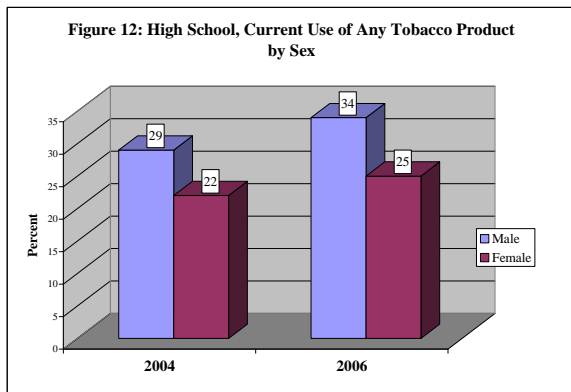


Current (past 30 days) use of any type of tobacco product is reported by 30% of Iowa’s high school students (an estimated 47,082 students in grades 9 through 12). This is just over half (54%) of high school students who reported ever using any type of tobacco product. This is an increase of four percentage points from 2004.

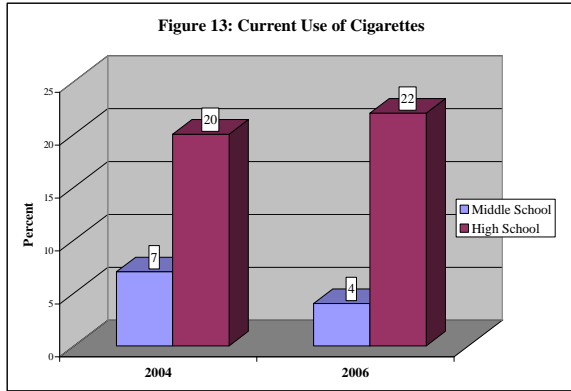
Current (past 30 days) use of any type of tobacco product is reported by 7% of Iowa’s middle school students (an estimated 7,345 students in grades 6 through 8). This is just over one fourth of the middle school students who reported ever using any type of tobacco product. It is a decrease of two percentage points from 2004.



Middle school males were only slightly more likely than middle school females to report current (past 30 days) use of any tobacco product.

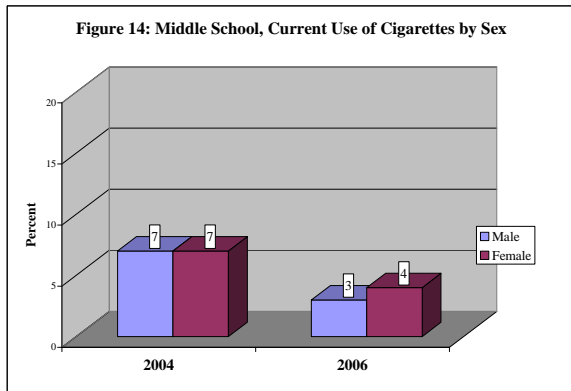


The sex difference in current (past 30 days) use of any tobacco product is much larger for the high school than the middle school sample. Again, this could be due to the earlier maturation of girls.

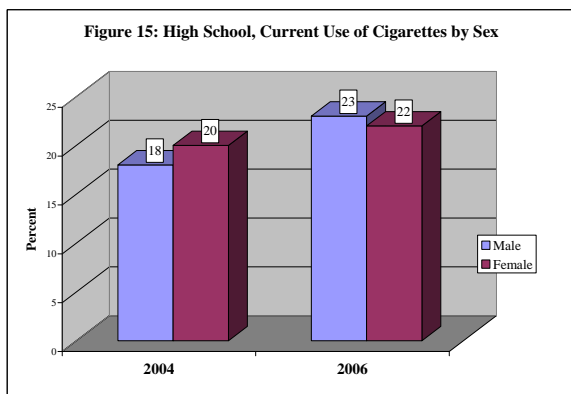


Current (past 30 days) cigarette use was reported by 22.5 % of Iowa’s high school students (an estimated 34,452 students in grades 9 through 12). This is a little less than one half of the high school students who reported they had ever used cigarettes. This is an increase of over two percentage points from 2004.

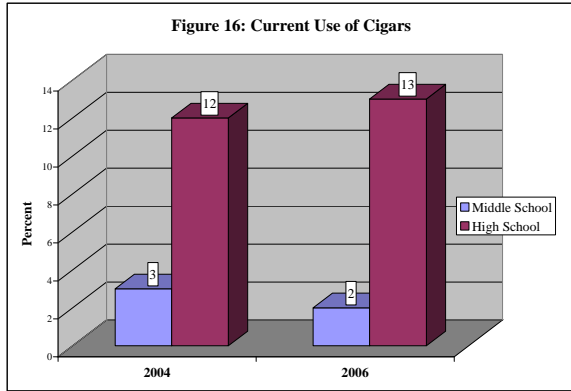
Current (past 30 days) cigarette use was reported by 4% of Iowa’s middle school students (an estimated 3,773 students in grades 6 through 8). This is more than one fifth of the middle school students who reported they had ever used cigarettes. It is a decrease of three percentage points from 2004.



Slightly more middle school females than males (4% and 3% respectively) reported current cigarette use.

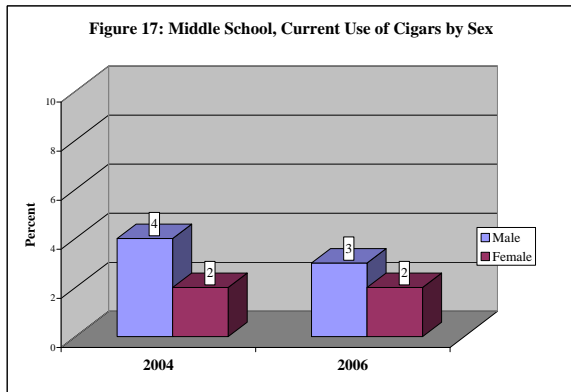


Slightly more high school males (23%) than females (22%) reported current cigarette use.

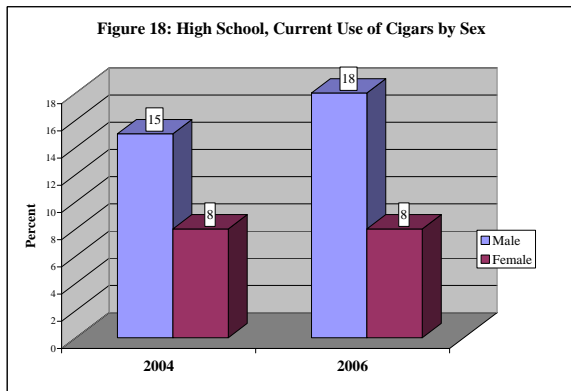


13% of Iowa’s high school students (an estimated 20,815 students in grades 9 through 12) report that they currently (past 30 days) smoke cigars.

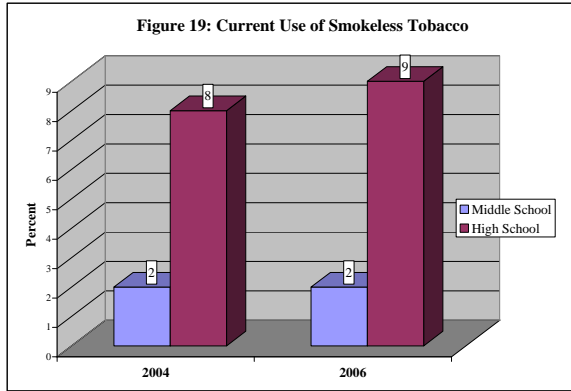
2% of Iowa’s middle school students (an estimated 2,493 students in grades 6 through 8) report that they currently smoke cigars.



Iowa’s middle school males are somewhat more likely to report current cigar use than their female counterparts (3% and 2% respectively).

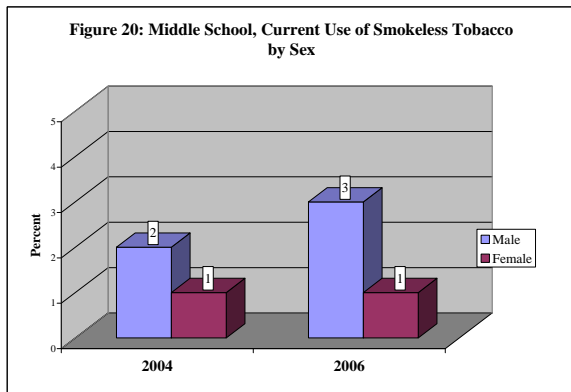


Iowa’s high school males are more than two times as likely as their female counterparts to report current cigar use (18% and 8% respectively). All of the increase in cigar use from 2004 among high school students is due to male usage.

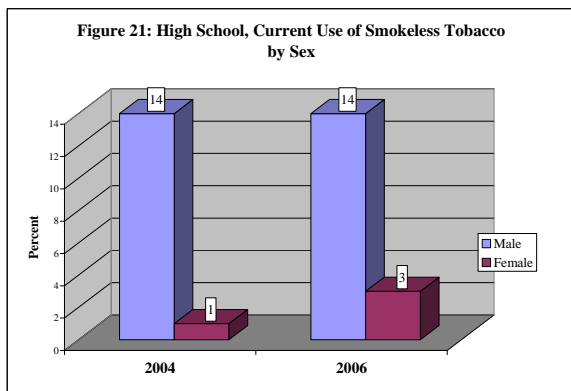


Current (past 30 days) use of smokeless tobacco is reported by 9% of Iowa’s high school students (an estimated 13,465 students in grades 9 through 12). This is about two fifths (40%) of the high school students who reported ever using smokeless tobacco.

Current use of smokeless tobacco is reported by 2% of Iowa’s middle school students (an estimated 2,258 students in grades 6 through 8). This is a little less than one quarter (22%) of the middle school students who reported ever using smokeless tobacco.



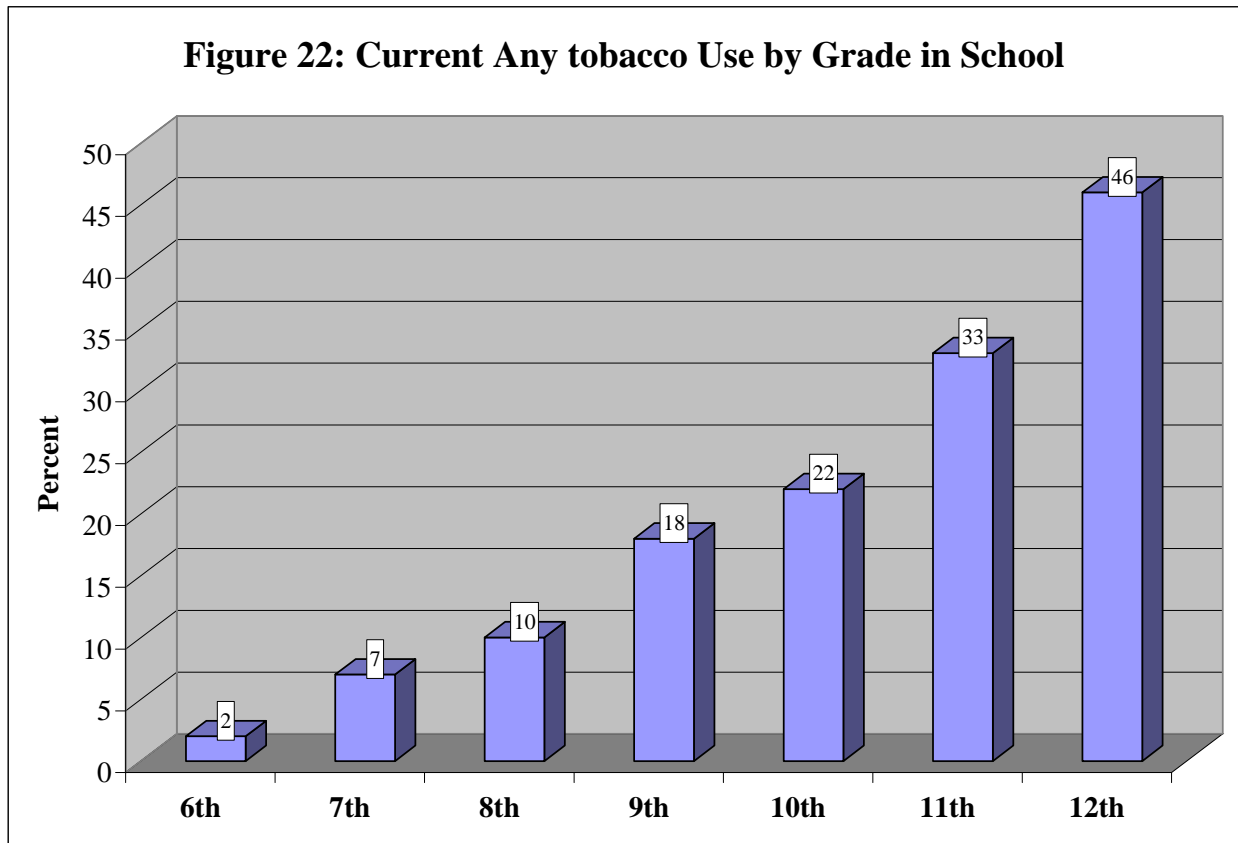
Nearly three times as many middle school males as females report current smokeless tobacco use.



Almost five times as many high school males as females report current smokeless tobacco use.

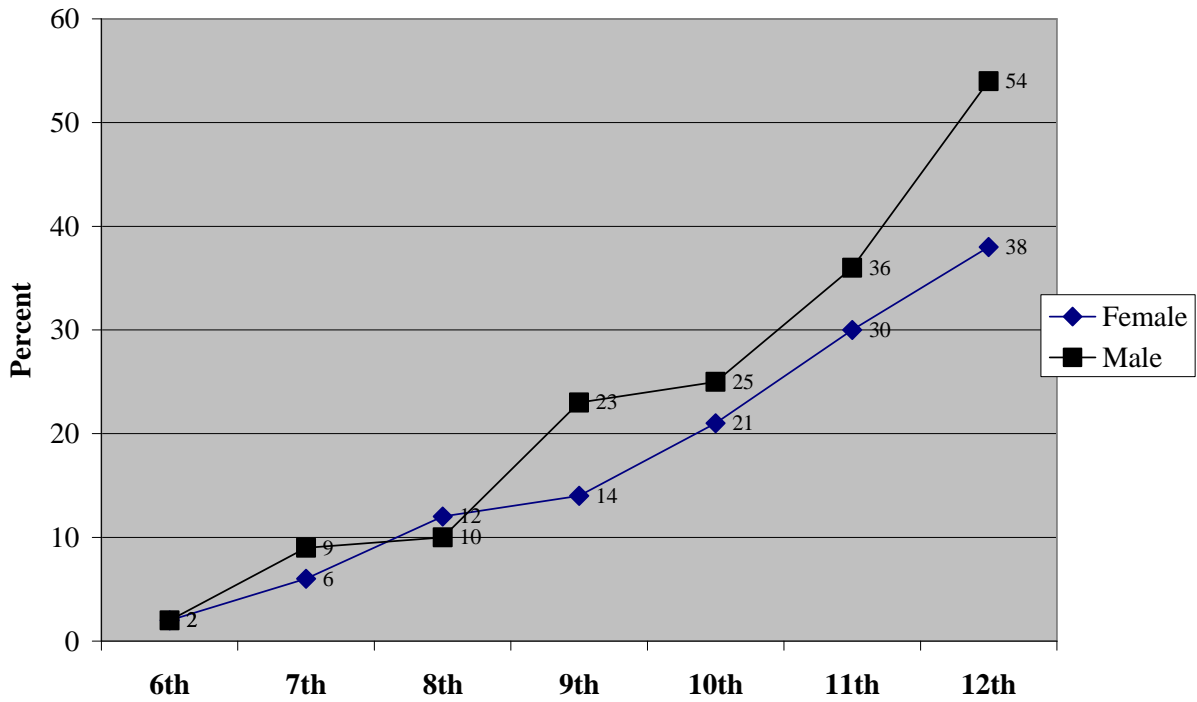
Current (past 30 days) use of the remaining types of tobacco products included in the 2006 Iowa Youth Tobacco Survey - pipe smoking tobacco, as well as bidis and kreteks (fruit and candy flavored cigarettes with actual tobacco in them) - was reported by less than 5 percent each of Iowa's middle and high school students. Despite their current low level of use in Iowa, these imported tobacco products could well become the "gateway" tobacco products for adolescents and the supply of, and demand for, these imported tobacco products should be monitored very closely.

Figure 22 below clearly shows a stair step relationship between grade in school and current (past 30 days) use of any tobacco product.

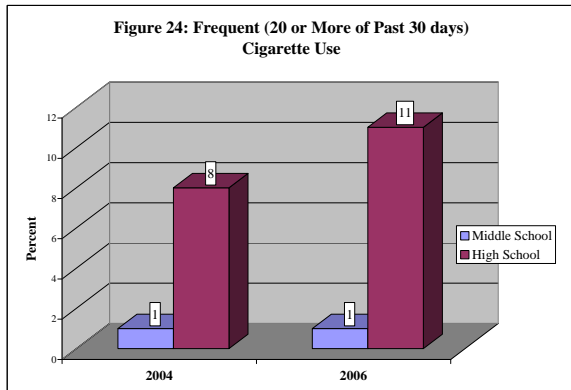


The rate of use increases with each grade. A stair step relationship between grade in school and any current tobacco use existed for both males and females, but there were some differences in terms of when the largest increases occurred. The males and females increased at about the same rate during the middle school grades with females actually being slightly higher in 8<sup>th</sup> grade,. Males increased current use more rapidly from 8<sup>th</sup> to 9<sup>th</sup> grade and from 11<sup>th</sup> to 12<sup>th</sup> grade with the largest differences between the sexes being in 12<sup>th</sup> grade.

**Figure 23: Current AnyTobacco Use by Grade in School**



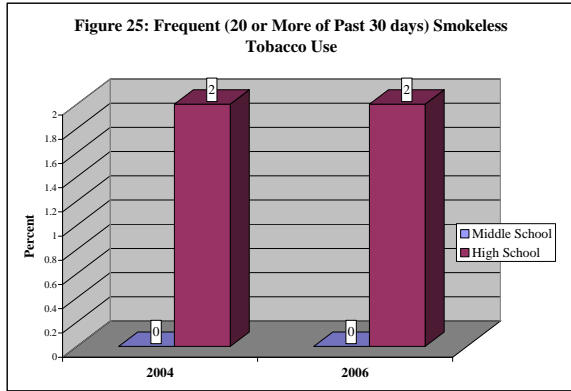
**FREQUENT (20 OR MORE OF PAST 30 DAYS) TOBACCO USE PREVALENCE RATES:  
Middle and High School (Total and by Sex)**



11% of Iowa’s high school students (an estimated 17,498 students in grades 9 through 12) smoked cigarettes on 20 or more of the last 30 days. This is about one half (51%) of the high school students who reported current (past 30 days) cigarette use. This is an increase of three percentage points from 2004.

Only 1% of Iowa’s middle school students (an estimated 1,148 students in grades 6 through 8) smoked cigarettes on 20 or more of the last 30 days. This is less than a third (30%) of the middle school students who reported current (past 30 days) cigarette use.

Middle school males were about as likely as their female counterparts to be frequent (20 or more days of the past 30 days) cigarette smokers. The same was true for high school sex differences.

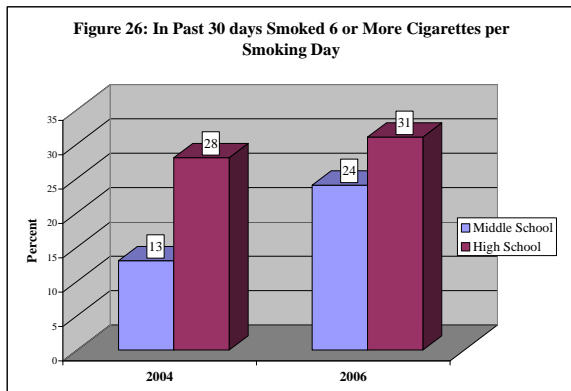


2% of Iowa’s high school students (an estimated 3,524 students in grades 9 through 12) used smokeless tobacco on 20 or more of the last 30 days. This is a little more than one fourth (26%) of the high school students who reported current (past 30 days) smokeless tobacco use.

Almost none of Iowa’s middle school students (an estimated 317 students in grades 6 through 8) used smokeless tobacco on 20 or more of the last 30 days. This is one seventh (14%) of the middle school students who reported current (past 30 days) smokeless tobacco use.

Middle school male students were slightly more likely than their female counterparts to frequently use smokeless tobacco (both under 1%). High school males were much more likely than their female counterparts to frequently use smokeless tobacco (4% vs. 0.4%).

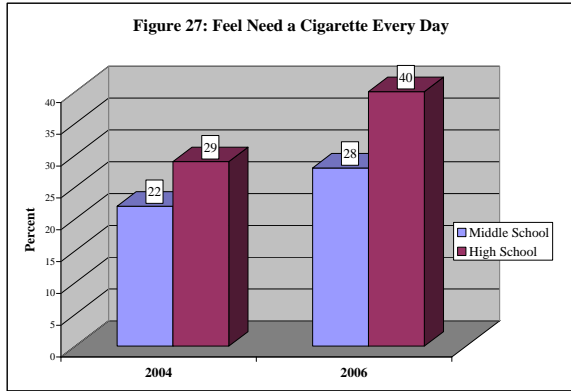
**TOBACCO DEPENDENCE PREVALENCE RATES: Middle and High School (Total and by Sex)**



31% of Iowa’s high school smokers (an estimated 10,632 students in grades 9 through 12) smoked six or more cigarettes per smoking day in the past 30 days. This has increased three percentage points from 2004.

24% of Iowa’s middle school smokers (an estimated 914 students in grades 6 through 8) smoked six or more cigarettes per smoking day in the past 30 days. This is an increase of 11 percentage points from 2004. Since the numbers are smaller, they may be expected to be more volatile than the high school population.

Middle school male smokers were much more likely than their female counterparts to smoke six or more cigarettes per smoking day (33% vs. 18%). High school male smokers were also much more likely than their female counterparts to smoke six or more cigarettes per smoking day (36% vs. 26%)



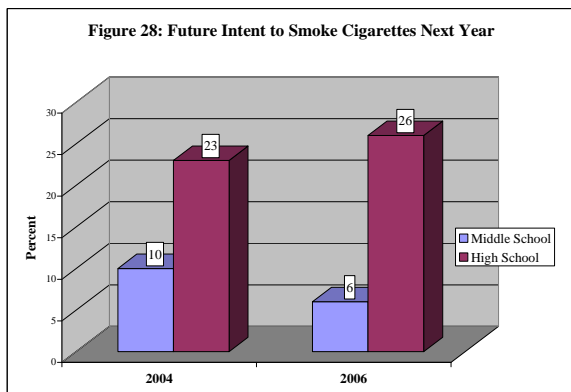
40% of Iowa’s high school smokers (an estimated 15,073 students in grades 9 through 12) felt they could not go for a whole day without smoking a cigarette. This is an increase of 11 percentage points from 2004.

28% of Iowa’s middle school smokers (an estimated 1,235 students in grades 6 through 8) felt they could not go for a whole day without smoking a cigarette. This is a six percentage point increase from 2004.

Middle school male smokers were much more likely than their female counterparts to feel that they needed a cigarette every day (39% vs. 21%). High school female smokers were also slightly more likely than their male counterparts to feel that they needed a cigarette every day (42% vs. 38%).

**PROJECTED FUTURE TOBACCO USE PREVALENCE RATES:**

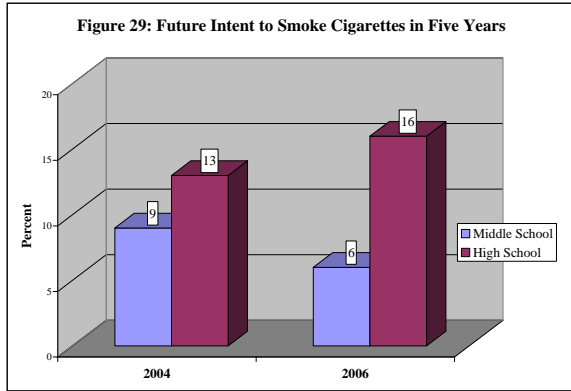
Middle and High School (Total and by Sex)



26% of Iowa’s high school students (an estimated 41,128 students in grades 9 through 12) plan on being cigarette smokers in the next year. This is a little more than half (54%) of the high school students who ever smoked a cigarette and somewhat more than are current (past 30 days) cigarette smokers. This is an increase of three percentage points from 2004.

6% of Iowa’s middle school students (an estimated 6,758 students in grades 6 through 8) plan on being cigarette smokers in the next year. This is a little more than a third (35%) of the middle school students who ever smoked a cigarette and somewhat more than are current (past 30 days) cigarette smokers. It is a decrease of four percentage points from 2004.

Middle school females are slightly more likely than their male counterparts (7% vs. 6%) to report that they will be smoking cigarettes next year. High school males and females are equally likely to report that they will be smoking cigarettes next year.

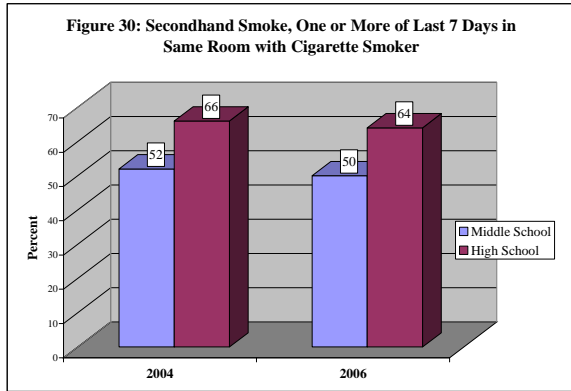


16% of Iowa’s high school students (an estimated 25,199 students in grades 9 through 12) plan on being cigarette smokers five years from the present. This is about five eighths (62%) of the high school students who think they will be smoking cigarettes one year from the present. It does appear to be evident that at least several of the high school students intend to quit smoking by the time they reach their late twenties. This is an increase of three percentage points from 2004.

6% of Iowa’s middle school students (an estimated 6,810 students in grades 6 through 8) plan on being cigarette smokers five years from the present. This is nearly the same percentage of middle school students who think they will smoke cigarettes one year from the present. It does appear that middle school students who expect to be smoking next year are quite likely to think they will be smoking in high school as well. It is a decrease of three percent from 2004, however.

Middle school females are slightly more likely than their male counterparts (8% vs. 5%) to report that they will be smoking cigarettes five years from the present. High school males are slightly more likely than their female counterparts (17% vs. 15%) to report that they will be smoking cigarettes five years from the present.

**SECOND HAND SMOKE EXPOSURE: Middle and High School (Total and by Sex)**

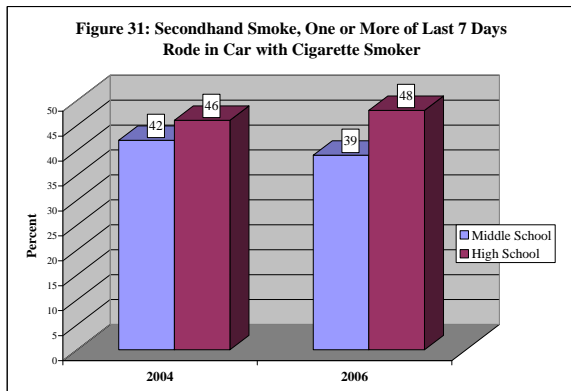


Almost two thirds (64%) of Iowa’s high school students (an estimated 100,374 students in grades 9 through 12) reported they spent one or more of the last seven days in a room with a person who was smoking.

Second hand smoke exposure was less in the middle school, but still half (50%) of middle school students (an estimated 52,724 students in grades 6 through 8) reported they spent one or more of the last seven days in a room with a person who was smoking.

Although declining somewhat (two percentage points since 2004), second hand smoke exposure is still very prevalent among Iowa’s 6th through 12th graders.

Female middle school students are less likely than the males to have been in a room with a smoker (48% vs. 51%). Female high school students are slightly more likely than their male counterparts to be exposed to this kind of second hand smoke (65% vs. 64%).



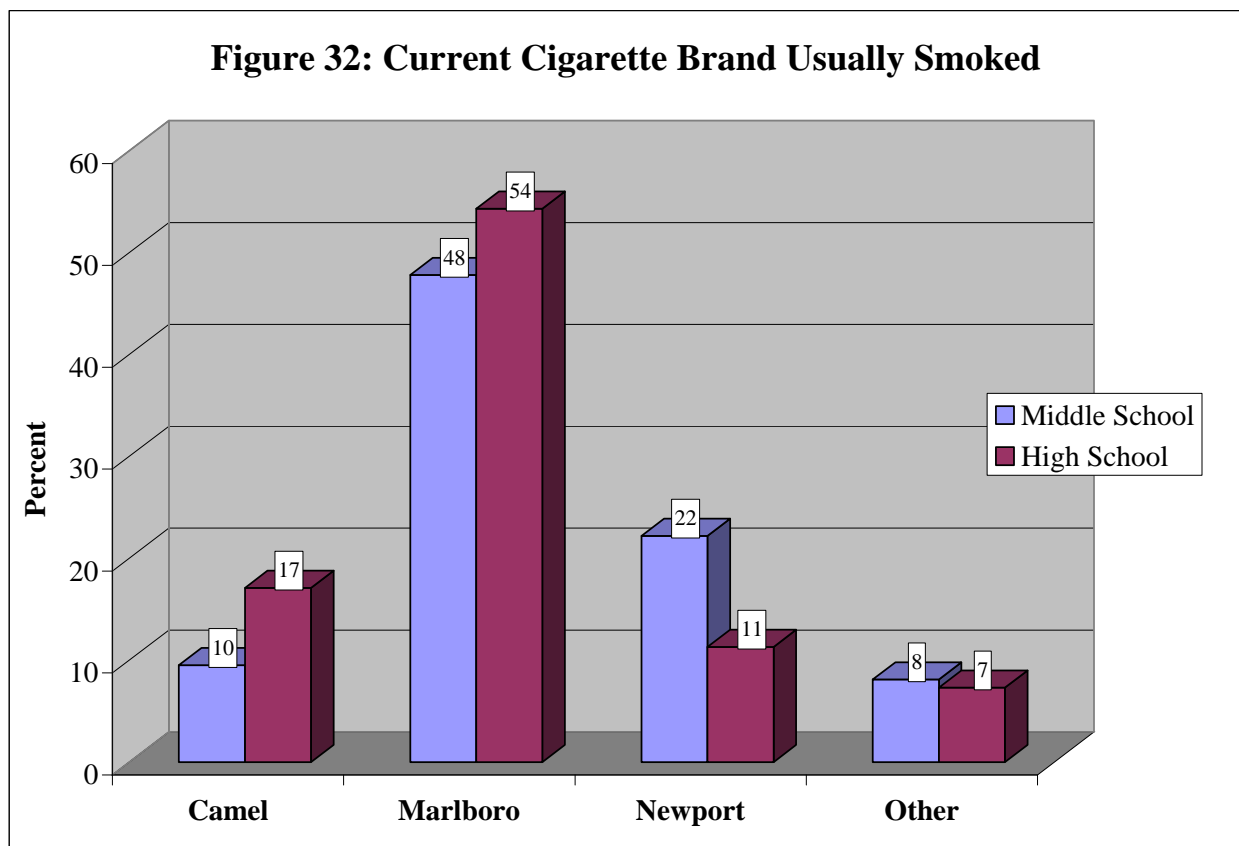
Almost half (48%) of Iowa’s high school students (an estimated 74,145 students in grades 9 through 12) reported they spent one or more of the last seven days in a car with a person who was smoking. This is an increase of three percentage points from 2004.

Nearly two fifths (39%) of Iowa’s middle school students (an estimated 40,988 students in grades 6 through 8) reported they spent one or more of the last seven days in a car with a person who was smoking. This is a decrease of three percentage points from 2004.

Female middle school students are less likely than the males to have been in a car with a smoker (38% vs. 40%). Female high school students are more likely than their male counterparts to be exposed to this kind of second hand smoke (50% vs. 46%).

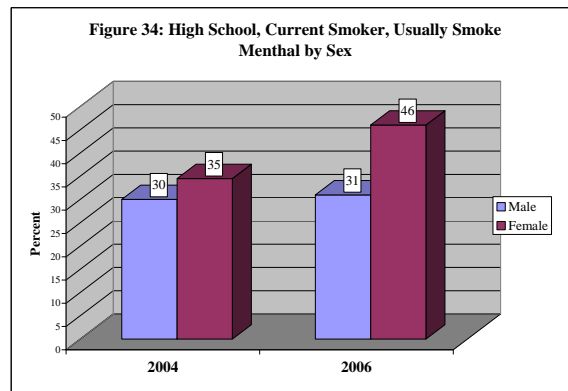
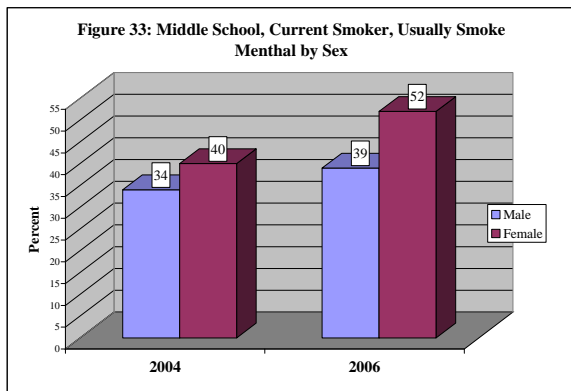
**TOBACCO BRAND PREFERENCES:** Middle and High School Current Smokers (Total and by Sex)

As evidenced in Figure 32 below, Iowa's current (past 30 days) middle and high school cigarette smokers prefer the Marlboro brand of cigarettes by a wide margin over all the others. Only Newport was somewhat more popular among middle school smokers than high school smokers. The middle school male and female brand preferences were generally similar to each other, but more middle school male smokers than female smokers preferred Camels (14% vs. 7%) and Marlboros (50% vs. 47%), while more female middle school students preferred Newports (27% vs. 15%).

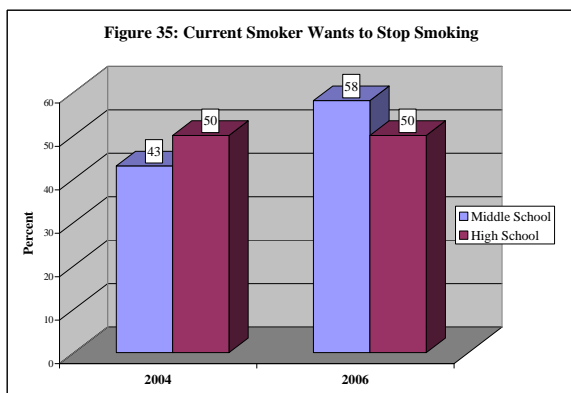


The high school male and female brand preferences were also similar to each other, but more high school male smokers than female smokers preferred Camels (23% vs. 12%), while more female high school smokers preferred Newports (16% vs. 7%). More high school females also preferred Marlboros (58% vs. 50%).

As evidenced in Figures 33 and 34 below, a sizeable portion of Iowa's current (past 30 days) middle and high school smokers usually smoke menthol cigarettes. Middle school female current smokers are more likely than their male counterparts to smoke menthol cigarettes (52% vs. 39%). Likewise, more high school females than males smoke menthol cigarettes (46% vs. 31%). The use of menthol cigarettes seems to be growing, especially among females.



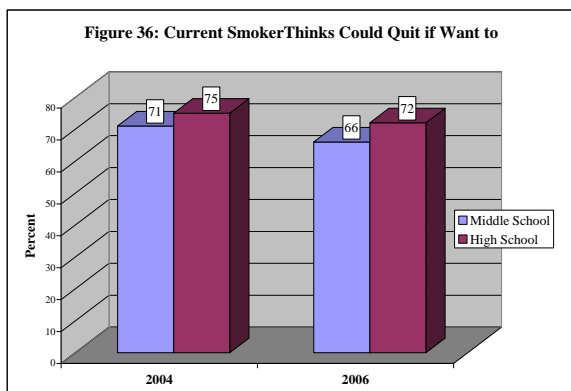
**QUITTING EXPERIENCES: Middle and High School Current Smokers (Total and by Sex)**



Over half (50%) of the high school students who are current (past 30 days) cigarette smokers expressed a desire to stop smoking at the time of interview.

More, almost three fifths (58%) of the middle school students who are current cigarette smokers wanted to stop smoking at the time of interview. This is a large increase for middle school students from 2004.

There were virtually no differences by sex for either middle or high school current (past 30 days) cigarette smokers. Middle school females expressed a slightly higher desire to quit (68% vs. 39%), as did high school females (57% vs. 43%).

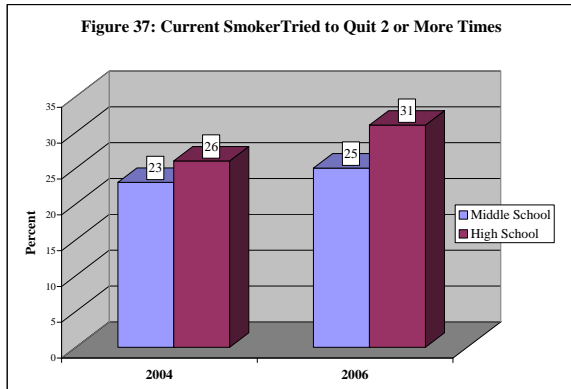


72% of the high school current (past 30 days) cigarette smokers definitely or probably think they could quit smoking cigarettes now if they wanted to. This is a decrease of three percentage points from 2004.

Fewer, 66% of the middle school current cigarette smokers, definitely or probably think they could quit smoking cigarettes now if they wanted to. This is a decrease of five percentage points from 2004.

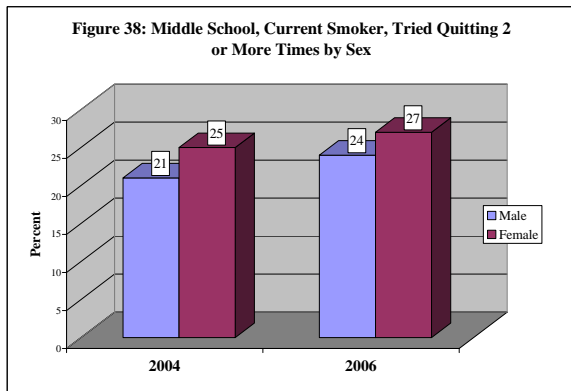
Middle School females were more likely to think they could quit smoking if they desired than

Males (68% vs. 62%). High school, male current cigarette smokers, on the other hand, were more likely to have felt they could quit (74% vs. 69%).

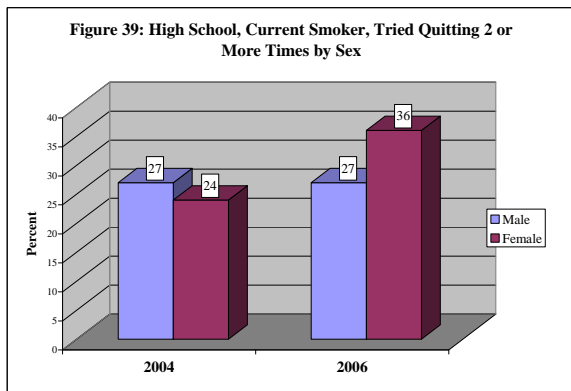


31% of high school current (past 30 days) cigarette smokers have tried to quit smoking two or more times in their lifetime. This is a five percentage point increase from 2004.

25% of middle school current cigarette smokers have tried to quit smoking two or more times in their lifetimes. This is a two percentage point increase from 2004.



Female middle school current cigarette smokers were somewhat more likely than their male counterparts to have tried to quit smoking two or more times in their lifetime (27% vs. 24%). The increase from 2004 is about the same for both sexes.

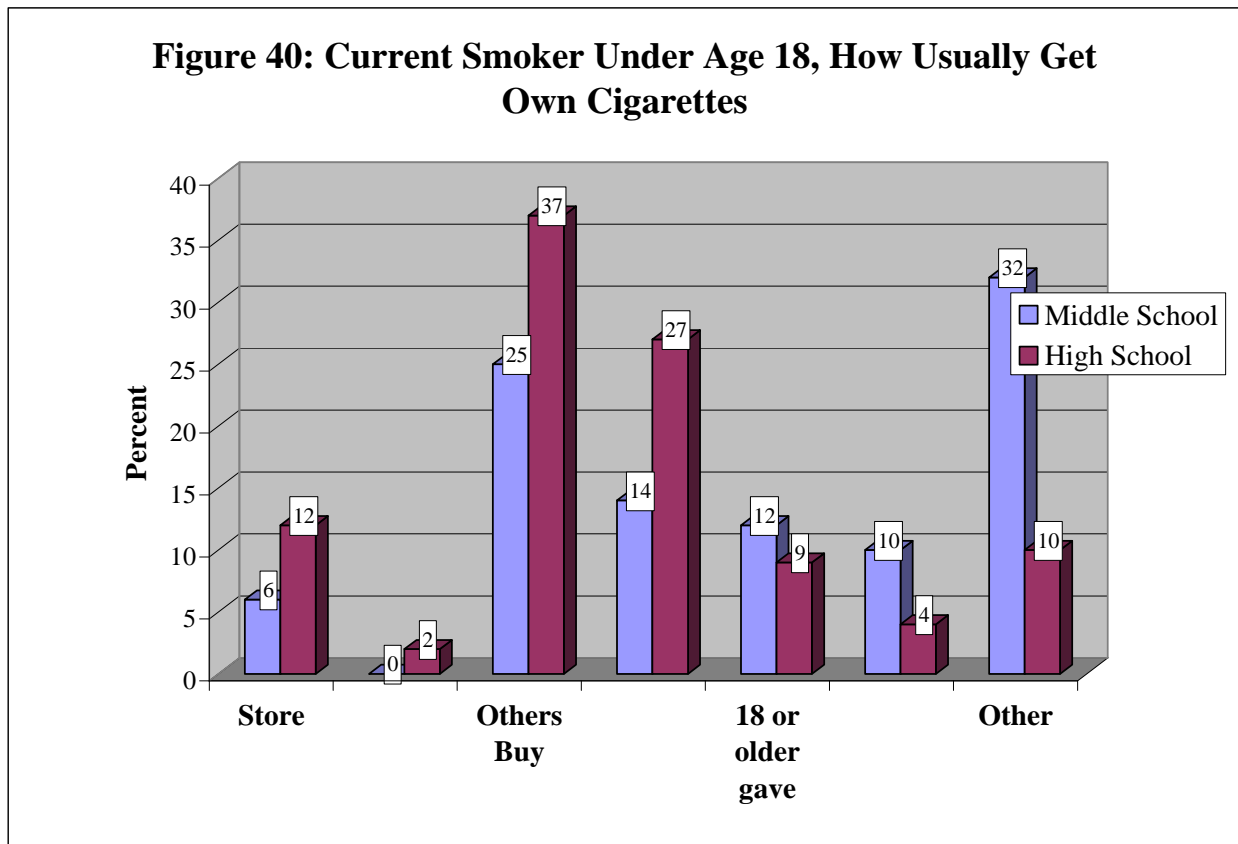


There was an even larger sex difference for the high school current cigarette smokers. 36% of females reported trying to quit two or more times while only 27% of the males tried to quit two or more times. Only the female smokers showed an increase in trying to quit smoking since 2004.

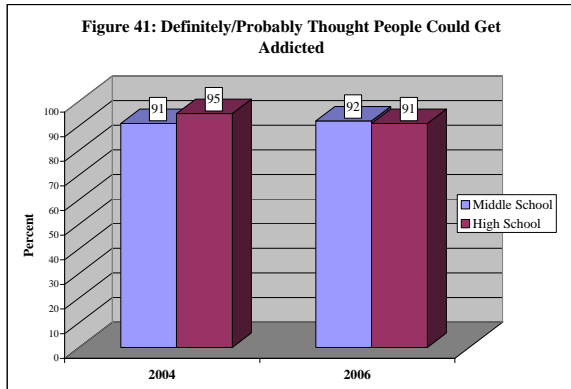
### PURCHASING BEHAVIOR:

Middle and High School Current Smokers/Smokeless Tobacco Users Under the Age of 18 (Total and by Sex)

As evidenced in Figure 40 below, most high school current (past 30 days) cigarette smokers who are under the legal purchasing age of 18 usually get their cigarettes by having others buy them followed by borrowing from others. Middle school underage smokers are most likely to obtain their cigarettes by “other” means, followed by others buying for them. Vending machines are the least used resource by both middle and high school underage smokers. Stealing cigarettes is more prevalent among middle school than high school underage smokers. On the other hand, a store purchase is more likely for high school than middle school students (probably because high school students are less likely to be requested to show proof of age).



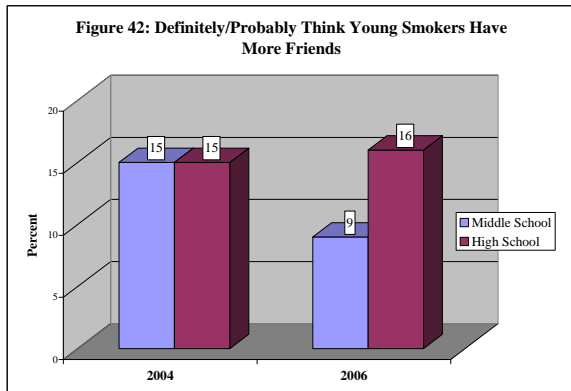
**TOBACCO-RELATED ATTITUDES: Middle and High School (Total and by Sex)**



91% of Iowa’s high school students definitely or probably think that people can get addicted to using tobacco just like they can get addicted to using cocaine or heroin. This is a decrease of four percentage points from 2004.

92% of Iowa’s middle school students definitely or probably think that people can get addicted to using tobacco just like they can get addicted to using cocaine or heroin.

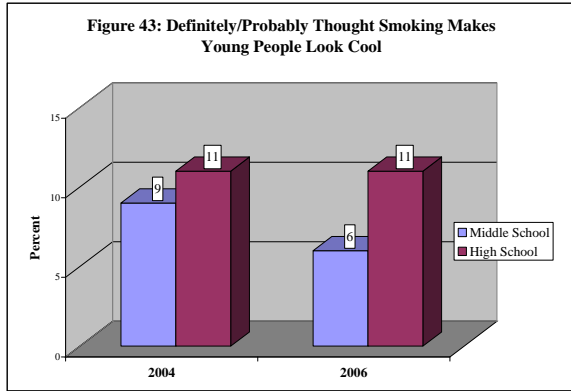
The sex differences are small, with females being somewhat more likely than males to think tobacco can be addictive. 94 percent of middle school females think tobacco can be addictive compared to 91 percent of their male counterparts. 94 percent of high school females think tobacco can be addictive compared to 88 percent of their male counterparts.



16% of Iowa’s high school students definitely or probably think that young people who smoke cigarettes have more friends.

9% of Iowa’s middle school students definitely or probably think that young people who smoke cigarettes have more friends. This is a six percentage point decrease from 2004.

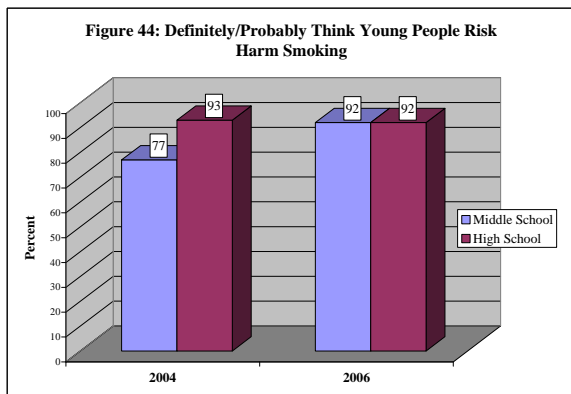
More males than females think cigarette smokers have more friends, but the sex differences are small for the middle school students and somewhat larger for the high school students. 9% of middle school males think cigarette smokers have more friends compared to 8% of their female counterparts. 19% of high school males think cigarette smokers have more friends compared to 12% of their female counterparts.



11% of Iowa’s high school students definitely or probably think that smoking cigarettes makes young people look cool or fit in.

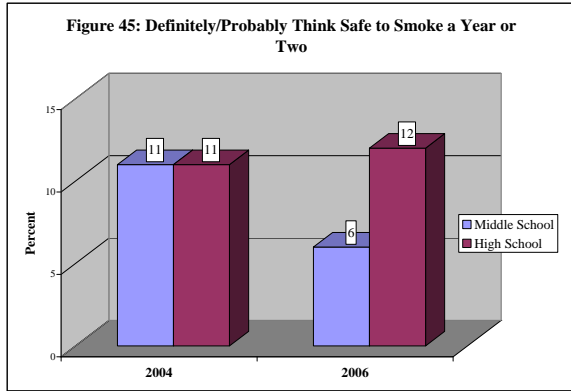
6% of Iowa’s middle school students definitely or probably think that smoking cigarettes makes young people look cool or fit in. This is a three percentage point decrease from 2004.

More males than females think that smoking cigarettes makes young people look cool or fit in, but the sex differences are small for the middle school students and somewhat larger for the high school students. 6 percent of middle school males think smoking cigarettes makes young people look cool or fit in compared to slightly less than 6 percent of their female counterparts. 14 percent of high school males think cigarette smoking makes young people look cool or fit in compared to 8 percent of their female counterparts.



92% of both Iowa’s high school and middle school students definitely or probably think that young people risk harming themselves if they smoke from 1-5 cigarettes per day. As with the other attitude measures, there is little or no change for high school students but a sizably more negative view from middle school students. Middle school students increased 15 percentage points since 2004.

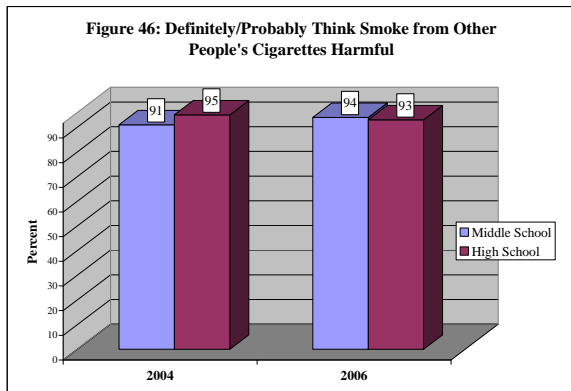
More females than males think that young people risk harming themselves if they smoke from 1-5 cigarettes per day, and the sex differences are relatively small for both the middle and high school students. 94 percent of middle school females think that young people risk harming themselves if they smoke from 1-5 cigarettes per day compared to 90 percent of their male counterparts. 95 percent of high school females think that young people risk harming themselves if they smoke from 1-5 cigarettes per day compared to 90 percent of their male counterparts.



12% of Iowa’s high school students definitely or probably think that it is safe to smoke cigarettes for a year or two, as long as you quit after that.

Only 6% of Iowa’s middle school students definitely or probably think that it is safe to smoke cigarettes for a year or two, as long as you quit after that. This is a decrease of five percentage points since 2004.

More males than females think that it is safe to smoke cigarettes for a year or two, as long as you quit after that, but the sex differences are small for the middle school students and somewhat larger for the high school students. 8 percent of middle school males think it is safe to smoke cigarettes for a year or two, as long as you quit after that, compared to 5 percent of their female counterparts. 15 percent of high school males think it is safe to smoke cigarettes for a year or two, as long as you quit after that, compared to 8 percent of their female counterparts.



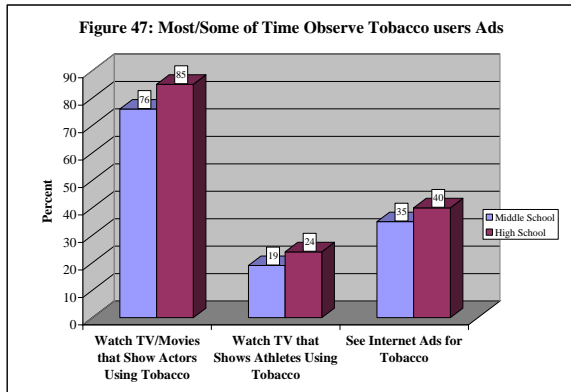
93% of Iowa’s high school students definitely or probably think the smoke from other people’s cigarettes is harmful to them.

94% of Iowa’s middle school students definitely or probably think the smoke from other people’s cigarettes is harmful to them. This is an increase of three percentage points from 2004.

More females than males think the smoke from other people’s cigarettes is harmful to them, and the sex differences are relatively small for both the middle and high school students. 94 percent of middle school females think the smoke from other people’s cigarettes is harmful to them compared to 93 percent of their male counterparts. 96 percent of high school females think the smoke from other people’s cigarettes is harmful to them compared to 90 percent of their male counterparts.

**TOBACCO EXPOSURE: Middle and High School (Total and by Sex)**

Figure 47 below indicates the extent to which Iowa’s middle and high school students are exposed to tobacco use on TV and in movies, as well as tobacco product ads on the Internet and in stores.



85% of high school students and 76% of middle school students indicate that they most or some of the time watch TV or movies where actors are using tobacco.

24% of high school students and 19% of middle school students report that they most or some of the time watch TV where athletes are using tobacco.

40% of high school students indicate that they most or some of the time see ads for tobacco products on the Internet. 35% of middle school students report seeing tobacco product ads on the Internet.

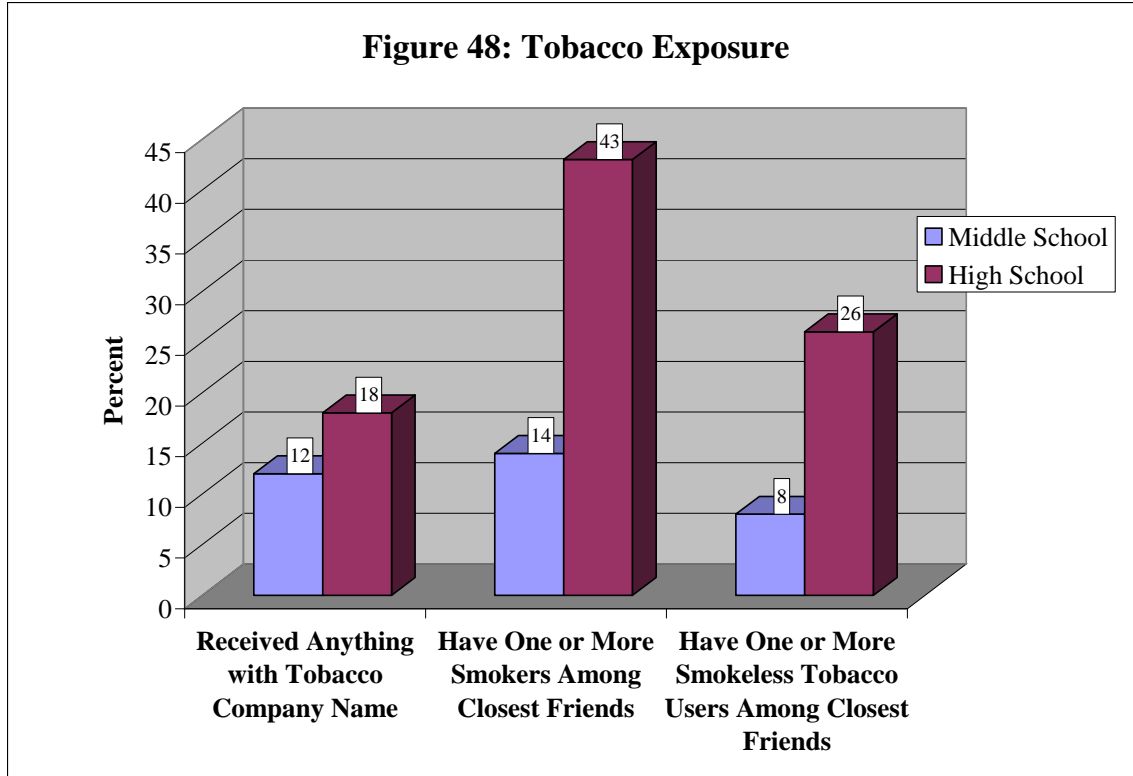
Both middle and high school males were somewhat more likely than their female counterparts to indicate they watched TV with athletes using tobacco products (20% vs. 18% and 27% vs. 22% respectively). However, more high school females reported seeing tobacco product ads on the Internet (41% vs. 38%).

Figure 48 below provides more indications of the extent to which Iowa’s middle and high school students are exposed to tobacco company advertising and tobacco-using role models.

18 percent of high school students and 12 percent of middle school students indicate they have bought or received something in the past 12 months that has a tobacco company name or picture on it.

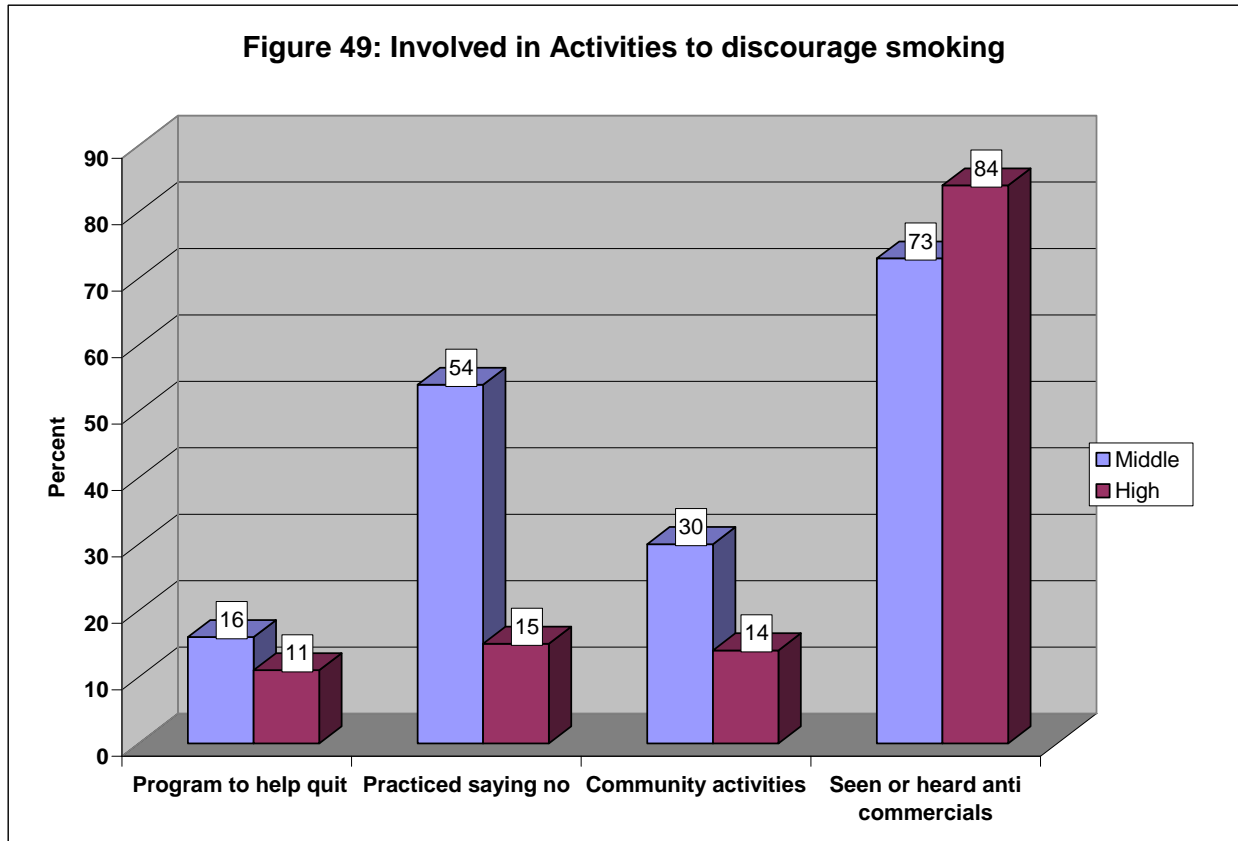
43% of high school students and 15 percent of middle school students report that one or more of their four closest friends smokes cigarettes. 26 percent of high school students and 8 percent of middle school students indicate that one or more of their four closest friends uses smokeless tobacco.

Both middle and high school males were more likely than their female counterparts to have received something with a tobacco company name or picture on it (14% vs. 10% and 20% vs. 16% respectively). Middle and high school males were also much more likely to have one or more of their closest friends being smokeless tobacco users (11% vs. 5% and 32% vs. 20% respectively). The remaining sex differences were minimal.



**TOBACCO PREVENTION ACTIVITY EXPOSURE: Middle and High School (Total and by Sex)**

Figure 49 below indicates the extent to which Iowa’s middle and high school students are exposed to various prevention activities. Only 11 percent of high school students and 16 percent of middle school students participated in programs to quit smoking. Only 15 percent of high school students indicate they have practiced ways to say “NO” to tobacco in any of their classes during the current school year. On the other hand, nearly half (54%) of middle school students indicate they have practiced saying “NO” to tobacco use. 14 percent of high school students report that they have participated in a community activity in the past 12 months that was designed to discourage people their age from using tobacco. A larger number (30%) of middle school students indicate they have participated in such community activities. Finally, a large.

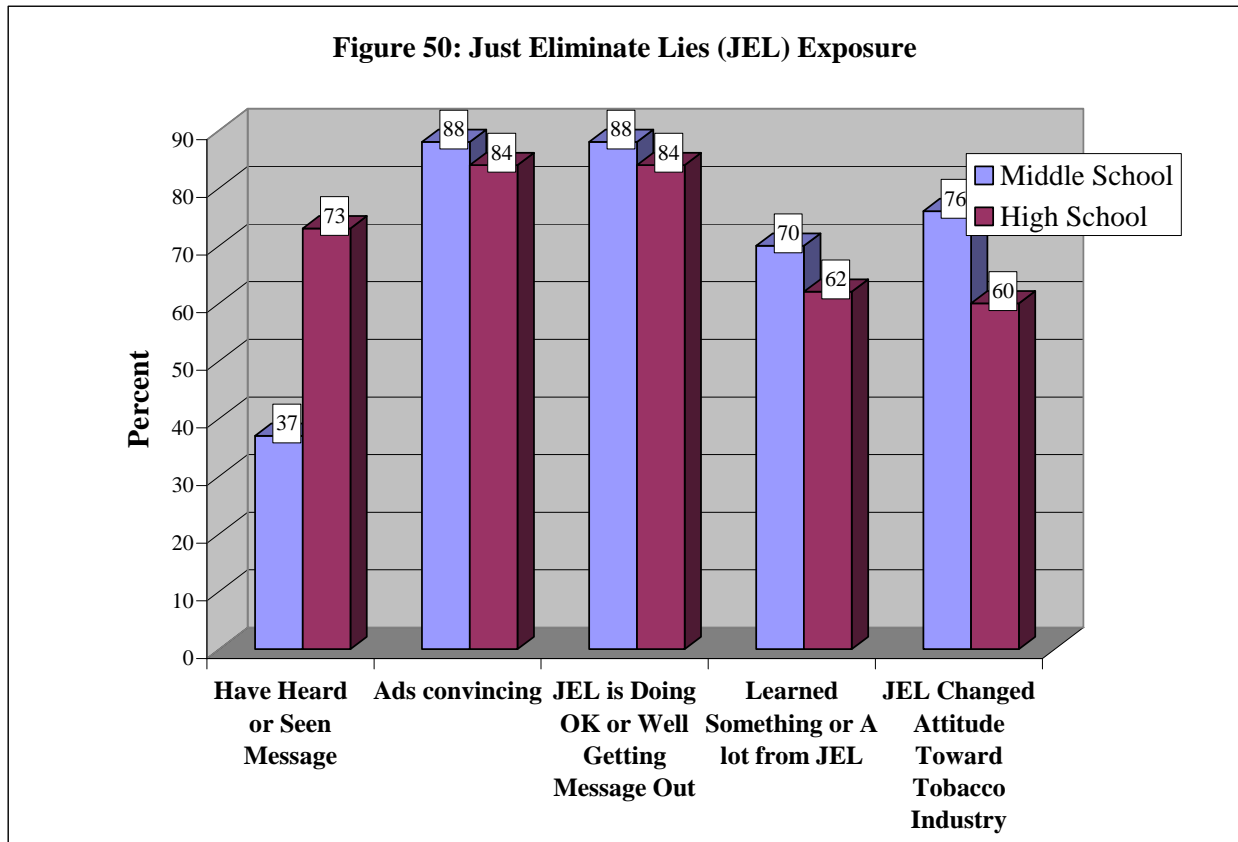


majority of both middle (73%) and high school (84%) students report that they have seen or heard commercials on TV, the internet or the radio about the dangers of cigarette smoking

More males than females in both middle school and high school participated in programs to help quit smoking tobacco. There was no sex difference in either middle or high school for students to participate in activities where they practiced saying “no” to tobacco. Middle and high school females were slightly more likely to have taken part in a community prevention program. Also middle and high school females are more likely than their male counterparts to have seen or heard commercials about the dangers of cigarette smoking.

## Just Eliminate Lies (JEL) Youth-led Campaign

As can be seen in Figure 50 the anti-smoking campaign, JEL, has been seen or heard by almost twice as many high school students than middle school students. Yet, middle school students who have seen it show somewhat more favorable attitudes toward the message.



## TECHNICAL TABLES

Table 1: Number of Surveys Completed in 2006 Iowa Youth Tobacco Survey

<b>Sample</b>	<b>Number Students Surveyed</b>
Total (Grades 6-12)	3,946
Middle School (Grades 6-8)	1,669
Male	816
Female	849
High School (Grades 9-12)	2,277
Male	1,136
Female	1,130
Total Current (past 30 days) Cigarette Smoker (Grades 6-12)	537
Middle School Current (past 30 days) Cigarette Smoker (Grades 6-8)	71
Male	28
Female	43
High School Current (past 30 days) Cigarette Smoker (Grades 9-12)	466
Male	235
Female	228
Total Current Cigarette Smoker Under Age 18 (Grades 6-12)	455
Middle School Current Cigarette Smoker Under Age 18 (Grades 6-8)	71
Male	28
Female	43
High School Current Cigarette Smoker Under Age 18 (Grades 9-12)	384
Male	186
Female	195
Total Current Smokeless Tobacco User Under Age 18 (Grades 6-12)	196
Middle School Current Smokeless Tobacco User Under Age 18 (Grades 6-8)	37
Male	28
Female	9
High School Current Smokeless Tobacco User Under Age 18 (Grades 9-12)	159
Male	130
Female	26

\*This table is provided to give readers some indication of the number of students included in the analyses presented. The “Number Students Surveyed” column is not always the precise number of students that were used in the analyses (there were some students who failed to respond to some questions), but they are close enough to give the reader some indication of the approximate number of students that the prevalence rates in this report are based on.

**Table 2. Selected Tobacco Product Use Prevalence Rates, Including 95% Confidence Intervals (CIs)\*: Middle and High School**

<b>Tobacco Product</b>	<b>Middle</b>	<b>CI</b>	<b>High</b>	<b>CI</b>
Ever Used				
Any Tobacco Product	26.7	3.4	55.6	3.9
Cigarettes	17.0	4.1	48.1	4.5
Smokeless Tobacco	9.6	1.7	21.5	3.6
Current (Past 30 days) Use				
Any Tobacco Product	6.5	1.6	29.7	4.4
Cigarettes	3.6	1.4	22.5	4.6
Cigars	2.3	0.9	13.4	2.0
Smokeless Tobacco	2.1	1.0	8.7	2.4

**Table 3. Selected Tobacco Product Use Prevalence Rates, Including 95% Confidence Intervals (CIs)\*: Middle School by Sex**

<b>Tobacco Product</b>	<b>Male</b>	<b>CI</b>	<b>Female</b>	<b>CI</b>
Ever Used				
Any Tobacco Product	29.1	4.7	26.7	3.4
Cigarettes	18.2	5.2	15.9	4.0
Smokeless Tobacco	13.0	2.8	6.0	1.3
Current (Past 30 days) Use				
Any Tobacco Product	6.6	2.5	6.4	1.5
Cigarettes	2.8	1.8	4.4	1.4
Cigars	2.6	1.6	2.1	0.8
Smokeless Tobacco	3.3	1.8	0.9	0.7

**Table 4. Selected Tobacco Product Use Prevalence Rates, Including 95% Confidence Intervals (CIs)\*: High School by Sex**

<b>Tobacco Product</b>	<b>Male</b>	<b>CI</b>	<b>Female</b>	<b>CI</b>
Ever Used				
Any Tobacco Product	59.4	4.8	51.4	5.2
Cigarettes	49.3	5.5	46.7	5.4
Smokeless Tobacco	31.6	5.4	10.8	2.4
Current (Past 30 days) Use				
Any Tobacco Product	34.2		25.6	
Cigarettes	22.6	4.9	22.4	5.4
Cigars	17.9	2.5	8.5	2.5
Smokeless Tobacco	14.2	4.5	2.8	1.1

\*The Confidence Intervals (CIs) mean that we can be 95% confident that the actual prevalence rates are within that many percentage points (either larger or smaller) of the observed prevalence rates in this sample. For example, we can be 95% confident that between 41.3% and 51.1% of Iowa's middle school (grades 6 through 8) students have tried some tobacco product in their lifetime. Similarly, we can be 95% confident that between 64.5% and 70.5% of Iowa's high school students (grades 9 through 12) have tried a tobacco product in their lifetime.