

# Tobacco Use



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Governor

This report was made possible by the collaborative efforts of Mansfield University, the Tioga County Partnership for Community Health and the Pennsylvania Department of Health.

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## **Acknowledgements**

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# Tobacco Use in Tioga County, Pennsylvania

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## Introduction

In conjunction with the national program Healthy People 2010, the Tioga County Partnership for Community Health is collecting and monitoring indicator data that pertains to key health issues in the area. Healthy People 2010 is a comprehensive national health promotion and disease prevention agenda with set objectives that are designed to guide health agencies to improve the health of all people. The two main goals of this program are to 1) increase quality and years of healthy life and 2) eliminate health disparities.<sup>1</sup> Of the 28 focus areas and 467 objectives within the national program, the Tioga County Partnership for Community Health is tracking 8 focus areas and approximately 35 objectives. The selection of key indicators for Tioga County was based on priority health issues that were identified previously, appropriateness of objectives and availability of data. The focus area for this report is tobacco use and addresses the following Healthy People 2010 objectives:

- Reduce the percentage of adults who: smoke cigarettes.  
use smokeless tobacco.
- Reduce the percentage of youths who: use tobacco products.  
smoke cigarettes.  
who use smokeless tobacco.
- Increase the average age of first use of tobacco products among adolescents.
- Reduce smoking during pregnancy.
- Reduce lung cancer deaths.

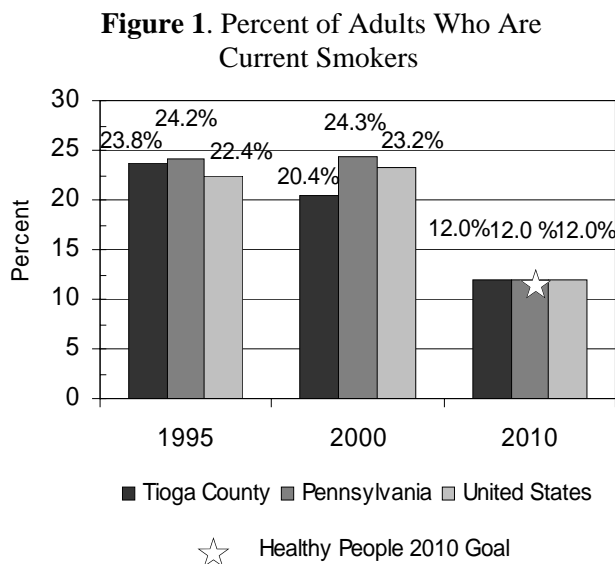
## Background

The use of tobacco, particularly smoking, is a major health concern for Tioga County. On the national level, tobacco use is responsible for 1 in 5 deaths.<sup>2</sup> Half of all persons who continue to smoke will die from a disease caused by smoking. Smoking is related to at least 30% of all cancer deaths and is a major cause of heart disease, cerebrovascular disease, chronic bronchitis and

emphysema in adults.<sup>3</sup> In addition, choosing not to smoke is one of the most important things pregnant women can do to prevent a poor pregnancy outcome. Twenty to thirty percent of low birth weight babies are the result of women smoking during pregnancy, as are approximately 10% of all infant deaths and up to 14% of pre-term births.<sup>4</sup>

## Trends In Tioga County Cigarette Use

Unlike state and national data, the percent of adults who smoke in Tioga County appears to have declined by 3.4% from 23.8% in 1995 to 20.4% in 2000.<sup>5,6</sup> State and federal levels have remained fairly constant (Figure 1).<sup>7</sup> Additional years of county level data are needed to determine if this decline is a legitimate downward trend. Tioga County residents must continue their efforts regarding tobacco prevention and cessation in order to reach the Healthy People 2010 goal of no more than 12% of adults who use tobacco.



Sources: CDC Behavioral Risk Factor Surveillance System 1995 & 2000, Tioga County Health Survey 1995 & 2000.

Tioga County has a similar distribution of adults who use tobacco when compared to state and national data. The four groups who are most likely to use tobacco include males, low income, persons without a high school diploma and young adults. In Tioga County, the biggest difference between these groups occurs when categorized by household income. In the Tioga County Health Survey 2000, those categorized as poor were much more likely to smoke than those in the near-poor and middle/upper income groupings (Table 1).<sup>6</sup>

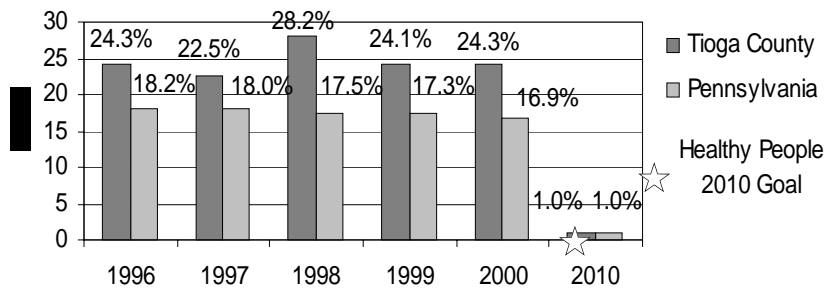
Tioga County has a high percentage of women who smoke during pregnancy. Data tabulated by the Pennsylvania Department of Health indicates approximately 25% percent of pregnant women in Tioga County are smoking during pregnancy (Figure 2).<sup>8</sup> This is similar to data from the Tioga County Health Survey 2000, where 26.1% of women reported having smoked sometime during their most recent pregnancy.<sup>6</sup> Again, the poor and those without a high school diploma were more likely to have smoked during pregnancy. Both numbers are well above the state level and are far from the Healthy People 2010 goal of 1%.

**Table 1.** Demographics of Current Smokers in Tioga County

<u>Sex</u>	<u>Yes(%)</u>	<u>No(%)</u>
Male	<b>21.4</b>	78.6
Female	17.2	82.8
<u>Age</u>		
18-39	<b>27.0</b>	73.0
40-64	17.5	82.5
65+	9.7	90.3
<u>Income*</u>		
Poor	<b>40.7</b>	59.3
Near Poor	17.7	82.3
Middle/High	16.0	84.0
<u>Education</u>		
No H.S. Diploma	<b>23.8</b>	76.2
H.S. Diploma	20.4	79.6
Some College	13.2	86.9

\*Cut-off points for Poor, Near Poor and Middle/High Income are <\$15,000, \$15,000 to <\$50,000 and >\$50,000 respectively. Placement into one of these three categories was based on calculations that include both family income and the number of family members living in the immediate household. Source: The Tioga County Health Survey, 2000.

**Figure 2.** Percent of Women Who Smoke During Pregnancy



Source: Pennsylvania Department of Health, 2002.

## Trends In Tioga County, continued

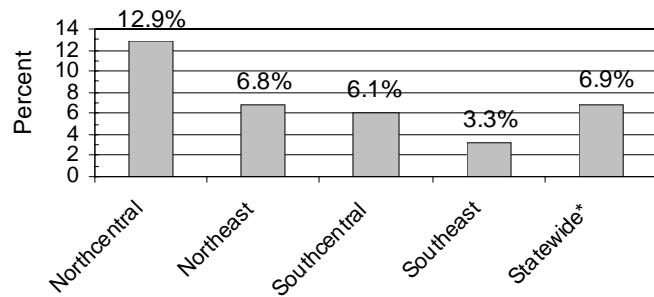
### Smokeless Tobacco and Youth

Recent youth surveys suggest that high numbers of Tioga County youths use smokeless tobacco. Like other tobacco products, smokeless tobacco, also called “spit”, “snuff” or “chew”, contains nicotine, is addictive and has detrimental effects on one’s health. The health consequences of using smokeless tobacco include increased risk of tooth abrasion, gum recession, tooth decay and higher rates of pre-cancerous mouth sores called leukoplakia.<sup>9</sup> Smokeless tobacco contains a number of carcinogens. Because it is held in the mouth for several minutes at a time, more of these chemicals are absorbed into the blood and digestive tract than while smoking. Smokeless tobacco users have a greater risk of developing oral or mouth cancer.<sup>9</sup> They are also at a greater risk of developing cancers of the esophagus, pharynx and larynx as well as the stomach, pancreas and prostate.<sup>9</sup>

In the Pennsylvania Youth Tobacco Survey (2001), which looks at youth tobacco use by health district, 12.9% of public high school students in the North-central District, which includes Tioga County, reported being current users of smokeless tobacco (Figure 3).<sup>10</sup> This number is approximately twice as high as all other districts. Furthermore, this survey showed that of those public high school students who were current users of tobacco (all types), 25.3% reported living with a current smokeless tobacco user (Figure 4).

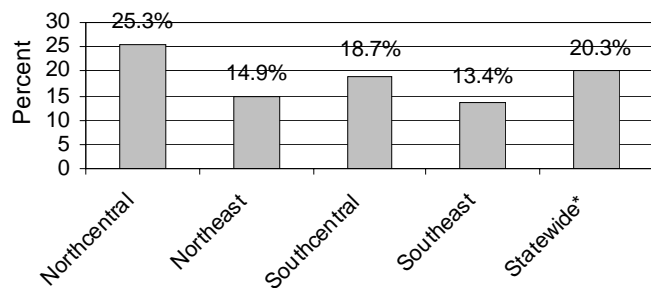
In the 2001 Communities that Care (CTC) Youth Survey, which examines youth risk behavior trends at the county level, use of smokeless tobacco by 6th graders in Tioga County was 4.6 times higher than the state level.<sup>11</sup> Use of smokeless tobacco by 8th graders in Tioga County was approximately twice as high as the state level (Figure 5). In Tioga County, use of smokeless

**Figure 3.** Public High School Current Smokeless Tobacco Use by Health District and Statewide, 2001.



Source: Pennsylvania Department of Health, 2002.

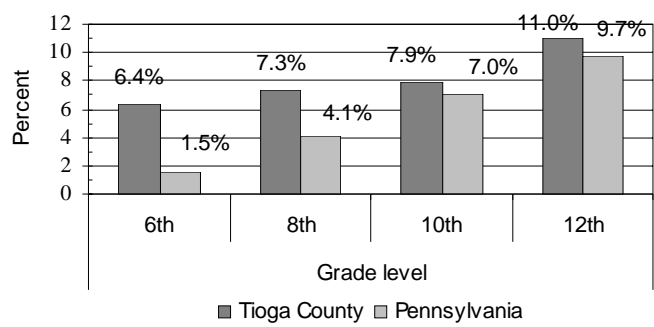
**Figure 4.** Public High School Current Tobacco Users Who Live with a Current Smokeless Tobacco User by Health District and Statewide, 2001.



Source: Pennsylvania Department of Health, 2002.

\*For both figures 3 and 4 participation by public high schools in the Northwest and Southwest was less than 60%. Therefore, individual inferences were not made. State totals do, however, include these districts.

**Figure 5.** Past 30 Day Use of Smokeless Tobacco, 2001.

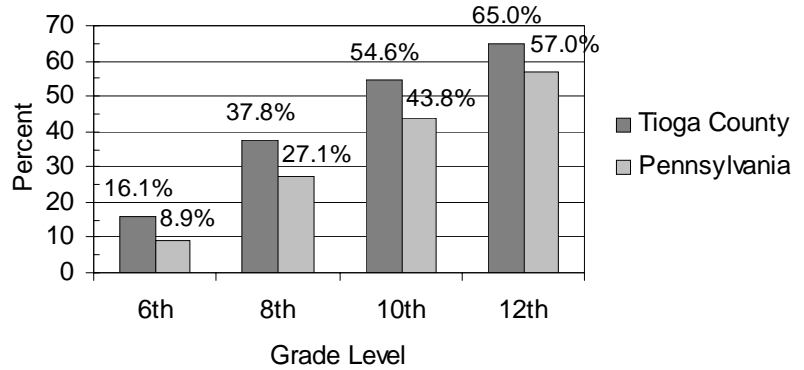


Source: Channing Bete Company, Inc., 2002.

tobacco by 10th and 12th graders was slightly higher than state levels. In addition, male youths were much more likely to use smokeless tobacco (12.8%) than females (3.7%).

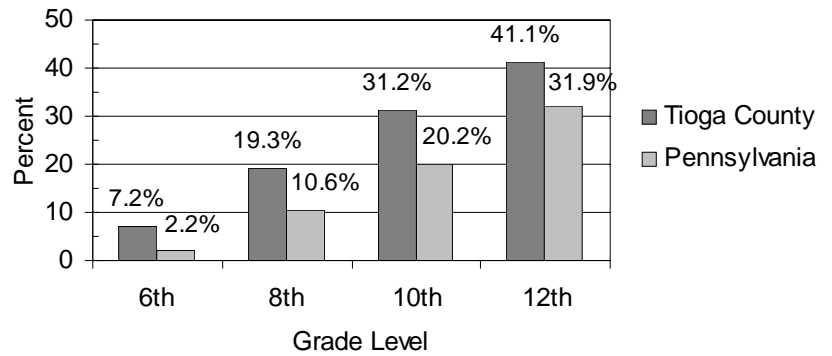
Reducing smokeless tobacco use is important not only because of its negative health outcomes but also because smokeless tobacco users are more likely to begin smoking cigarettes.<sup>12</sup> According to the CTC Survey (2001), Tioga County youths reported higher rates of lifetime and past 30 days cigarette use than state levels (Figures 6 & 7).<sup>11</sup> With approximately 12.8% of adolescent males and 8.1% of adult males using smokeless tobacco, prevention and cessation efforts should be directed towards these groups (Table 2).<sup>6</sup> Reducing the number of Tioga County residents who use smokeless tobacco will not only help make progress towards the Healthy People 2010 goal of no more than 0.4%, but may also help decrease the number of residents that begin to smoke.

**Figure 6.** Youth Lifetime Use of Cigarettes, 2001.



Source: Channing Bete Company, Inc., 2002.

**Figure 7.** Youth Past 30 Day Use of Cigarettes, 2001.



Source: Channing Bete Company, Inc., 2002.

**Table 2.** Demographics for Current Smokeless Tobacco Users in Tioga County.

	Percent of users	
	Chew	Snuff
Males	2.8	5.3
Females	0.0	0.2
All Adults	0.9	1.8

This data was obtained from valid survey responses to a question regarding use of tobacco products other than cigarettes. Response options also included none, cigars and pipes to equal 100%.

Source: Tioga County Health Survey, 2000.

## Health Outcomes

The use of tobacco has detrimental effects not only on Tioga County residents but also on the community as a whole. According to 1997 figures from the Pennsylvania Department of Health, Tioga County residents who died prematurely from a smoking related cause lost an average of 12.4 years from their potential life span.<sup>13</sup> These premature deaths are estimated to be a loss of over \$7.3 million in future wages and productivity. In addition, the cost for treating chronic diseases related to smoking, such as lung cancer, heart disease and emphysema for persons over the age of 35, is estimated at over \$5.2 million (Tables 3-5). This means the total economic cost to Tioga County for smoking related deaths is over \$13 million.

**Table 3.** Years of Potential Life Lost & Value of Future Productivity Lost, 1997.

<u>Years of Potential Life Lost</u>		<u>Value of Future Productivity Lost</u>
Males	640	\$5,120,796
Females	373	\$2,222,636
Total	1,013	\$7,343,432

Source: Pennsylvania Department of Health, 1997.

**Table 4.** Total Smoking Related Health Care Costs, Ages 35 and Older, 1997

	<u>Health Care Cost</u>
Hospital Charges	\$3,632,304
Physician Fees	\$533,047
Nursing Home Fees	\$609,722
Medication Costs	\$423,959
Other	\$38,983
Total	\$5,238,015

Source: Pennsylvania State Data Center, 1997.

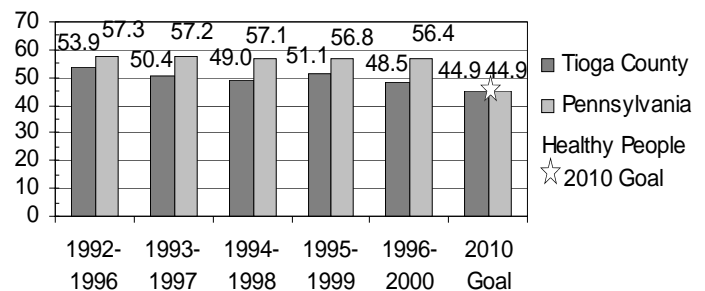
**Table 5.** Smoking-Related Days and Lost Productivity, Ages 35 and Older, 1997

	<u>Days of Disability</u>	<u>Lost Wages/Productivity</u>
Males	9,568	\$786,744
Females	4,664	\$364,730
Total	14,232	\$1,151,474

Source: Pennsylvania Department of Health, 1997.

Fortunately, it appears that the lung cancer death rate in Tioga County is declining slowly while the state rate has remained fairly constant (Figure 8).<sup>8</sup> If Tioga County residents continue to lower the number of persons who smoke, it is highly possible to reach and surpass the Healthy People 2010 age-adjusted lung cancer death rate goal of 44.9 per 100,000.

**Figure 8.** Age-Adjusted\* Lung Cancer Death Rate Per 100,000.



\*Age-adjusted using 2000 standard population.  
Source: Pennsylvania Department of Health, 2002.

## Action

In order to meet the Healthy People 2010 goals within the tobacco focus area, Tioga County must continue to promote and participate in tobacco prevention and cessation programs. In addition, these programs must be effectively and efficiently distributed to groups who are more likely to smoke. These priority populations, which are the same for both the state of Pennsylvania and Tioga County, include the young, the poor, those less educated, males and pregnant women. Local healthcare providers must begin or continue to advise patients on the health risk of smoking. In the Tioga County Health Survey 2000, only 31% of respondents reported their healthcare provider had advised them on the health outcomes related to smoking.<sup>6</sup> Of these, males were more likely than females to have been advised.

Healthcare professionals who provide prenatal care must make an extra effort when dealing with pregnant clients. Pregnancy is an excellent time to educate women on the harms of tobacco use to themselves as well as their unborn child. Rather than just asking pregnant women, "Do you smoke?" it is hoped that prenatal caregivers are familiar with and follow evidence-based Clinical Practice Guidelines for addressing tobacco use in pregnant women.<sup>14</sup> These guidelines, which include a five-step process (ask, advise, assess, assist and arrange) were released in June of 2000 by the U.S. Department of Health and Human Services.

Additional evidence-based best practices are currently being implemented. In conjunction with Pennsylvania's Master Settlement Agreement that outlines requirements for tobacco prevention and cessation activities, the Tioga County Partnership For Community Health, as a primary contractor, and the Tioga County Tobacco Coalition are currently working on the 47 deliverables of this program. These deliverables, set by the state, support and follow the Centers for Disease Control and Prevention best practice guidelines and Healthy People 2010 objectives. They include programs addressing cessation, chronic disease prevention, education in communities and schools, counter-marketing, enforcement and surveillance. Service providers within this program

include Tioga County Human Services Agency, Harbor Counseling, Laurel Health System's Community Support Services, Laurel Health Centers, Mansfield University, the American Lung Association, The Northcentral Pennsylvania Area Health Education Center and Mental Health Associates.

## Conclusion

While many health facilities and organizations are committed to tobacco use prevention and cessation, it is necessary for the residents of Tioga County to also be involved. There are a number of activities that individuals can do to help Tioga County meet state deliverables and the national goals of Healthy People 2010. By doing so, individuals will help improve the health of Tioga County. Readers of this report are encouraged to do the following:

- 1) If you smoke - quit now. Pennsylvania offers a free quit line to help smokers who want to quit. The number is 1-877-724-1090. It is available 24 hours a day, 7 days a week.
- 2) If you know someone who uses any type of tobacco product, encourage them to quit, offer support during the cessation process and refer them to the quit line.
- 3) Establish no smoking policies in your home and vehicle.
- 4) Support tobacco-free schools, worksites, community locations and restaurants.
- 5) Help limit youth access and exposure to all types of tobacco products.

## References

- 1) Centers for Disease Control and Prevention (2002). *About Healthy People 2010*. Retrieved 11/11/02 from <http://www.cdc.gov/nchs/about/otheract/hpdata2010/abouthp.htm>.
- 2) McGinnis, J. & Foege, W. (1993). Actual causes of death in United States. *Journal of American Medical Association*, 270, 2207-2212.
- 3) American Cancer Society. (2002). *Cancer facts and figures 2002: Tobacco use*. Retrieved July 24, 2002 from <http://www.cancer.org/downloads/STT/CancerFacts&Figures2002TM.pdf>.
- 4) American Lung Association. (2002). *Smoking and pregnancy fact sheet*. Retrieved 11/11/02 at [http://www.lungusa.org/tobacco/pregnancy\\_factsheet99.html](http://www.lungusa.org/tobacco/pregnancy_factsheet99.html).
- 5) Bok, M. (1995). *Health status survey results for Tioga County*. Mansfield, PA: Mansfield University, Rural Services Institute.
- 6) Craig F. (2000). *The Tioga County health survey 2000*. Mansfield, PA: Mansfield University, Tioga County Partnership for Community Health.
- 7) Centers for Disease Control and Prevention, Behavioral Risk Factor Surveillance System. (1995 & 2000). *Trends data (nationwide and by state) - current smokers* [Data files]. Retrieved 11/1/02 from <http://apps.nccd.cdc.gov/brfss/Trends/trendchart.asp?qkey=10000&state=US>.
- 8) Pennsylvania Department of Health. (2002). *Healthy People 2010 - County and State Statistics*[Data files]. Retrieved 11/11/02 from <http://webserver.health.state.pa.us/health/cwp/view.asp?a=175&Q=229393>.
- 9) National Cancer Institute. (1998). *Cancer facts: Questions and answers about smokeless tobacco and cancer*. Retrieved 1/2/03 from [http://cis.nci.nih.gov/fact/3\\_63.htm](http://cis.nci.nih.gov/fact/3_63.htm).
- 10) Pennsylvania Department Health. (2002). *Pennsylvania Youth Tobacco Survey 2001 Report, Middle and High School Students*. Harrisburg, Pennsylvania: Bureau of Chronic Diseases and Injury Prevention, Division of Tobacco Prevention and Control.
- 11) Channing Bete Company, Inc. (2002). *Communities That Care Youth Survey Report, Tioga County 2001*. South Deerfield, MA: Author.
- 12) U.S. Department of Health and Human Services. (1994). *Preventing Tobacco Use Among Young People: A Report of the Surgeon General*. Atlanta, GA: U.S. Department of Health and Human Services, Public Health Service, Centers for Disease Control and Prevention, National Center for Chronic Disease Prevention and Health Promotion, Office of Smoking and Health.
- 13) Pennsylvania Department of Health. (1997). "Smoking Facts..." , a series of 68 individual information sheets-one for each county and one for the Commonwealth. Harrisburg, Pennsylvania: Produced under contract with the Pennsylvania Department of Health, Health Risk Reduction, Tobacco Control Program.
- 14) Borzo, G. (2000). Smoking cessation guidelines address pregnancy. *OB GYN News*, 35, 29.



... to improve the health and quality of life of individuals and communities in Tioga County.

### Work Groups and Committees

Charlie's Place	Community and Family Health
Elder Services	Fit for Life
Healthy Families	Planning Committee
Immunization	Kids First
Mental Health	Measurement & Outcomes
Countryside Council	Tobacco Coalition
Communities that Care (CTC)	Disability Awareness Network
Community Access Program (CAP) Operating Committee	Alcohol, Tobacco and Other Drugs (ATOD)

If you would like to learn more about these groups or would like to be a member please contact the Tioga County Partnership for Community Health.

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