



## The Ups and Downs of Comparing Teen Substance Abuse Data

By Beth Berk

### Overview

Prevention providers often rely on surveys and studies to determine both trends in the field and the effectiveness of prevention efforts. However, even within one particular aspect of prevention, surveys can be interpreted quite differently. This *Research to Practice* paper will look at one focus of prevention efforts – teen substance abuse – and show how surveys might seem to highlight one issue, while downplaying another. Much as the buyer should beware in consumer spending, the prevention provider should be wary of survey highlights. As much as possible, it is best to check actual numbers, and consult several surveys, to get the best picture when tracking trends.

### An Example: The Monitoring the Future Survey

In December 2009, the National Institute on Drug Abuse (NIDA) released figures from its annual Monitoring the Future (MTF) survey of 8th through 12th graders. The survey is one of several conducted throughout the country to ascertain trends in drug use and to help identify where to focus prevention efforts. The MTF classroom surveys are conducted by researchers at the University of Michigan under a grant from NIDA, part of the National Institutes of Health (NIH).

Headlines from an NIH news release about the 2009 MTF survey highlighted low levels of teen methamphetamine use and cigarette smoking. However, headlines from the University of Michigan's news release about the same survey highlighted the fact that teen marijuana use was tilting up and some drugs were declining in use. Ultimately each organization is reporting what it believes are the new and interesting trends. Both downplayed alcohol



use among teens in their news releases, mentioning that it has been in a long-term gradual decline at all three grade levels surveyed – even though alcohol consistently rates as the substance most abused by teens.<sup>1</sup> NIDA says the reason is that the NIH already has another research branch, the National Institute on Alcohol Abuse and Alcoholism (NIAAA), which focuses its full attention on alcohol.

“When we put out MTF, we recognize alcohol is, in most communities, the worst problem,” says Liz Robertson, PhD, NIDA’s Chief of Prevention Research. “But our mission is helping to prevent drug abuse, so we highlight the emerging drug trends. We know that alcohol is always there.”

Even prevention providers who know which agencies focus on which substances, might find it hard to decide if the trend for any particular substance is really heading down. The following provides an illustration of this.

<sup>1</sup> U.S. Department of Health and Human Services. The Surgeon General’s Call to Action to Prevent and Reduce Underage Drinking. U.S. Department of Health and Human Services, Office of the Surgeon General, 2007.

The MTF 2009 survey found that alcohol use has been in a long-term, gradual decline at all three grade levels surveyed (8th, 10th and 12th grades). Past month use fell by over 40 percent among 8th graders, over 25 percent among 10th graders and by one sixth among 12th graders. NIDA InfoFacts: High School and Youth Trends reports that from 2004 to 2009, decreases were observed in lifetime, past-year, past-month, and binge use of alcohol across the three grades surveyed.

However, the Partnership for a Drug-Free America's highly respected teen survey shows what it calls a "resurgence" in teen drug and alcohol use. According to the 2009 Partnership Attitude Tracking Study (PATS), sponsored by MetLife Foundation, the number of teens in grades 9 through 12 that used alcohol in the past month has grown by 11 percent (from 35 percent in 2008 to 39 percent in 2009).

Experts say the difference in prevalence percentages among major surveys is primarily due to the methodology used to conduct the survey. "Each survey undergoes a process of 'data cleaning' which means that inconsistencies are used to delete certain responses," says Barbara Delaney, Senior Vice-President and Director of Research for the Partnership for a Drug-Free America. "The MTF process is tighter

and more rigorous than PATS, which helps explain why PATS numbers are often higher than MTF. The main advice I would give is to look at the trends over time – MTF and PATS have very consistent trends."

## Tips on Interpreting Survey Data

### 1. Look for Trends Over Time

Looking at trends over time is one of the best ways to understand them. "It's always better to look over time because then you are able to assess where you are going," says Robertson. "For example, for five years your emphasis might be on methamphetamine because there's a drug route coming up from Mexico that's bringing meth in. So you work on that very hard and you see the trends are going down, but without taking a long term look at it you don't know how much. And you don't know if other things are creeping up while that's going down. So you always have to take a long term look at it."

### 2. Understand How the Survey is Conducted

A popular nationwide survey, the National Survey on Drug Use and Health (NSDUH) is conducted in homes, and has consistently lower prevalence percents than other youth surveys. "The primary reason is the situation," says Delaney. "Parents and caregivers are in the home when the adolescent completes the survey, unlike MTF, PATS, and YRBS (Youth Risk Behavior Survey) which are conducted in schools." She says that even though MTF, PATS, and YRBS are conducted in schools there will also be differences in absolute prevalence percentages primarily due to sample identification and data cleaning. Another difference is that YRBS is only conducted every two years, rather than annually.

### 3. Read News Releases and Survey "Highlights" with Caution

Emphasis on certain trends may be due to the issuing agencies' particular areas of concern. "I would recommend that a prevention provider/organization look at the trends of the particular drug in which they are interested as well as reading the individual press releases," Delaney says.

NIDA's Robertson agrees. "When we, for example, highlight things such as prescription drug abuse, that's because it's an emerging trend among youth



and it's a very dangerous thing, and we don't want it to explode into a huge epidemic," Robertson says. "When we see a bump up of 2 or 3 percent in a relatively low base rate drug, that's a great concern. Especially when we filter that through the availability of the drug. For kids, for example, the availability of prescription drugs is very high."

She suggests that prevention providers also use caution when they hear about substance abuse news stories that take place in other regions. "If a big story hits the news, but it's in Baltimore, Maryland, what relevance does that really have to your population?" she says. "You really have to filter all of that through the lens of – what is my real demographic here?"

#### 4. Find Local Data

National trends are important because they give a standard to which you can compare state, county or local-level data and see how you are doing. But ultimately, local communities need to understand how their substance abuse problems relate to the national picture. The following is an excerpt from an interview with Tamu Nolfo, PhD, a certified prevention specialist based in Northern California.

"If you are not getting down into your own local data, you're really missing the mark in prevention." She says data from MTF and other national surveys provide interesting information, such as monitoring trends over a period of years or seeing how policies can change things. But Nolfo says most prevention providers will need to get data for the area that they are responsible for. "You need data that speaks to what your risk factors are," she says. "Those risk factors are generally applicable to all substances."

CARS has partnered with Dr. Nolfo to develop a matrix of several common data sources with information on who is surveyed, how the information is collected, and how the data sources might be studied together to see where findings overlap (see Resources). Most California-based prevention providers look at the California Healthy Kids Survey and/or the California Student Survey.

NIDA's Robertson suggested community-based prevention providers who want more information consult two NIDA publications: "Community Monitoring Systems: Tracking and Improving the

Well-Being of America's Children and Adolescents" and "Preventing Drug Use Among Children and Adolescents: A Research-Based Guide for Parents, Educators, and Community Leaders (Second Edition)," commonly known as the Red Book. The Substance Abuse and Mental Health Services Administration (SAMHSA) has added "Communities that Care" (CTC) as a part of the CSAP toolkit. SAMHSA allows interested people to download CTC materials from the website and use them in implementing prevention programs. The Bach Harrison Youth Survey, also known as the Prevention Needs Assessment Survey, is another tool for gathering data in any interested state, community, school district, or school. The survey gathers information typically needed to plan prevention and intervention programs.

#### Resources:

Companion piece: "Survey Data Sources for Substance Abuse Prevention: A Review and Summary" [http://www.ca-cpi.org/Publications/publications\\_main\\_page.htm](http://www.ca-cpi.org/Publications/publications_main_page.htm)

NIDA's Red Book – "Preventing Drug Use Among Children and Adolescents: A Research-Based Guide for Parents, Educators, and Community Leaders (Second Edition)" <http://www.drugabuse.gov/pdf/prevention/RedBook.pdf>

NIDA's "Community Monitoring Systems: Tracking and Improving the Well-Being of America's Children and Adolescents" <http://www.drugabuse.gov/pdf/cms.pdf>

SAMHSA's "Communities that Care" <http://preventionplatform.samhsa.gov/>  
Bach Harrison Youth Survey <http://www.bach-harrison.com/BHResources/PNASurvey.aspx>



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