Adolescent Substance Use

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Adolescent substance use has been called the number one public health threat in the United States.[1] In 2011, a nationally representative household survey found that adults rated drug abuse as the number one health concern for youth (tied with obesity) among a list of 23 health issues.[2] The federal government also recognizes the public health burden and included 21 policy and prevention goals for substance use in Healthy People 2020, the current 10-year national objectives established by the US Department of Health and Human Services to improve the health of all Americans.[3]

Concerns about the consequences of adolescent substance use are well founded. Alcohol, the substance most commonly used by teens, is involved in more than one-third of the deaths from unintentional injury, homicide, and suicide, which together account for three-fourths of mortality in the 15- to 19-year age group.[4] Marijuana use has risen sharply over the past several years; currently, one in ten teens uses marijuana nearly every day—an increase of 60% from rates of use in 2008.[5] Likely fueled by changing marijuana policy, continued declines in the proportion of adolescents who perceive great risk of harm associated with marijuana use[6] suggest that these rates will continue to climb in the foreseeable future. Declines in tobacco use by high school students have plateaued since 2007; nearly one-half (44.7%) of 9th through 12th graders report having tried cigarettes, and nearly one-quarter (23.4%) report current (past 30 days) use of tobacco in any form.[7] Newer products such as hookah and electronic or e-cigarettes, which deliver nicotine via vapor, and newer marketing methods, including personalized ads presented via social media, threaten to attract increasing numbers of youth to using nicotine with flavors such as cotton candy and bubble gum. In addition to acute harms and medical complications associated with substance use, early initiation of use during adolescence is associated with an increased likelihood of developing a severe substance use disorder—a chronic neurological condition resulting from disruption of neurons in the nucleus accumbens, sometimes referred to as the brain's reward center.

New health care models demand that medical homes increase their capacity to identify and address mental and behavioral health problems. Preventing, identifying, and addressing substance use in childhood and adolescence offers perhaps the great promise in reducing associated morbidity and mortality. Pediatricians and other primary care providers who care for children and adolescents are ideally positioned to provide anticipatory guidance to families. Primary care providers can assure parents that it is never too early to start talking about substance use in a developmentally appropriate manner and that there is no such thing as too much discussion of this topic. Particularly as children enter adolescence, parents can be coached on both the importance of role modeling and how to teach their children to manage strong emotions and stress without substances. Clinicians can also provide guidance to children and their parents on navigating the complex landscape of social media. This landscape is particularly challenging for many families because the current generation of parents are raising the first generation of digital natives and cannot count on their own childhood experiences to guide them. Evidence-based, meaningful suggestions from a professional may help children and families to avert the hidden dangers of this new frontier.

Beyond advice and guidance, primary care clinicians are tasked with screening each adolescent patient for substance use and intervening to prevent, delay, or reduce substance use, a strategy referred to as Screening, Brief Intervention, Referral to Treatment—or SBIRT. According to the 2014 National Drug Control Strategy, "early detection and treatment of a substance use problem by a doctor, nurse, or other health care professional is much more effective and less costly than dealing with the consequences of addiction or

criminal justice involvement later on."[8] To achieve the goals of this mandate, SBIRT must be delivered in ways that optimize both efficiency and efficacy, including the use of validated algorithms, targeted clinician guidance, and structured interventions that can be reliably administered with fidelity.

This issue provides a review and practical recommendations for primary care clinicians to address these important issues related to adolescent substance use. The first article describes positive guidance as a technique that clinicians can teach to parents to help them prevent and manage substance use in their children. The second article includes a review of the potential risks of social media use, particularly in regard to substance use. Although there has been little research in this field, the article offers summary recommendations based on what is known about patterns of adolescent use of this media. Finally, the third article presents a new, simplified algorithm for conducting screening and brief intervention based on newer screening tools and nascent literature on behavioral interventions. A functional knowledge base in these three areas should allow clinicians to competently address these important aspects of primary care for adolescents.

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