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Chapter One

Teen Usage

Marijuana is currently the most popular illicit drug used by teenagers. For years marijuana use among teens had been declining. But in the first decade of the twenty-first century, this trend changed. As marijuana became more accepted for medical use, and even recreational use among adults, teens began to perceive marijuana as a harmless, enjoyable drug. Also, many teens found that marijuana was easy to obtain. Over the past decade, statistics show, a decreasing percentage of teens viewed marijuana as a drug that poses risks. The result is an increased percentage of teens experimenting with marijuana.

Paul began experimenting with marijuana at age fourteen. "I started using on a lark, a dare from a best friend who said that I was too chicken to smoke a joint and drink a quart of beer," he said. "I was fourteen at that time." Soon Paul began using marijuana regularly and found that he was unable to stop. He developed negative feelings about himself and his abilities; he also became paranoid and no longer trusted his friends. Paul attributed all of these changes to his marijuana use. After seven years of heavy use, he decided to stop, but to do so, Paul needed the help of an addiction treatment program.

If fourteen sounds young to begin experimenting with marijuana, it is. But it is not uncommon; studies have shown that marijuana use among even younger teens is not unusual. The 2013 Monitoring the Future report, part of an annual study funded by the National Institute on Drug Abuse (NIDA), found that one out of six of eighth graders had tried marijuana. "We should be extremely concerned that 12 percent of 13- to 14-year-olds are using marijuana," commented physician and NIDA director

Nora D. Volkow. "The children whose experimentation leads to regular use are setting themselves up for declines in IQ and diminished ability for success in life."

Marijuana use by both younger and older teens began to increase in the first decade of the 2000s and has continued to rise since then. From just 2012 to 2013, according to the Monitoring the Future study, the percentage of students who had used marijuana once or more in the previous twelve months rose from 11.4

"We should be extremely concerned that 12 percent of 13- to 14-year-olds are using marijuana."

-NIDA Director Nora D. Volkow.

percent to 12.7 percent among eighth graders and 28.0 percent to 29.8 percent among tenth graders; among twelfth graders, use held steady at 36.4 percent. Additionally, the study found that by the time teens graduated from high school, approximately 44 percent of students had tried marijuana at least once.

Marijuana's Popularity

Marijuana is a mixture of the dried and shredded leaves, stems, seeds, and flowers of *Cannabis sativa*, the hemp plant. This plant originated in Asia and now is grown all over the world. It is an annual plant that can grow to a height of 8 to 12 feet (2.4 m to 3.7 m). People grow it both indoors and outdoors. Some grow the plant in large quantities, with the goal of selling and distributing it, and others grow it for their own personal use.

The psychoactive properties of marijuana are directly tied to the chemical tetrahydrocannabinol, or THC, that is found in the plant. This chemical is responsible for the "high" people feel when using marijuana. When marijuana is smoked, the THC quickly passes from the lungs into the bloodstream, which carries the chemical to the brain and other organs throughout the body. When it is eaten (or ingested), the same process takes place but at a slower pace, because the THC has to go through the gastrointestinal tract before entering the bloodstream.



Marijuana is derived from the dried leaves, stems, flowers, and seeds of the hemp plant. Hemp is grown around the world, and its fibers, seeds, and oils are used in making rope, cloth, paper, resins, fuels, and other products.

THC stimulates brain cells to release dopamine, which creates a euphoric feeling. This is the feeling that people are looking for when taking the drug. However, it also interferes with the hippocampus, which is the part of the brain that is involved in forming, organizing, and storing memories and also in connecting emotions and senses to memories. Because it affects the hippocampus, marijuana disrupts how information is processed, so it can result in hallucinations, changes in people's thinking, and delusions. Typically, the effects begin just a few minutes after smoking marijuana, and fifteen to thirty minutes after ingesting it, and then last about two hours.

Teens who experiment with marijuana often continue to use it in hopes of achieving the same feeling they got from their first experience. According to Andrew, a former teen user, "The first time you use, you're going to be way up here. The second time, you're going to be chasing that high feeling. The only reason you keep using is because you want to get up to that place."9

Increasing THC

The amount of THC in marijuana determines the strength of its effects. The buds, which are most often used in making the drug, contain 3 percent to 22 percent THC. People also use the hash oil, a honey-like resin from the plant, to make a stronger drug that is called hash. The resin contains three to five times more THC than the plant itself.

Over the past three decades, the THC in any form of marijuana has greatly increased due to growers' new methods for raising marijuana crops. In 2012 THC concentrations in marijuana averaged close to 15 percent, compared to around 4 percent in the 1980s. "You really have to be careful," stated Mahmoud ElSohly, director of the Marijuana Potency Project. "The danger of this high-potency material is not with the experienced marijuana smokers, but young people who really don't know what they're smoking. They don't know what to expect, and before they know it, they've inhaled too much." 10

How Marijuana Is Used

There are several different ways that people take marijuana, ranging from smoking the leaves as joints to ingesting the leaves by cooking them in items like brownies. The most popular method is smoking a joint. A joint is a hand-rolled cigarette in which the marijuana leaves are rolled up into paper, and then the joint is smoked like a cigarette. Similar to this is a cigar, or blunt, which is smoked after filling a hollowed-out cigar with dried marijuana leaves. As social media has become more popular, teens have easily discovered how to make joints and blunts because people post this information. Obtaining the marijuana and putting the joints or blunts together is a relatively easy process, which is another reason marijuana is popular among teens.

Another way to use marijuana is to smoke it through a bong, or water pipe. Bongs are different than joints in that a bong cools the smoke before it enters a person's lungs, and a larger amount of smoke is inhaled at once. A bong works by filling the base with water, packing marijuana into a bowl that is attached, and igniting the marijuana. Then the user puts his or her lips on the bong's mouthpiece and inhales. The smoke rises through the water before entering the user's mouth, and the water acts as a coolant and a filter, taking out undesirable particles.

Some teens find bongs appealing because they can make them by themselves. Also, they have seen celebrities use bongs for marijuana. In 2014 singer Miley Cyrus posted pictures of herself on Instagram creating a bong. The twenty-one-year-old shared a photo and video of a homemade bong she crafted from fans' gifts. Cyrus created the bong using beads, ribbons, fake flowers, and rainbow bracelets. She released a picture of the final project, which was 5 feet (1.5 m) high and included multiple dinosaur toys, two strobe lights, and fake leaves.

Marijuana can also be ingested, which is often done through edibles, food products made with either the marijuana leaves or hash resin. Typically, the edibles are baked goods such as brownies and cookies, but lollipops and gummy candies have also

School Snacks

Bringing marijuana edibles to school might *sound* like fun but it does not always turn out that way. In December 2014 a seventeen-year-old Maryland high school student admitted to giving his teacher a brownie laced with marijuana. The student later told authorities that he gave the teacher the brownie when she asked him to share. The teacher had no idea that it contained marijuana; she ended up in the hospital. The student was charged with possession and distribution of a controlled substance, second-degree assault, and reckless endangerment.

taken this action. Additionally, in Colorado, where marijuana is legal for adult recreational use, a survey found that there was

actually a small decrease in teenage use after marijuana became legal. According to Colorado's 2011 biennial Healthy Kids Colorado Survey, about 22 percent of high school students admitted to using pot in the month before the survey. The same survey done in 2013, a year after marijuana became legal in Colorado, found that number to be slightly lower, at 20 percent.

"The kids who are going to use it are already using it, whether it's legal or not."²¹

 Alex Zhang, a seventeen-yearold high school student in Oregon.

Easier Access

Even before states started legalizing marijuana for medical or recreational use, the drug was fairly common on high school campuses throughout the United States. Research shows it is now easier than ever for teens to buy it. The 2012 National Survey on American Attitudes on Substance Abuse found that 60 percent of high school students surveyed went to school where drugs were sold on campus, and 91 percent said that marijuana was the drug sold. According to Christina Zidow, chief operating officer of Odyssey House of Utah, a nonprofit substance abuse treatment facility, "It's incredibly easy to access marijuana in the school. Most of the kids in high school could find marijuana in a couple of hours if they wanted to."²²

Although medical marijuana laws are intended to make the drug available only for legitimate medical needs, both teens and adults have found ways around these laws. One way that teens are able to obtain marijuana is by using medical marijuana cards or getting marijuana from people they know who have cards. Teens aged eighteen and nineteen are able to obtain a medical marijuana card if they can find a doctor to write them a prescription. Some younger teens have older friends who use their cards to obtain marijuana and then share it with or sell it to others.



Twenty-three states and the District of Columbia have enacted laws that permit certain patients to use marijuana for medical purposes. Some critics fear that these laws can be exploited by young people who acquire prescriptions for medical marijuana or know someone who has a prescription.

To receive a medical marijuana card, people must fill out an application in a state where medical marijuana is legal and include a doctor's recommendation with the application. Teens and adults have discovered that some doctors are quite lenient about providing a recommendation. Some doctors just question a person for a few minutes, and after being told that the person is experiencing insomnia or anxiety, the doctor issues a certificate recommending marijuana for them. Grant Glidewell, a teen drug and alcohol counselor and founder of Pacific Treatment Services in Escondido, California, explained that the teens he has counseled have easily obtained medical marijuana cards. "The most common thing I hear from kids is that they go in and say they're anxious and can't sleep," Glidewell said. Then they are given a recommendation for a prescription and are able to obtain cards.

Apparently, this method of getting a card is working. The Washington State Healthy Youth Survey found that 39 percent of high school students who used marijuana at the time of the survey said they got the drug from a medical marijuana dispensary. Some of these teens choose to share it with or even sell it to their friends. Paul Weatherly, an addiction counselor in Washington, works with addicted teens. He says his clients talk about obtaining a medical marijuana card (sometimes called a green card) and then share the drug with friends. "I ask, 'How many of you people have green cards and share with people who don't?' And they look at me like I'm the dumbest guy in [the] world. For them, it's a no-brainer,"24 said Weatherly.

Celebrity Influence

The ease of getting the drug is just one of the factors that influence teens who choose to experiment with marijuana. Some teens are also influenced by the public comments and behavior of celebrities, especially those who have a lot of teen appeal. Performers such as Miley Cyrus, Lady Gaga, Justin Timberlake, Justin Bieber, Rihanna, Seth Rogen, and Kristen

Stewart have been vocal about their marijuana use. Stewart has said that smoking marijuana is not a big deal, and Timberlake has commented that some people are better when using marijuana. Rihanna has even posted several pictures of herself smoking pot on Instagram, where millions of followers can see them. And according to Rogen, "I smoke a lot of weed when I write, generally speaking. I don't know if it helps me write. It makes me not mind that I'm writing."²⁵

"Most of the kids in high school could find marijuana in a couple of hours if they wanted to."²²

 Christina Zidow, chief operating officer of Odyssey House of Utah.

For some teens, seeing and hearing celebrities publicly discuss their pot use adds to its appeal. The celebrities portray using marijuana as a fun, harmless activity that has no negative effect on their lives. However, adults worry that impressionable

Organizations to Contact

American Academy of Adolescent and Child Psychiatry

3615 Wisconsin Ave. NW Washington, DC 20016-3007

phone: (202) 966-7300 website: www.aacap.org

This organization provides information about how drugs and alcohol affect teens and children. It discusses the warning signs of use and suggests ways to deal with youth use.

Drug Policy Alliance

925 Fifteenth St. NW, 2nd Floor Washington, DC 20005

phone: (202) 683-2030

website: www.drugpolicy.org

This organization is dedicated to promoting drug law reform. It works toward states making their own choices regarding marijuana without federal oversight and provides information on legalization status throughout the United States.

Marijuana Policy Project

PO Box 77492

Capitol Hill

Washington, DC 20013 phone: (202) 462-5747 e-mail: info@mpp.org website: www.mpp.org

This organization's goal is to pass federal medical marijuana legislation, as well as to replace marijuana prohibition with what it considers a system of sensible regulation and control. The organization provides information about its work throughout the United States regarding marijuana laws.

For Further Research

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