

KIDS ARE CAUGHT IN THE WEB SPUN FROM MARIJUANA-INFUSED SWEETS:

BEST PRACTICES TO UNTANGLE THE WEB

By Rachel O'Bryan,
Co-founder of
One Chance to Grow Up



THC-Infused Sweets Expose Thousands of Children to Marijuana

The enticing kid-friendly marijuana products we found in our secret shopping expeditions across the U.S. should terrify parents and policymakers.

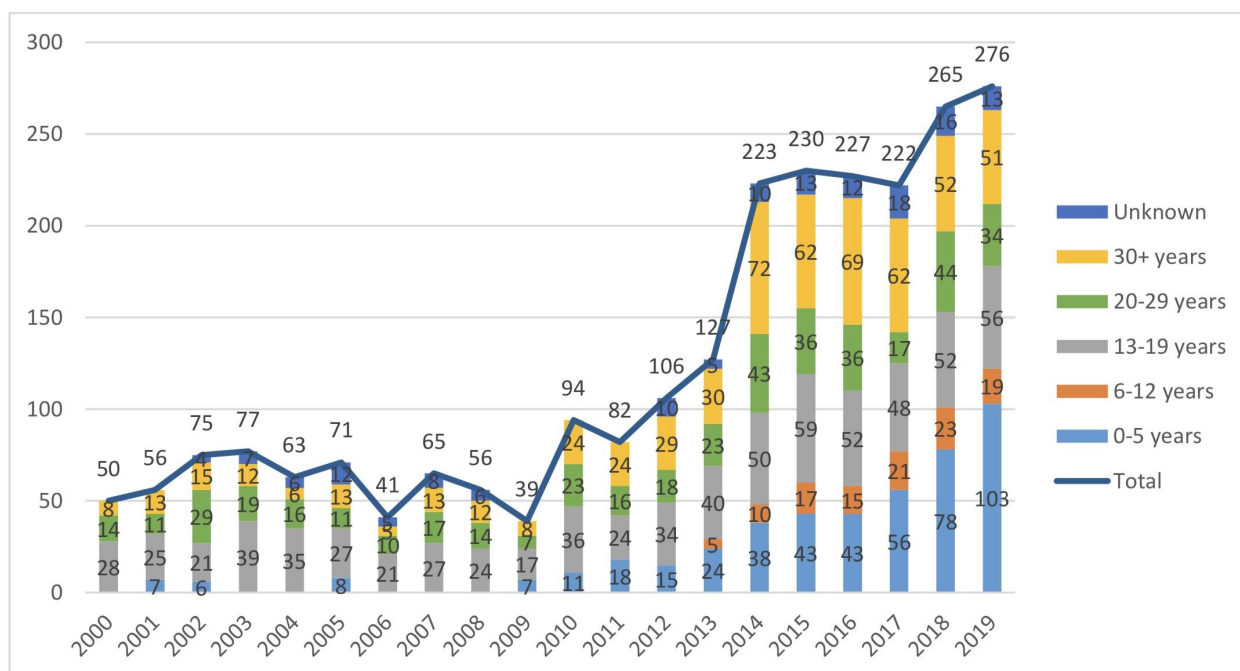
An analysis of the National Poison Data System marijuana exposure reports for 2017–2019 found that over one in three edible exposures (36.6%) involved children. This equates to thousands of children.

Colorado and Washington were the first two states to pass recreational marijuana, both in 2012. Colorado was the first state in the U.S. to begin selling marijuana to all adults 21 and older; sales began there on Jan. 1, 2014.

Reports of accidental ingestion of marijuana edibles by very young children began almost immediately, as did tales of school administrators faced with mass edible consumption by students.

The number of children five years and younger reported for marijuana exposure to the Rocky Mountain Poison and Drug Center significantly increased from 15 in 2012 to 103 in 2019. Almost 60% of the cases since 2017 have been for edibles, which look like candy and come in flavors that appeal to their young palates.

Human Marijuana Exposures Reported to Rocky Mountain Poison Center



Source: Colorado Department of Public Health and Environment (2020), available at <https://marijuanahealthinfo.colorado.gov/poison-center-data>

Other states with legal marijuana have likewise reported increases in accidental ingestion by kids. In Massachusetts, calls to the Regional Center for Poison Control and Prevention doubled for pediatric marijuana exposure in the four years after the state legalized medical marijuana compared to the four years prior. And there was a statistically significant increase in the incidence of exposure to marijuana edibles for children zero to four years of age.

Colorado saw a statistically significant increase from 2015 to 2017 in high school marijuana users consuming edibles, according to the State's comprehensive Healthy Kids Colorado Survey. The rate increased from 2% in 2015 to 10% in 2017 and remained flat in 2019 at 10%.

Colorado does not track the method of use of marijuana among middle schoolers. But in Oregon, another early legalization state, between 2017 and 2019, the proportion of 8th graders who consumed marijuana in the past 30 days by eating it increased by a quarter to over 30%. In fact, a larger percentage of 8th graders than 11th graders reported using edibles in 2019.

Marijuana edibles, although presented as harmless, sweet treats, have resulted in increasing Emergency Room visits in Colorado. A 2019 study found that ER visits attributable to marijuana edibles were more likely due to cardiac, intoxication and acute psychiatric problems than visits for inhaled marijuana; and visits attributable to marijuana edibles were 33 times higher than expected based on sales measured in kilograms of THC, marijuana's main psychoactive ingredient.

Because of the obvious appeal of marijuana candy to children, the statistically significant increase in youth edible consumption in Colorado, and the danger of acute psychosis from over-consumption, One Chance to Grow Up in 2018 began to document products sold in stores. We posted photographs online to educate parents, educators, policymakers and the media about the reality of today's marijuana.

In the following three years we have expanded our coverage to seven states where recreational marijuana is sold. We do not purchase medical marijuana, but products sold in the medical market are not very different from products sold in the recreational market. And in Illinois, medical marijuana was sold interchangeably in recreational stores when we visited the state in November 2020.



In 2018, One Chance to Grow Up began documenting today's marijuana.

The absence of federal regulations means each state is the final authority in regulating these products. State regulators are often outgunned by the industry. One Colorado health department official described efforts to regulate the industry as “chasing cheetahs with butterfly nets.”

State regulations differ in fundamental ways, including maximum THC per package, THC serving size, markings of THC content, directions for use, and warnings. This inconsistent patchwork of regulations increases the risk of overconsumption and accidental consumption of THC, which presents a serious threat to young people.

Now is the time to Enact Safeguards

According to the marijuana industry news source, Ganjapreneur, \$18 billion in legal marijuana sales occurred in the U.S. in 2020. This was \$7 billion more than the previous year. Nine states doubled their marijuana sales from 2019.

The marijuana industry is no longer a small industry. It is no longer a disorganized industry. It is no longer an underfunded industry.

In 2019, dozens of pro-marijuana companies and interest groups spent more than \$8 million to hire over 130 registered lobbyists, a ten-fold increase in the past decade, according to a Wall Street Journal analysis of public lobbying disclosures. MJ Biz Daily, an online source for industry news, identified the largest 2020 supporters.

Before any legislative benefits are granted, the marijuana industry should be required to show its commitment to seeking legitimate sales from legal consumers only. The industry must show more than compliance with inconsistent, weak state regulations because those regulations haven’t prevented the explosion in kid-friendly products and increasing youth use rates.

A responsible industry acknowledges that flavored products appeal to kids, as does marketing of sweet, fruity products. A responsible industry also acknowledges that even if it doesn’t sell these products directly to kids, they will end up in the mouths of kids -- and that is unacceptable. A responsible industry does not figuratively wash its hands by claiming “It’s a parenting issue” when kids consume these products.

Before the country goes further in unleashing this industry nation-wide, some basic protections based on best practices must be established. Here’s what the nation can do to stop this.

Stop Using Kid Culture

The industry claims it is not marketing to children, but continues to rely on child culture to sell products.

In Oregon, we bought marijuana vape liquid named Samoas after the Girl Scout cookie. (There is actually a strain of marijuana called “Gurl Scout Cookie” sold in several states. The nonprofit organization, Girl Scouts of the USA, has been forced to defend its trademark.) In Illinois, we bought a chocolate bar named like the Disney movie Incredibles. In Washington state, we bought THC-infused gummies that appear to be mass-produced candy sprayed with THC. In Nevada we bought a THC candy bar containing rainbow sprinkles.



Stop Calling it Candy

In addition to what's inside the package, what's outside is also important. The industry should be prohibited from calling products candy. In 2015, Colorado made this practice illegal. This label describing grapefruit hard "candy" is no longer allowed in Colorado. However, Colorado regulations still allow the marijuana brand name to contain the word "candy".

Other states should go further than Colorado and outlaw the use of the word "candy" or "candies" anywhere on the packaging of this drug. In August 2021, Michigan released a detailed advisory bulletin to address the problem in their market.



Stop Calling it Medicine

One of the leading indicators of future marijuana use by youth is a low perception of harm. The percentage of U.S. students perceiving great risk from regular marijuana use has seen a steady decline since the mid-2010s.

When a recreational product intended to get high is called "medical" youth are likely to assume it promotes health and wellness. Merriam-Webster defines medicine as:

1 : a substance or preparation used in treating disease. 2a : the science and art dealing with the maintenance of health and the prevention, alleviation, or cure of disease.



In November 2020, 11 months after recreational sales began in Illinois, we bought multiple products that were still packaged as "medical" marijuana. After a state legalizes marijuana for any use by adults over 21 years old, allowing the product to be labeled as "medicine" sends a confusing message that the product is for health and wellness. This is lax regulation that can result in future increases in marijuana use by children. Youth raised in the legal marijuana era may understandably assume that anything medical is safe -- and that assumption threatens their health.

Don't Make it Easy to Hide

Why does the industry continue to push “discreet” products? If it’s legal, customers do not have to hide use. But easily hidden products appeal to kids and make it harder for parents and educators to stop marijuana use.

In Colorado, you can buy powdered THC. In Michigan, you can buy a colorless, odorless “drink enhancer”. In multiple states you can buy THC infused sugar. These products make it easy to invisibly lace any food item with THC, with or without the consent of those who are consuming it.



In Nevada, a fruit punch flavored mouth spray has a removable label making it easy to hide the device in a backpack or pencil case.



Don't Just Pay Lip Service to Regulations

Putting the phrase "Keep out of Reach of Children" or "Not for Kids" on the packaging does not give blanket protection if you still create sweet, colorful marijuana edibles. Young kids can't read and teens may find this especially alluring.



Mark Edibles with a Universal Symbol

If Mars can mark its candy with the M&M symbol, the marijuana industry can mark its edibles with a universal symbol. Some states only require the packaging -- not the product itself -- to be marked with a universal symbol. Some states do not appear to have a universal symbol even on the packaging. Colorado mandated that certain edibles can be marked with a universal symbol to indicate they contain THC, like the brownie squares and the tablets. THC added to any food, be it pretzels or chocolate, is inherently deceptive without a marking.

There is no reason why these gummy candies from Oregon cannot be marked. It would make the product recognizable as the high-inducing drug that is dangerous for kids.



Make Edibles Single Serving

Some marijuana products are so small, they can't be separated into single servings. We bought multi-serving edibles roughly the size of a quarter in Oregon and Michigan.

This unmarked Oregon brownie gets double billing for problematic risks. This bite-sized brownie contains ten 5mg servings of THC.



We are concerned that Michigan is ignoring the risk of over-ingestion of edible marijuana with products that make the customer guess the serving. The one-inch gummy is 50mg of THC and the three-inch cookie is 100mg of THC.



A similar THC-infused cookie sold in Colorado in 2014 resulted in the death of a visiting college student due to acute psychosis from overconsumption.

Standardize Servings

In the world of alcohol, a can of beer is equivalent to a glass of wine is equivalent to a shot of whiskey. This allows public awareness campaigns to give advice on alcohol impairment and overuse.

No such standard servings exist with marijuana. In Michigan, we purchased a tablet with 2.5mg of THC. In California, we purchased a tablet 10 times stronger with 25mg of THC.

Colorado settled on no more than 10mg THC as a standard edible serving. If each manufacturer sets the serving size, then there is no standardization. All Colorado has done is regulate a “maximum serving” not a standardized serving.

In May 2021, the National Institute on Drug Abuse announced that the federal standard measurement unit for THC research will be 5mg. This will allow scientists to gain a better understanding of the cumulative effects of THC exposure. This would include the effects of prenatal or adolescent exposure on brain development, cognition and educational attainment, according to NIDA Director Nora Volkow, MD.

The lack of either industry or regulator-mandated standard edible THC serving sizes puts 100% of the responsibility on consumers to use responsibly while making it much harder to educate the public about unsafe levels of marijuana use. This failure presents a growing risk to public safety with the rise in states allowing pot clubs and public consumption of marijuana.



Oregon regulations (or lack of) burden consumers with the task of dividing their purchased products into individual serving sizes, like these rice crispy treats, fudge and hot cinnamon gummy.



Apparently in Illinois, they ignore the issue of serving size altogether, as we purchased bulk edibles, a bag of pretzels, and French onion soup mix that forgo any directions on use.

Lower the Edible Dose

Marijuana edibles go through the digestive system and it can take up to four hours for an edible to reach peak intoxicating effect, so accidental over-consumption has been a documented problem in legal states.

Edibles represented the largest portion of poison control calls (45%) for marijuana exposure in Colorado from January 2017 through June 2020. Edibles also represented a larger portion of Emergency Department visits in Colorado from 2014-2016. Edibles were also more likely to be associated with acute psychosis in Emergency Department visits than smokable marijuana.

Micro-dosing THC is a recommended practice that addresses the unique pharmacokinetics of edibles. We found 2mg gummies in Illinois and 2.5mg mints in Michigan. Micro-dosing is especially important in a recreational market where many consumers are either not familiar with edible THC or infrequent users.

Micro-dosing does NOT mean putting more THC in a smaller-sized edible. In Michigan we bought a 40mg (4 servings!) THC sublingual melt in a square the size of a dime.



Remove the Color, Flavor and Sugar

Packaging a high-inducing drug in candy form misrepresents the product as innocuous to adults and an attraction to kids.

As the federal government restricts the sale of flavored tobacco products, it will have a roadmap for tackling marijuana once it assumes regulatory oversight.

The industry would show it is serious about reducing youth use and not marketing to children by stripping its edible products of additives that make the products colorful, flavorful, and sweet.

These 10mg THC capsules bought in Washington state will have the same effect as every other edible shown above. This should be the future of THC edibles in a society that values our children and their one chance to grow up.



Sources

Wang GS, Le Lait M, Deakyne SJ, Bronstein AC, Bajaj L, Roosevelt G. Unintentional Pediatric Exposures to Marijuana in Colorado, 2009–2015. *JAMA Pediatr.* 2016;170(9):e160971.

doi:10.1001/jamapediatrics.2016.0971

<https://jamanetwork.com/journals/jamapediatrics/fullarticle/2534480>

Reed JK. (July 2021). Impacts of Marijuana Legalization in Colorado. Colorado Department of Public Safety.

https://cdpsdocs.state.co.us/ors/docs/reports/2021-SB13-283_Rpt.pdf

Whitehill JM, Harrington C, Lang CJ, Chary M, Bhutta WA, Burns MM. Incidence of Pediatric Cannabis Exposure Among Children and Teenagers Aged 0 to 19 Years Before and After Medical Marijuana Legalization in Massachusetts. *JAMA Netw Open.* 2019;2(8):e199456.

doi:10.1001/jamanetworkopen.2019.9456

<https://jamanetwork.com/journals/jamanetworkopen/fullarticle/2748051>

Dilley JA, Graves JM, Brooks–Russell A, Whitehill JM, Liebelt EL. Trends and Characteristics of Manufactured Cannabis Product and Cannabis Plant Product Exposures Reported to US Poison Control Centers, 2017–2019. *JAMA Netw Open.* 2021;4(5):e2110925. doi:10.1001/jamanetworkopen.2021.10925

<https://jamanetwork.com/journals/jamanetworkopen/fullarticle/2780068>

Colorado Department of Public Health and Environment. *Data Brief Colorado Youth Marijuana Use 2017.*

HOW YOUTH USUALLY USE MARIJUANA

Among youth who currently use, usual method of use



*Statistically significant Increase since 2015.

2019 Oregon Healthy Teens Survey. <https://www.oregon.gov/oha/PH/BIRTHDEATHCERTIFICATES/SURVEYS/OREGONHEALTHYTEENS/Documents/2019/2019%20State%20of%20Oregon%20Profile%20Report.pdf>

Acute Illness Associated with Cannabis Use, by Route of Exposure. Ann Intern Med. Abstract of Monte AA, Shelton SK, Mills E, et al. An observational study. April 2019. <https://www.acpjournals.org/doi/10.7326/M18-2809>

THC Photos, <http://thcphotos.org>



Branfalt TG. (2020, December 23). US Cannabis Sales Approach \$18 Billion, Up 67% from 2019. Ganjapreneur <https://www.ganjapreneur.com/us-cannabis-sales-approach-18-billion-up-67-from-2019/>

Bykowicz J. (2021, May 8). Cannabis Goes Corporate: Lobbyists, Unions Seek to Shape Marijuana Industry. The Wall Street Journal. https://www.wsj.com/articles/cannabis-goes-corporate-lobbyists-unions-seek-to-shape-marijuana-industry-11620466202?st=6csfigq3as4620y&reflink=article_copyURL_share

Schroyer J. (2020, October 12). With Eye on Election and Beyond, Marijuana Industry Spends Millions on Lobbying. MJ Biz Daily. <https://mjbizdaily.com/marijuana-industry-spends-millions-on-lobbying-before-us-election/>

Collins P. (2017, February 28). Parents Upset with “Gurl Scout Cookies” Marijuana Strain. KTNV ABC 13 Action News, Las Vegas. Scripps Media, Inc. <https://www.ktnv.com/news/marijuana/parents-upset-with-gurl-scout-cookies-marijuana-strain>

Michigan Marijuana Regulatory Agency. (2021, August 2). Marijuana-Infused Edibles: Enforcement Guidance. https://www.michigan.gov/documents/mra/Marijuana-Infused_Edibles_Bulletin_-_080221_731636_7.pdf

Johnston LD, Mitch RA, O'Malley PM, et al. (January 2021). Monitoring the Future National Survey Results on Drug Use 1975-2020. 2020 Overview: Key Findings on Adolescent Drug Use. <http://monitoringthefuture.org/pubs/monographs/mtf-overview2020.pdf>

National Institute on Drug Abuse, National Heart, Lung and Blood Institute, National Institute of Mental Health, National Cancer Institute. (2021, May 7). Notice of Information: Establishment of a Standard THC Unit to be Used in Research. <https://grants.nih.gov/grants/guide/notice-files/NOT-DA-21-049.html>

Volkow N, Sharpless N. (2021, May 10). Nora's Blog. <https://www.drugabuse.gov/about-nida/noras-blog/2021/05/establishing-5mg-thc-standard-unit-research>

Cha A. (2015, July 28). The Terrifying Timeline of How a Colorado Teen Ate a Pot Cookie and Jumped to His Death. The Washington Post. <https://www.washingtonpost.com/news/to-your-health/wp/2015/07/28/the-terrifying-timeline-of-how-a-colorado-teen-ate-a-pot-cookie-and-then-jumped-to-his-death/>

Colorado Department of Public Health and Environment. (2020, July 31). THC Concentration in Colorado Marijuana: Health Effects and Public Health Concerns. https://drive.google.com/file/d/1eQSkZvgRFuY_KnKYXVYnbgnd2SU7WQhj/view?usp=drivesdk

Powell D. (2019, March 25). Cannabis-Related ER Visits in Colorado Jump Threefold After Legalization, Study Says. KCTV5 News. https://www.kctv5.com/news/cannabis-related-er-visits-in-colorado-jump-threefold-after-legalization-study-says/article_c1f2a303-de62-502a-a90a-17821dae48b7.html

About the Author

Attorney Rachel O'Bryan, a graduate of University of Michigan School of Law, has been involved in Colorado's historic recreational marijuana legislative and regulatory process since 2013. She was appointed by former governor John Hickenlooper to serve on a subcommittee of the Amendment 64 Implementation Task Force to provide a voice for citizens, including the community and kids. She was also appointed by the State Marijuana Enforcement Division to serve on several stakeholder working groups focused on rule-making for Retail Marijuana Product Potency and Serving Size, Production Caps, Record-keeping, Enforcement and Discipline. Rachel served on Denver's Marijuana Social Consumption Advisory Committee to assist Denver Excise and License with implementation of the 2016 Denver voter Initiative 300.

She is a co-founder of One Chance to Grow Up, which shares with the nation what we've learned in Colorado since 2013 as the first nonprofit in the U.S. dedicatedly solely to protecting children in the age of legal marijuana.