



Cannabis and Child Safety

What are the public health effects of adult cannabis use on children?

Missouri cannabis packaging laws aim to limit appeal to children.

In MO, all cannabis packaging must be reviewed by the Missouri Department of Health and Senior Services (19 CSR 100-1.120). Cannabis products must be produced, packaged, and labeled in a way that is not a public safety threat nor attractive to children. Products and packaging cannot use the shape of humans, animals, or fruit (including aliens, robots, and mythical creatures). Packaging must be a single solid color and any logo or text can be a maximum of two colors. Packaging cannot cause confusion between cannabis and non-cannabis.

- In Canada, changing cannabis products with full branding to plain packaging led to a decrease in appeal to individuals 16-65 (Goodman et al. 2019).

Cannabis packaging must also have the word “marijuana” clearly and conspicuously labeled (19 CSR 100-1.120). Packaging must have accurate side effect information, serving and dosage information, warning of physical impairment, and a note to keep out of the reach of children.

- Packaging with warning labels was consid-

Research Highlights

MO has cannabis packaging requirements to limit appeal to children.

Cannabis legalization has led to an increase in cannabis poisoning in children.

Cannabis use by parents is associated with an increase in physical abuse but not in other aspects of child neglect.

red less appealing than those without to individuals 16-65. (Goodman et al. 2019).

Packaging must also be resealable, opaque, and certified child resistant (19 CSR 100-1.120).

- Child resistant packaging must be tested by children 42-51 months old (EPA 1996).
- Packaging is considered child resistant if greater than 85% of children cannot open it without any demonstration on how to open the package and if greater than 80% of children cannot open it with a demonstration on how to open the package.

n the U.S., states with limited or medical cannabis legalization were more likely to have youth appealing cannabis packaging (multiple colors, human and non-human creatures, knockoff products) compared to states with full cannabis legalization (Tan et al. 2023).

There has been an increase in pediatric cannabis poisoning cases since cannabis legalization.

Nationally, the proportion of pediatric edible cannabis calls to the National Poison Data

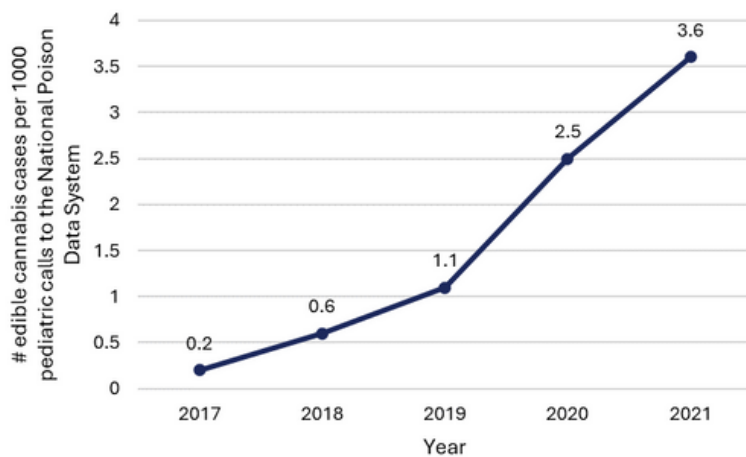


Figure 1. Rate of pediatric edible cannabis cases to the National Poison Data System. Reported numbers are the number of edible cannabis cases for every 1000 pediatric calls to the National Poison Data System. Figure adapted from [Tweet et al. 2021](#).

System has increased from 2017 to 2021 (**Figure 1**; [Tweet et al. 2021](#)). In CO, the rate of cannabis exposure cases at a children’s hospital went up from 4.3 visits per 1000 emergency department (ED) visits for ingestions in the two years before cannabis legalization to 6.4 visits per 1000 ED visits for ingestions in the two years after cannabis legalization ([Wang et al. 2016](#)).

The most common source of cannabis exposure is from a parent, and exposures usually occur at the child’s home ([Wang et al. 2016](#), [Tweet et al. 2021](#)). In 9% of exposures at a CO children’s hospital, cannabis products were not in child resistant packaging ([Wang et al. 2016](#)). In 34% of exposures, products were left out, were in plain sight, or the child was unsupervised ([Wang et al. 2016](#)).

- There is no study identifying the exact cause of cannabis exposure in children.

In a survey of all adult visitors to a pediatric emergency department in CA a little over half of adult cannabis users kept cannabis in a locked container while a little less than half of users kept it both locked and hidden ([Gimelli et al. 2021](#)).

In CO, a survey of caregivers showed that 91% store cannabis in a place a child cannot access, including “out of reach” places ([Brooks-Russell et al. 2019](#)).

Eighty-seven percent reported storing cannabis in childproof storage, and 67% stored cannabis in a locked location.

- Survey results are limited by who participates and may not accurately represent the population.

Parental cannabis use has mixed impacts on child welfare.

In CA, cannabis use by parents has no effect on supervisory neglect (i.e., the failure to appropriately supervise a child) and is associated with fewer physical neglect cases (i.e., failure to meet the minimum degree of a child’s physical needs) ([Freisthler et al. 2015](#)). Cannabis use does not change the number of referrals for child welfare investigations ([Freisthler & Kranich 2022](#)). However, there were more physical abuse cases with parental cannabis use ([Freisthler et al. 2015](#)).

- The positive correlation with physical abuse may be due to anxiety or paranoia from cannabis use ([Freisthler et al. 2015](#)).
- Parents that use cannabis and physically abuse their children may also be predisposed to aggression as a survey of a small focus group found that parents will use cannabis to prevent hitting their children ([Thurstone et al. 2013](#)).

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