Date of Testimony 3/16 or 3/17
Senate Bill SB560
Topic Title: MEDICAL MARIJUANA
Disposition: OPPOSED
State one of the following: ORAL virtual Testimony
Elizabeth L Stuyt, MD
Addiction Psychiatrist
719-671-1611
libbystuyt@msn.com
Representing self

Mr. Chairman and Members of the Senate:

I am speaking in opposition to Senate Bill SB560. I am a board-certified Addiction Psychiatrist in Colorado and have been working in the field for the last 30 years. I have seen significant problems from the lack of strict regulations in Colorado for both medical and recreational marijuana and want to make sure you are aware of all the consequences Kansas will experience if you continue with this bill as it is written.

I am someone who supports the decriminalization of possession of small quantities of marijuana for personal use. While there is some evidence that low concentrations of THC may be beneficial for some medical conditions, medical marijuana in all states so far, has been a Trojan Horse for getting recreational marijuana approved. There have been no controls on the potency, ignoring the science that research showing benefit has been done on concentrations of THC in the plant of less than 10%. There is no legitimate research that validates the use of THC greater than 10% for any medical condition. What is the rationale for your bill allowing up to 35% THC in the plant? This is an excellent graph which explains the problem – right now Colorado is on the far right – where it looks like Kansas is headed.

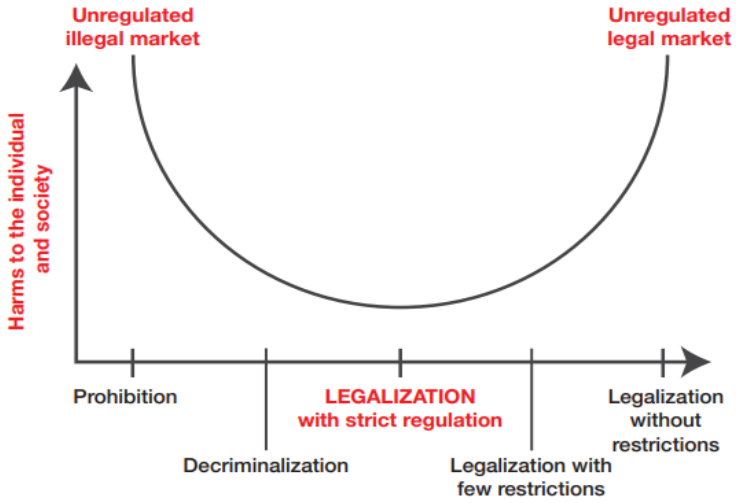


Figure 1. Cannabis policies and relative harm. Adapted from (32,33) with permission from Alice Rap (www.alicerap.eu) and Center for Addiction and Mental Health (www.camh.ca).

This is from researchers studying the use of cannabis for treatment of pain – notice the limits they recommend. Anything higher than 15% THC results in increased potential for addiction and psychosis.

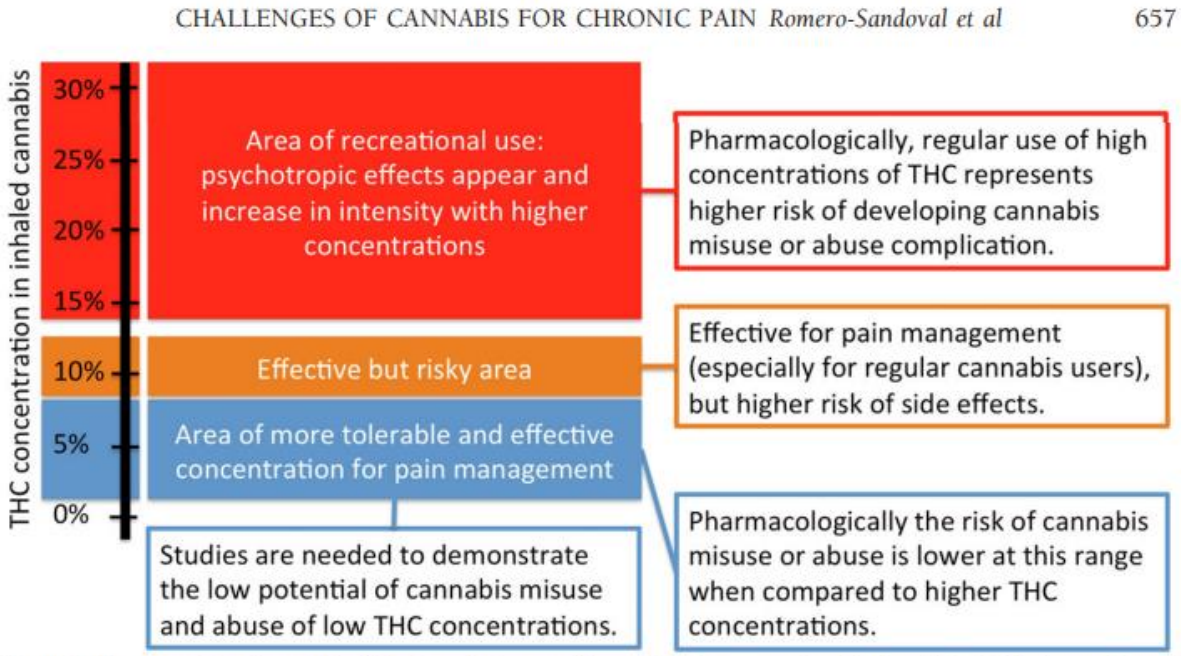
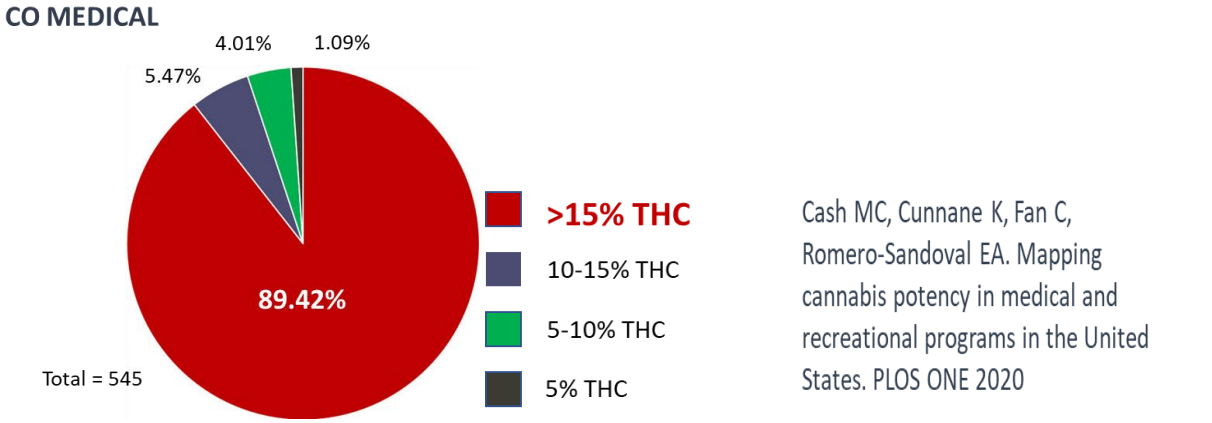


Figure 1. Representation of cannabis delta-9-tetrahydrocannabinol (THC) concentration (%, Y axis) in inhaled cannabis and the different THC concentration ranges: In blue (lower panel), THC range supported by scientific evidence for medicinal purposes (lower than 10%); in orange (middle panel), THC range supported by scientific evidence for medicinal purposes for regular cannabis users, and with higher risks for cannabis-naïve or ex-cannabis users (close or slightly above 10%); in red (upper panel), concentrations used for recreational purposes (higher than 15%). Note that the THC concentration range for therapeutic purposes does not overlap with the concentrations used for recreational use. [Color figure can be viewed at wileyonlinelibrary.com]

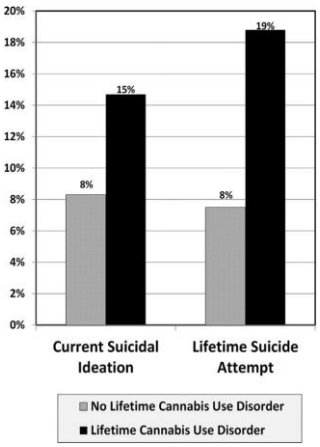
And yet this is what is available in medical dispensaries in Colorado. Most all products are greater than 15% without any legitimate research to validate these concentrations for medical conditions.



The more potent a drug is, the greater its addictive potential, and the more people addicted the greater guarantee there will be customers purchasing the products. This is the reason why the industry fights potency caps. This is an industry that profits from addiction. No different from the tobacco companies.

Your bill approves the use of medical marijuana for several conditions for which there is no research supporting its use. Since I am a psychiatrist – I will stick with my field. There is no research supporting the use of marijuana for PTSD. There are many studies demonstrating that it actually can make people worse. It has a temporary effect in the fact that it can "numb" people and they are not bothered by the symptoms of PTSD. But to keep the symptoms at bay they need to use daily, sometimes several times a day which sets them up for addiction, psychosis, and suicidal ideation.

An observational study of 2276 Veterans treated in VA PTSD treatment programs and followed for 4 months after treatment found that those who never used marijuana had significantly lower symptom severity after 4 months; those who stopped using marijuana had the lowest level of PTSD symptoms 4 months after treatment; but those who started using marijuana had the highest levels of violent behavior and PTSD symptoms 4 months after treatment. (Wilkinson et al. J Clin Psychology 2015).



3,233 veterans in cross-sectional, multi-site study by Veterans Affairs (VA).

Cannabis use disorder was **significantly associated with both current suicidal ideation and lifetime history of suicide attempts** compared to veterans with no lifetime history of cannabis use disorder. The **significant difference persisted** even after adjusting for sex, PTSD, depression, alcohol use disorder, non-cannabis drug use disorder, history of childhood sexual abuse and combat exposure. (Kimbrel NA et al. J Psychiatric Research **2017**:89;1-5)

There is no research support for your indication "a debilitating psychiatric disorder that is diagnosed by a physician licensed in this state who is board-certified in the practice of psychiatry, as determined by the board of healing arts". Most of the research demonstrates that marijuana makes psychiatric disorders worse. Quoting from a recent review article "There is considerable evidence that cannabinoids have a potential for harm in vulnerable populations such as adolescents and those with psychotic disorders. The current evidence base is insufficient to support the prescription of cannabinoids for the treatment of psychiatric disorders." (Hill K et al. Am J Psychiatry 2022; 179:98–109).

There is increasing evidence that using THC greater than 10% puts people at risk for psychosis. This is data from Europe finding that those who use THC greater than 10% are 3 times more likely to develop psychosis. If they use it daily, they are nearly 5 times more likely to develop psychosis. (DiForti M et al. Lancet Psychiatry 2019)

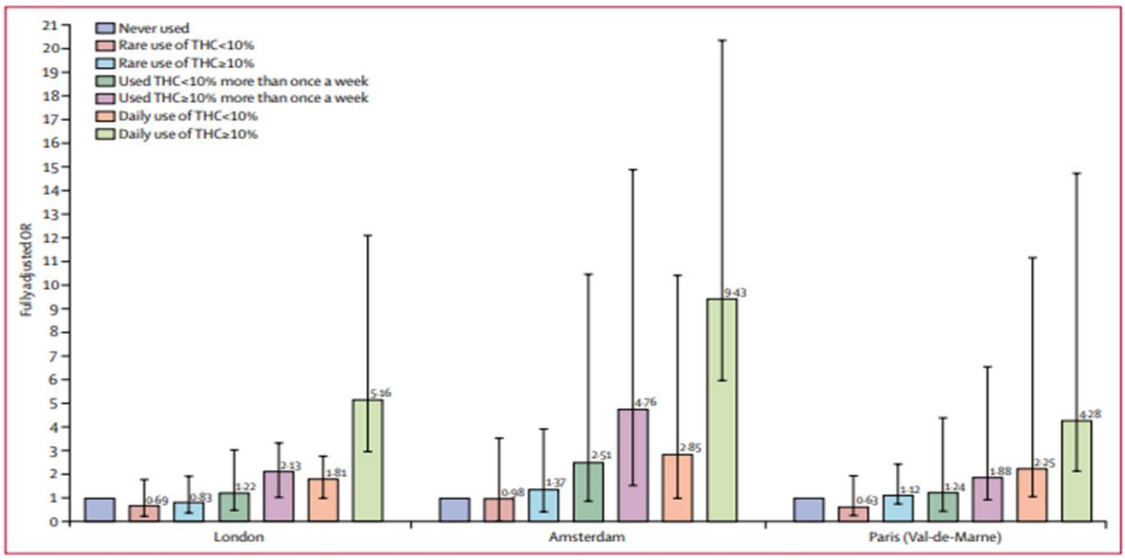


Figure 2: **Fully adjusted ORs of psychotic disorders for the combined measure of frequency plus type of cannabis use in three sites**
Data are shown for the three sites with the greatest consumption of cannabis: London (201 cases, 230 controls), Amsterdam (96 cases, 101 controls), and Paris (54 cases, 100 controls). Error bars represent 95% CIs. OR=odds ratio.

I believe it is irresponsible to provide protections from litigation and malpractice for practitioners recommending marijuana. They should be held to the same standards, regulations, and standards of care as any other practitioner when prescribing/recommending medication. There would most likely be no problems if they are following the science and making recommendations of low doses and providing all the warnings regarding possible risks. However, if they are recommending potencies of THC higher than is supported by the scientific literature and the person develops psychosis, they should be held accountable. Marinol (dronabinol)the FDA approved form of pure THC has the warnings that include neuropsychiatric adverse reactions, hemodynamic instability for patients with cardiac disorders, seizures, and paradoxical nausea, vomiting and abdominal pain. Medical marijuana has the same warnings and the higher the THC content the more likely the adverse events. There is also a recommended dose for Marinol with pills coming in 2.5 mg, 5 mg, and 10 mg. A single dose rarely exceeds 10 mg. You have no recommended doses or serving sizes for medical marijuana in your bill.