# Cannabis

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## Agenda

- ▶ What is cannabis?
- Cannabis & Psychosis
- Cannabis & Brain Development
- Considerations with Legalization

## **Cannabis Jeopardy**

- 1. What is known as a POPPER?
- 2. What is known as a COCO PUFF?
- > 3. What is known as Indica?
- ▶ 4. What is known as Sativa?
- ▶ 5. What year did the federal liberals say they were going to legalize CANNABIS?
- ▶ 6. What are some examples of EDIBLES?

## Products: Edibles





# Products: CBD Oil



## Cannabis use in Canada



Canada has one of the highest rates of cannabis use in the world.



40%

OF CANADIANS HAVE USED CANNABIS



10%

OF CANADIANS HAVE USED CANNABIS IN THE PAST YEAR



20%

OF CANADIANS AGED 15-24 YEARS USED CANNABIS IN THE PAST YEAR



70%

OF CANADIAN CANNABIS USERS ARE AGE 25 OR OLDER

# What do we know about psychosis?

- About 1 in 13 people will experience psychosis (about 7.5%)
- ▶ 1 in 100 people will receive a diagnosis of schizophrenia (1%)
- For people who use cannabis regularly, about 1 in 50 will receive a diagnosis of schizophrenia (2%)

## Cannabis and Psychosis

- Research has found an association but not a cause
- Some studies have found as much as a 3-fold increase in psychosis with cannabis use, while others have found no differences
- Results from research studies have been quite varied and the studies are flawed

# Cannabis and Psychosis

- Reverse causation
- Different strains of cannabis have different effects
- Types of research studies
- Other factors....

## Other factors...

- Genetics
- Childhood trauma (abuse, neglect, bullying, loss, etc.)
- Age of onset
- Many more possibilities

# Cannabis and brain development / function

### What we know...

- Association between persistent cannabis use over extended period starting in adolescence and changes in...
  - ► IQ
  - Learning
  - Memory
  - Executive function
- Changes more likely in people who start using regularly prior to age 16
- Some evidence for structural changes in grey matter and white matter prior to age 17

### what we do NOT know...

- What is the level of impact on the brain?
- Was impairment of brain function present before starting cannabis use (reverse causation)?
- Does education have an impact on the brain's function?
- What strains of cannabis have what effects?
- How much; how often; at what age does cannabis have an impact?
- Is it reversible?



## Cannabis and psychosis

### what we know so far...

- 2% vs 1% will receive a diagnosis of schizophrenia
- Association is only seen in heavy and regular cannabis use
- Sometimes seen more often in people who start and continue use early (age 15-18)
- Rates of cannabis among youth, and THC levels have changed over the past few decades, yet the rates of psychosis and schizophrenia remain the same
- There are many other factors to consider in why someone may use cannabis, and why someone may experience psychosis

## Considerations

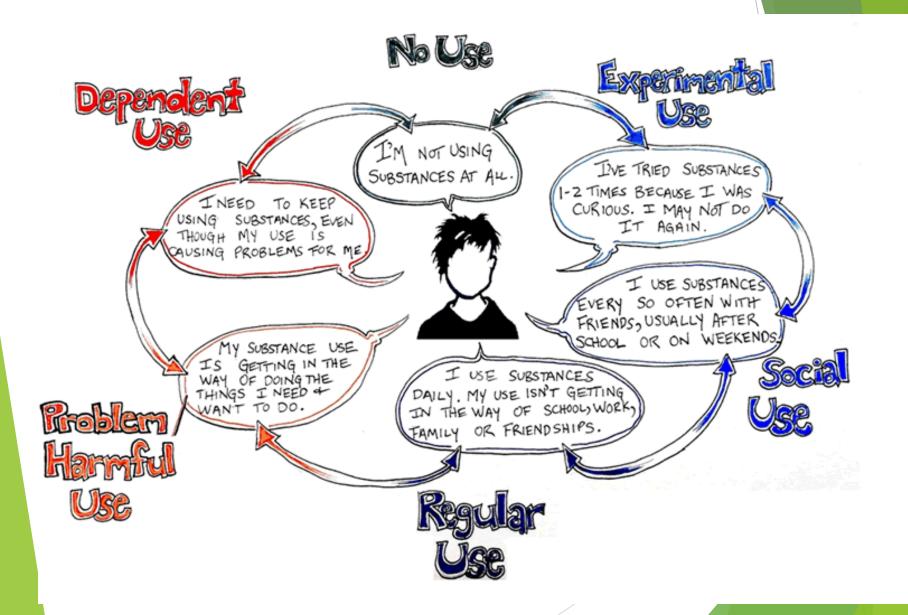
- ▶ Demonization vs. Romanticization of cannabi
- look at DOSAGE and Strain
- Medical benefits of cannabis for physical health concerns (e.g. cancer, MS, IBS, pain management)
- Normalization of alcohol and tobacco vs. cannabis
- Taking any drug involves risks. Saying cannabis might be helpful for some people is not to deny it might make others worse
- Long term use of antipsychotic medication vs. long term use of cannabis

## Case Study

- Young person under the age of 25 who receives mental health and addictions services
- Diagnosis of Schizophrenia
- History of Cannabis Use, Heavy Tobacco User, some involvement with justice system, lives with parents
- Prescribed cannabis with anti-psychotic medication by psychiatrist



## Substance Use Continuum



### **Current State**

- Cannabis is the most commonly used illegal drug in Canada
- ► THC vs. CBD
- Medical vs. recreational substance
- Cannabis use carries health & safety risks
- Cannabis-related harm is concentrated in a group of high-risk users
- Criminalization of cannabis causes additional harms without dissuading use

## Criminalization

- ▶ 60,000 Canadians arrested for possession of cannabis every year, nearly 3% of all arrests
- About 700,000 Canadians carry a criminal record for this offense
- Equity: current law targets the more marginalized



## Decriminalization vs. legalization

- Legalization:
  - Production, distribution, possession removed from criminal law
  - Health harm reduction only through legalization + regulation
- Decriminalization
  - No criminal penalties/sanctions
  - ▶ No ability to regulate
  - No ability to bring in income

# Licensed Producer vs. Dispensary

- ▶ What are licensed producers ...
- ▶ What is the role of dispensaries ...



# **CANNABIS**

### ESTABLISH A GOVERNMENT MONOPOLY ON SALES

Control boards provide an effective means of controlling consumption.



#### **SET A MINIMUM AGE**

Sales or supply of cannabis products to underage individuals should be penalized.



#### LIMIT AVAILABILITY

Place caps on retail density and limits on hours of sales.



#### **CURB DEMAND THROUGH PRICING**

Pricing policy should curb demand while minimizing the continuation of black markets.

# CAMH recommends legalization with strict regulation

CAMH offers **10 basic principles** to guide regulation of legal cannabis use.



### CURTAIL HIGHER-RISK PRODUCTS AND FORMULATIONS

This would include higher-potency formulations and products designed to appeal to youth.



### INVEST IN EDUCATION AND PREVENTION

Need both general and targeted initiatives for specific groups e.g. adolescents, people with a history of mental illness.



### PROHIBIT MARKETING, ADVERTISING AND SPONSORSHIP

Products should be sold in plain packaging with warnings about risks of use.



#### PRODUCT INFORMATION SHOULD BE CLEARLY DISPLAYED

In particular, products should be tested and labelled for THC and CBD content.



### ADDRESS & PREVENT CANNABIS-IMPAIRED DRIVING

Develop a comprehensive framework that includes prevention, education and enforcement.



### ENHANCE ACCESS TO TREATMENT AND EXPAND TREATMENT OPTIONS

Include a spectrum of options from brief interventions for at-risk users to more intensive interventions.

# Cannabis Lower Use Guidelines

## WeedMaps

- https://weedmaps.com/earth/us/on/toronto
- Weedmaps is an online legal marijuana community that allows users to review and discuss cannabis strains and local dispensaries.

## Legalization in Canada

- Legalization & Regulation of Cannabis in Canada Report
- Experiences of Washington and Colorado where cannabis is legalized
- What are the tensions? Benefits? Drawbacks? Considerations

# Questions, thoughts ...



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