

# International Drug Policy Study:

Trends in the use of Psychedelic and Dissociative Substances with a focus on Psilocybin, LSD, MDMA, and Ketamine



Myfanwy Graham

NHMRC Postgraduate Scholar, Monash Addiction Research Centre, Monash University;

Research Fellow, Schaeffer Center for Health Policy & Economics,
USC Schaeffer
USC Schaeffer





### **Disclosures**

#### I declare that I have received funding from:

- Australian Government, Department of Health and Aged Care
- National Health and Medical Research Council
- Monash University
- World Health Organization
- University of Southern California
- Australian-American Fulbright Commission (Australian and U.S. governments)
- University of Newcastle
- NSW Health's Clinical Cannabis Medicines Program





### **Background**



- There is renewed interest in the therapeutic applications of:
  - Psychedelics
    - Psilocybin
    - Lysergic acid diethylamide (LSD)
  - 3,4-methylenedioxymethamphetamine (MDMA)
  - Dissociative substances
    - Ketamine
- This study explores self-reported use of psychedelic substances, ketamine, and MDMA in a large international study with differential access across countries medically.
- The study aims to better understand the extent to which policy differences and positive media coverage may influence the medical and nonmedical use of these substances.

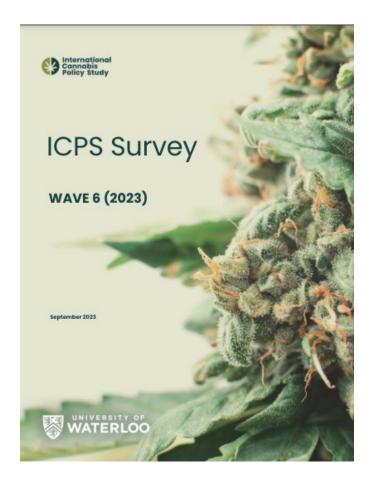




### **Methods**



- Data are from the 2023 International Cannabis Policy Study (ICPS) cross-sectional online survey, which included an expanded section on psychedelics, dissociative substances, and MDMA. This is a national sample of the population aged 16-65 years from:
  - Canada (n=19,968)
  - United States (n=39,653)
  - Australia (n=3,042)
  - New Zealand (n=2,676)
- Sample-weighted descriptive statistics are reported. All analyses were performed using STATA 16.

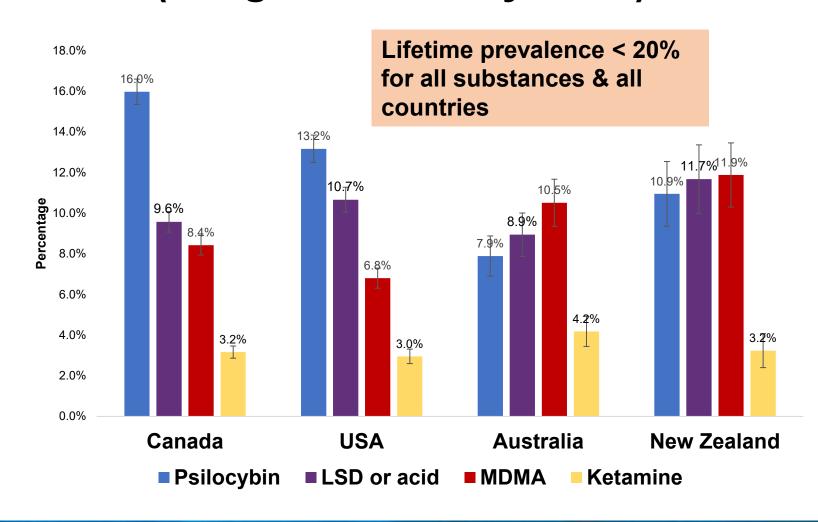






# Lifetime prevalence data (weighted survey data)

- Psilocybin is the most common psychedelic used in Canada and the United States
- MDMA was more popular than psilocybin in Australia
- New Zealand had similarly high rates of psilocybin, LSD, and MDMA
- Ketamine least commonly used across all four countries



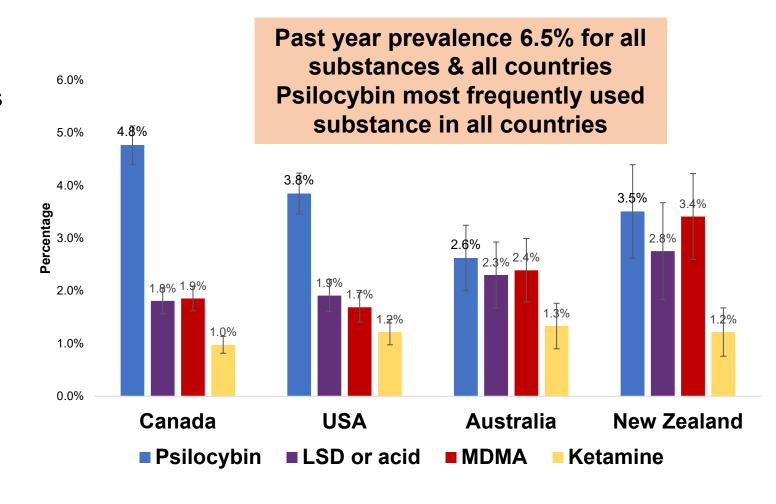




## Past 12-month prevalence (survey weighted)



- Again, CAN and US have higher rates of psilocybin than other substances.
- AUS and NZ have similar rates of psilocybin, LSD and MDMA
- Ketamine use generally lower in all countries









# Self-reported adverse effects and medical help

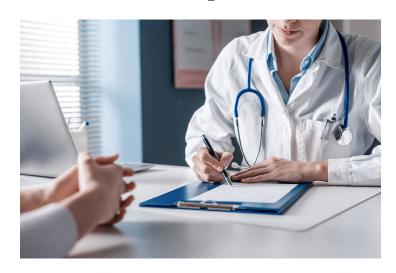
- Over a third of the sample who used LSD, MDMA, and ketamine had experienced adverse or negative health effects in the last 12 months.
- While ketamine adverse events were most frequently reported by United States respondents, adverse events with LSD were more frequently reported in the three other countries followed by MDMA.
- United States respondents who experienced an adverse or negative health effect in the last 12 months were more likely than any other country to seek help from emergency departments or a poison information center.
- For the United States over two thirds of respondents who reported an adverse or negative health effect with <u>psilocybin</u> in the past 12 months, sought help in an emergency department setting.







# Medical provider or psychiatrist involvement



Self-reported mental health conditions were commonly reported by our sample (>75%) but there was a smaller proportion who reported a mental health diagnosis (<u>></u>60%).

Overall, at least half of the sample had asked their doctor or psychiatrist about psychedelics or MDMA for medical use, but most used without the knowledge of their medical provider.

Between July 1<sup>st</sup> 2023 and June 30<sup>th</sup> 2024, there were six MDMA and six psilocybin Authorised Prescriber status application approvals in Australia.

In our study, around half (58.6%) of Australian respondents reported that a medical professional or psychiatrist had refused a request for a prescription of psilocybin, ketamine, and MDMA.







### Conclusions

- Nearly one in five respondents reported lifetime use of a psychedelic across all four countries.
- There were **country-specific differences** in the past-year use of specific substances but smaller sample sizes in Australia and New Zealand limit definitive conclusions.
- Rates of nonmedical use were similar regardless of country-specific regulations and exclusive medical use was uncommon.
- Given changing international policies, it will be important to continue tracking how psychedelics, dissociative substances, and MDMA are used by individuals reporting medical and recreational use within each country, particularly given the heightened media attention about potential therapeutic benefits.







## Thank you!

Myfanwy.graham@monash.edu





#### **Contributor Acknowledgement**

#### Canada

- Dave Hammond, University of Waterloo
   United States
- Yimin Ge, Johns Hopkins University
- Rosalie Liccardo Pacula, University of Southern California

#### Australia

- Myfanwy Graham, Monash University
- Wayne Hall, University of Queensland

#### New Zealand

Chris Wilkins, Massey University







### Jurisdictional medical access differences

#### **CANADA**

# Psilocybin and MDMA

Special Access
Program with
regulated healthcare
practitioner support

Individual exemptions under the Controlled Drugs and Substances Act (CDSA)

#### **UNITED STATES**

FDA "breakthrough therapy" designation

Psilocybin formulations for depression
MDMA for post-traumatic stress disorder
LSD formulation for generalized anxiety disorder

#### **AUSTRALIA**

Authorised prescriber

**Psilocybin** for treatment-resistant depression

**MDMA** for post-traumatic stress disorder

Prescription-based

#### **NEW ZEALAND**

### Psilocybin and MDMA

Under Section 29 of the Medicines Act an application for unapproved medicine can be submitted by a medical practitioner







### Jurisdictional access differences cont.

#### **ALL COUNTRIES**

- Esketamine nasal spray (ketamine Senantiomer) approved for treatment-resistant depression
- Ketamine off label use for psychiatric indications (medicolegal considerations)

- Although provisions for access exist, there are other potentially prohibitive factors to patient access via regulated pathways, including:
  - regulatory approval rates
  - medical provider willingness given the level of evidence and patient-specific considerations
  - cost
- Clinical trials involving psychedelic-assisted psychotherapy are another potential access pathway, although these typically have comprehensive exclusion criteria.



