

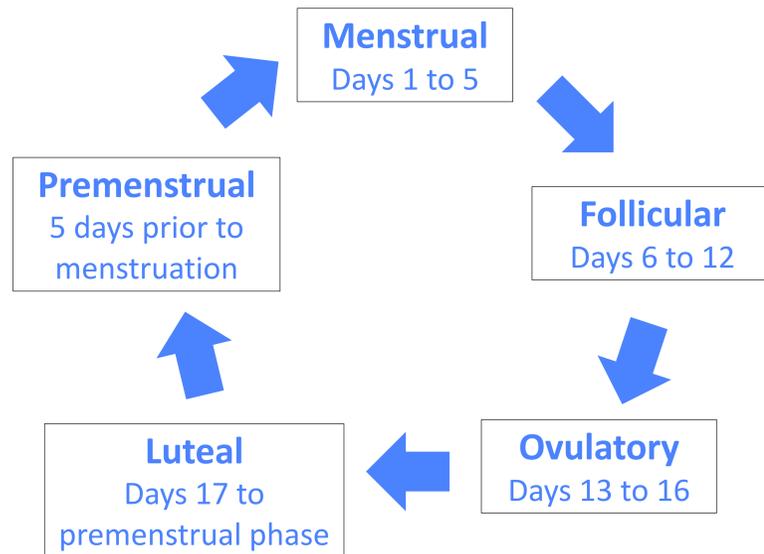
The Impact of Depressed Mood and Coping Motives on Cannabis Use Quantity Across the Menstrual Cycle in those with and without Pre-Menstrual Dysphoric Disorder

Kayla Joyce MSc, Kara Thompson PhD, Philip Tibbo MD, Kimberley Good PhD, M. O'Leary MSc, Tara Perrot PhD, Amanda Hudson PhD, Sherry Stewart PhD
University of Manitoba, Manitoba, Canada; Dalhousie University, Nova Scotia, Canada

Introduction

- Use of addictive substances change across the menstrual cycle¹

- Cannabis use findings are mixed^{2,3}



- Cannabis use may fluctuate across menstrual cycle phase, with increased use pre-menstrually and menstrually – phases characterized by increased negative affect^{4,5,6}

- **Pre-Menstrual Dysphoric Disorder (PMDD):** a mood disorder diagnosis characterized by severe increases in depressed mood pre-menstrually and menstrually

- Substance use is generally higher in those with vs. without PMDD⁷

PMDD Hypothesis

Increases in depressed mood and coping motives will be associated with increased cannabis quantity pre-menstrually and menstrually, particularly among females with PMDD vs. without



Methods

Participants. 69 naturally-cycling female cannabis users ($M_{age} = 29.25, SD = 5.66, Range = 19-43$ years)

Procedure.

- 1 • Telephone Screening
- 2 • Surveys & Saliva Sample
- 3 • 32 Days of Surveys (via Smartphone)
- 4 • Saliva Sample
- 5 • Debriefing & Compensation

Materials.

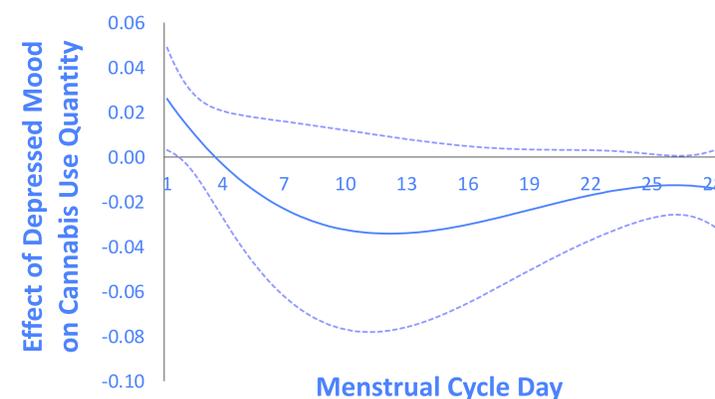
Daily Diary Survey. (1) Depressed Mood⁸, (2) Menstrual Cycle Day, (3) Cannabis Coping Motives¹⁰, (4) Cannabis Use Quantity¹¹

Data Analysis. Standardization to a 28-day cycle¹² and use of time-varying effect models

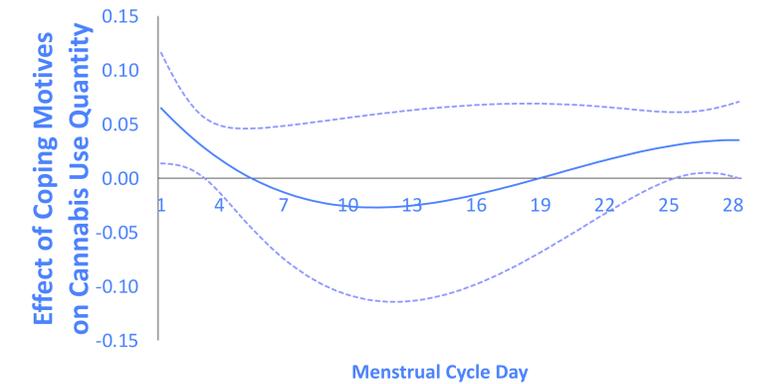
Results

With PMDD

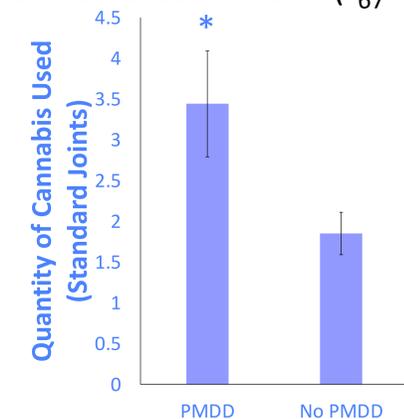
- Depressed mood was associated with increased cannabis use menstrually (days 1-2)



- Coping motives were associated with increased cannabis use menstrually (days 1-3) and pre-menstrually (days 25-28)



- Females with PMDD reported higher quantities of cannabis use than females without ($t_{67}=2.761, p<0.05$)



Discussion

- Finding highlight the importance of female reproductive hormones on addictive behaviors and underline the need to incorporate clinical population differences, such as PMDD, in our conceptualization of these relationships

- Clinical implications for reproductive-aged females with PMDD who misuse cannabis (e.g., adaptive skills to manage depressed mood and coping motives pre-menstrually and menstrually)

References Available Upon Request



<https://doi.org/10.1111/add.15465>