

# Examining the influence of delay discounting in the relationship between childhood adversity and alcohol use problems

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## Introduction

- The mechanisms underlying the relationship between **childhood adversity** and **alcohol use problems** are poorly understood. However, factors such as **reward responsiveness**, **emotion dysregulation**, and **delay discounting** may play an indirect role in influencing the relationship<sup>1</sup>.
- Delay discounting** refers to the tendency to choose smaller, immediate rewards over larger, delayed rewards<sup>2</sup>. Childhood adversity is associated with steeper delay discounting,<sup>3,4</sup> as is excessive drinking<sup>5</sup>.
- The **purpose of this study** is to build on a conceptual model describing the relationship between childhood adversity and problem alcohol use<sup>6</sup>, with a focus on the role of delay discounting, and how delay discounting may influence reward responsiveness and emotion dysregulation in influencing the relationship.
- Hypothesis:**
  - Emerging adults with a history of childhood adversity will display steeper delay discounting, blunted reward responsiveness, heightened emotion dysregulation, and be more likely to experience alcohol use problems later in life<sup>1,5</sup>.

## Acknowledgements

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## Methodology

- Participants were recruited through Prolific, and deemed eligible if they met the criteria below:
  - 18-29 years old
  - Read and write in English and reside in North America
  - Consume alcohol 2-4 times a month or more

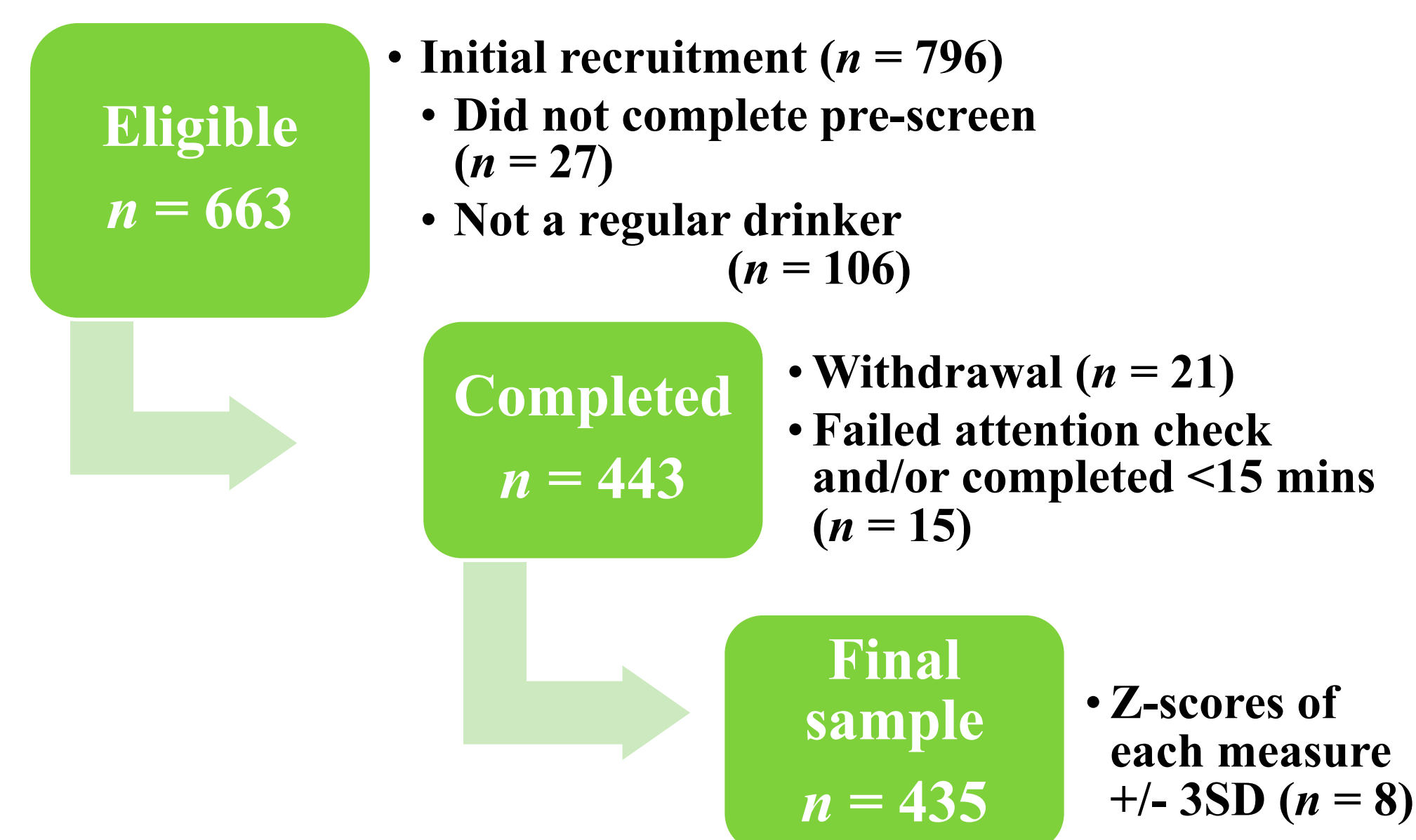


Figure 1. Recruitment flow and final study sample

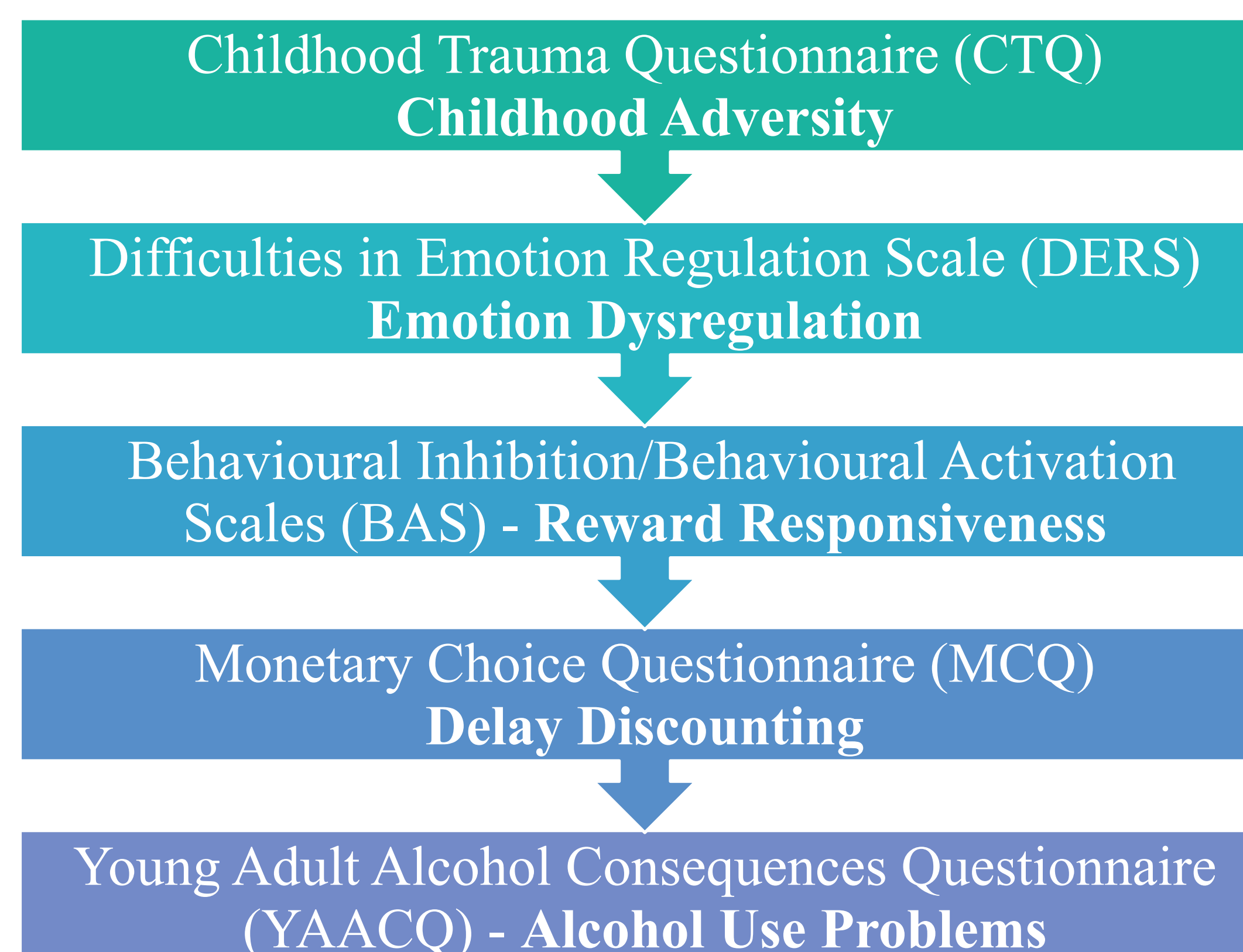


Figure 2. Measures administered in the study.

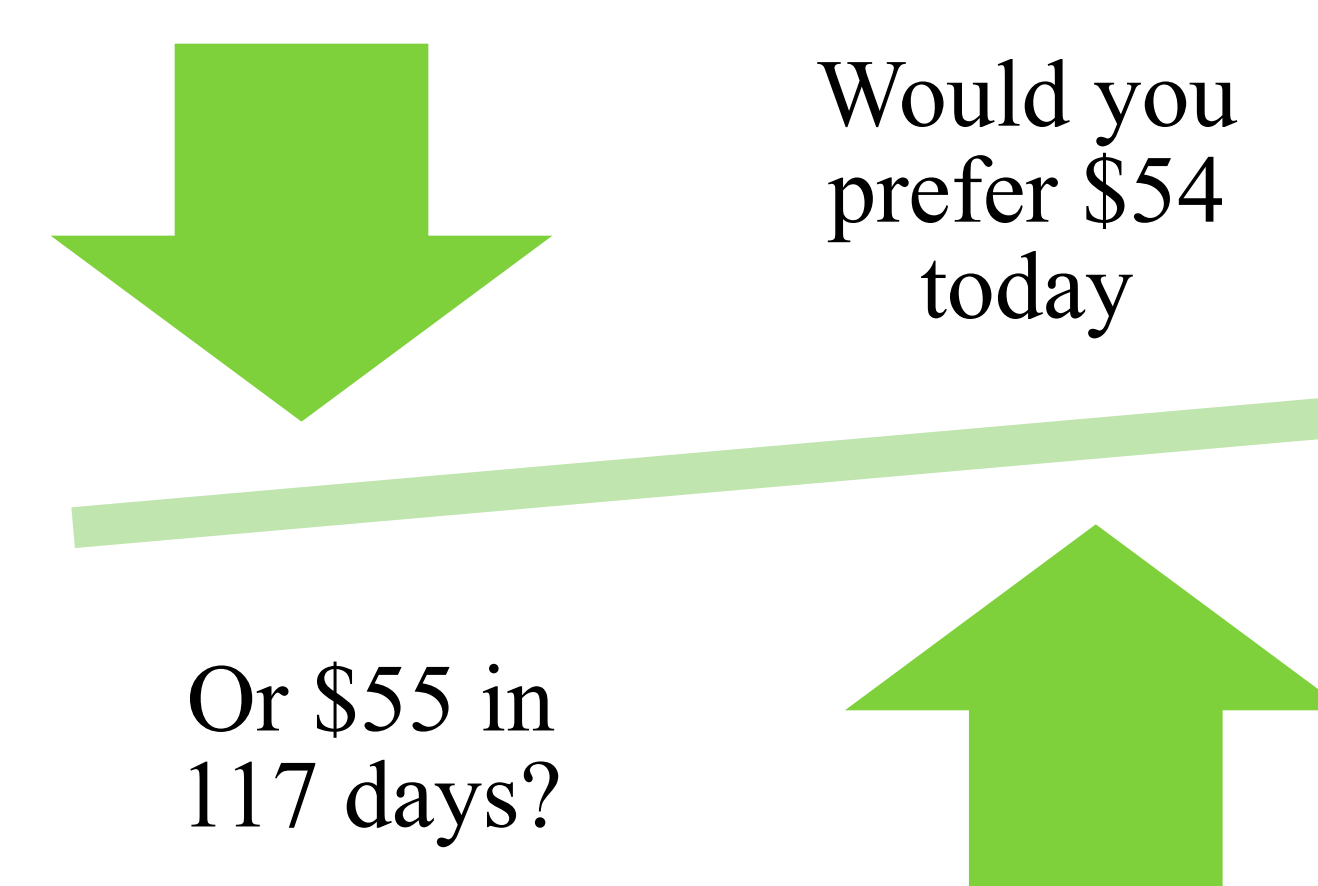


Figure 3. MCQ sample item

## Results

- Participants ( $n = 435$ ), 60% assigned female at birth, with a mean age of 24.88 years ( $SD = 2.88$ ) and an average annual household income \$43,700 USD ( $SD = 1.85$ ).

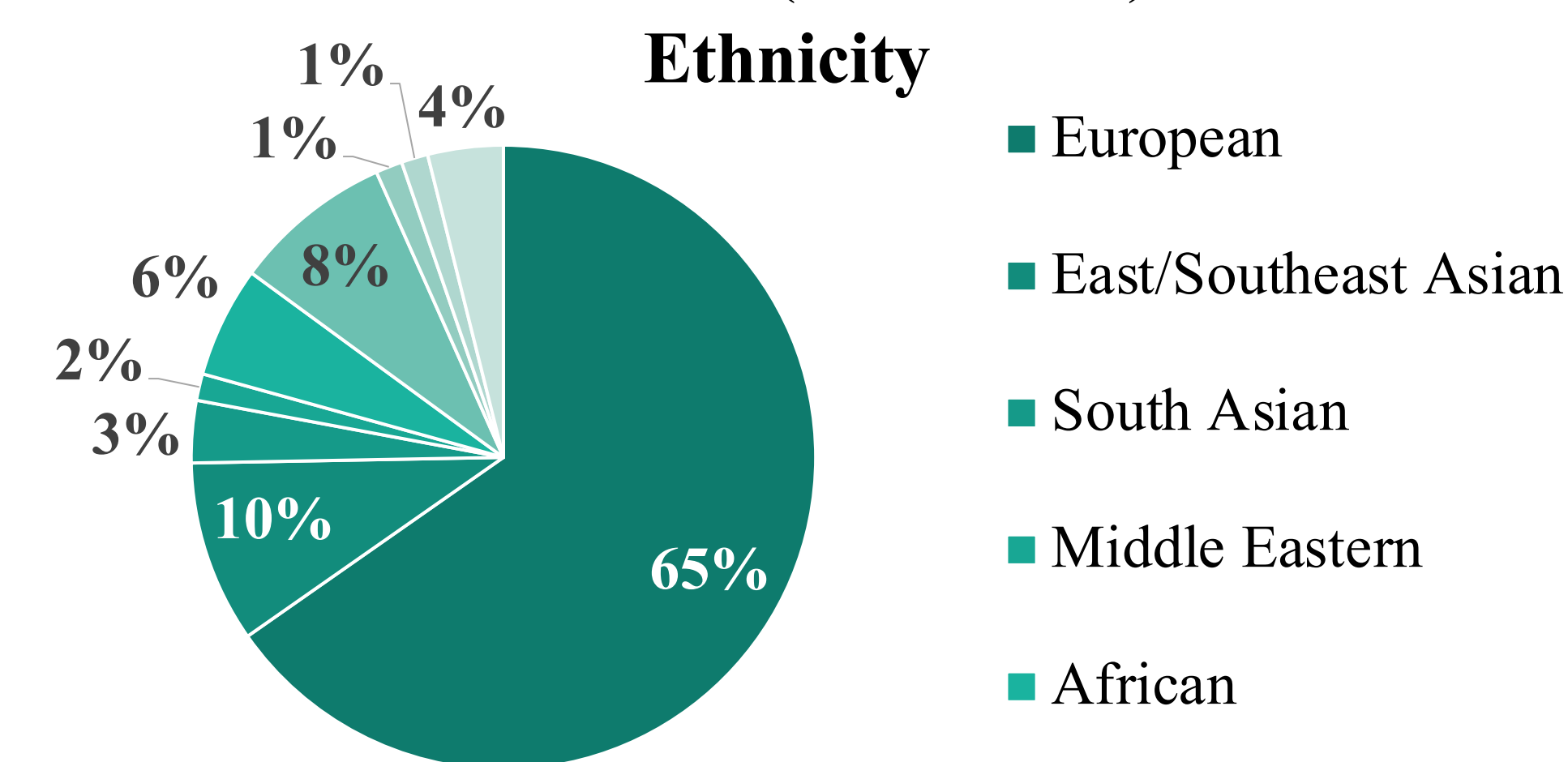


Figure 4. Demographics results on ethnicity

Table 1. Summary statistics for the proportion of larger delayed rewards chosen from the MCQ.

Summary Statistics	Mean	SD	SEM
Overall proportion	46.63%	19.80%	0.97%
Proportion of Small	39.33%	20.40%	1.00%
Proportion of Medium	47.23%	21.32%	1.05%
Proportion of Large	53.33%	20.35%	1.00%

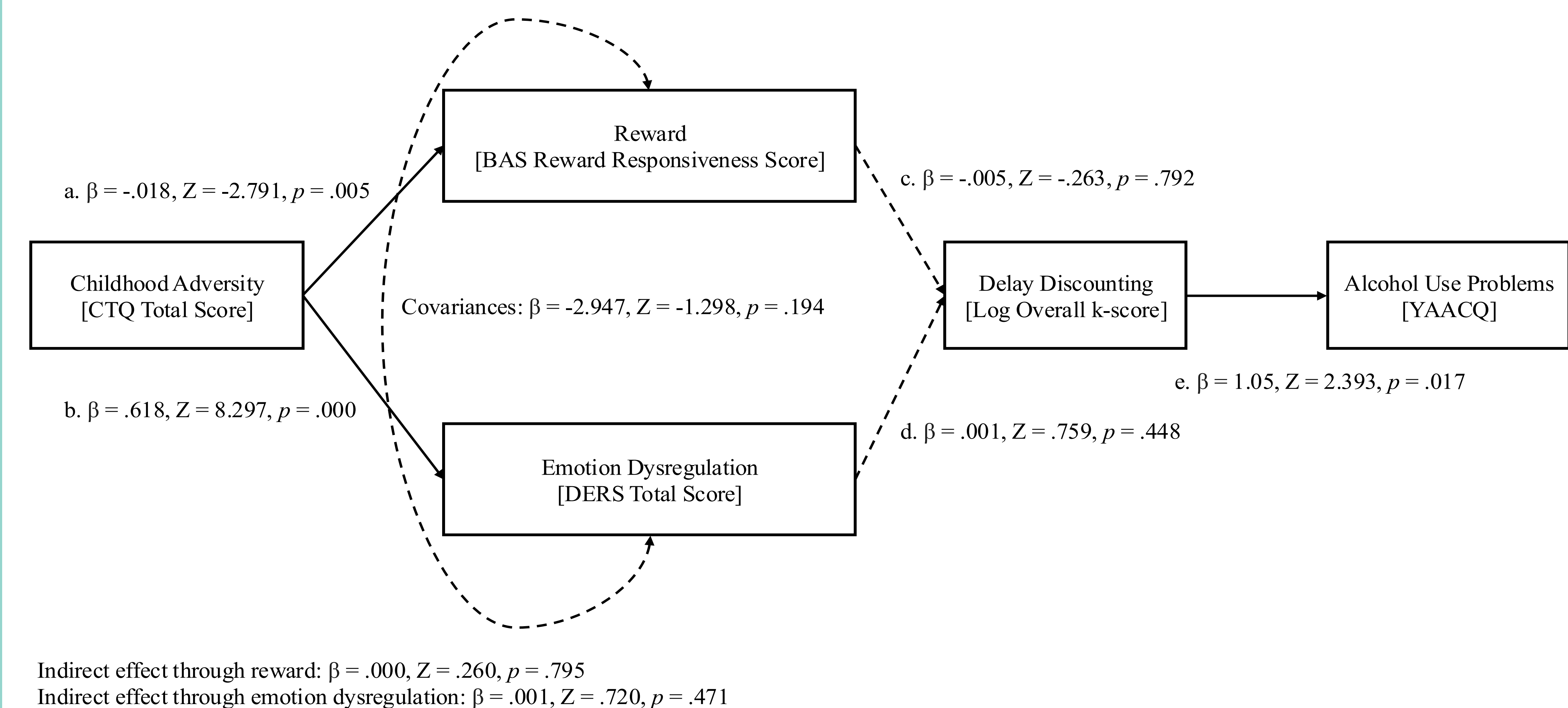


Figure 5. Path analysis model depicting the relationship between childhood adversity and alcohol use problems through reward responsiveness, emotion dysregulation, and delay discounting.