

Background:

- Humans have advanced social learning cognitive skills that allow them to live in a culture.³
- Precursors are evident early in development: 1-year-olds know others have thoughts and intentions.³
- When playing games, 3-year-olds both follow rules and enforce them on others.¹
- Children take unanimous agreement into account when enforcing rules.²
- Children thus seem to understand the importance of social agreement when considering the weight of social norms.²

Question:

Are 5-year-old children as likely to enforce a rule they created on their own as they are to enforce one that they created within a social context?

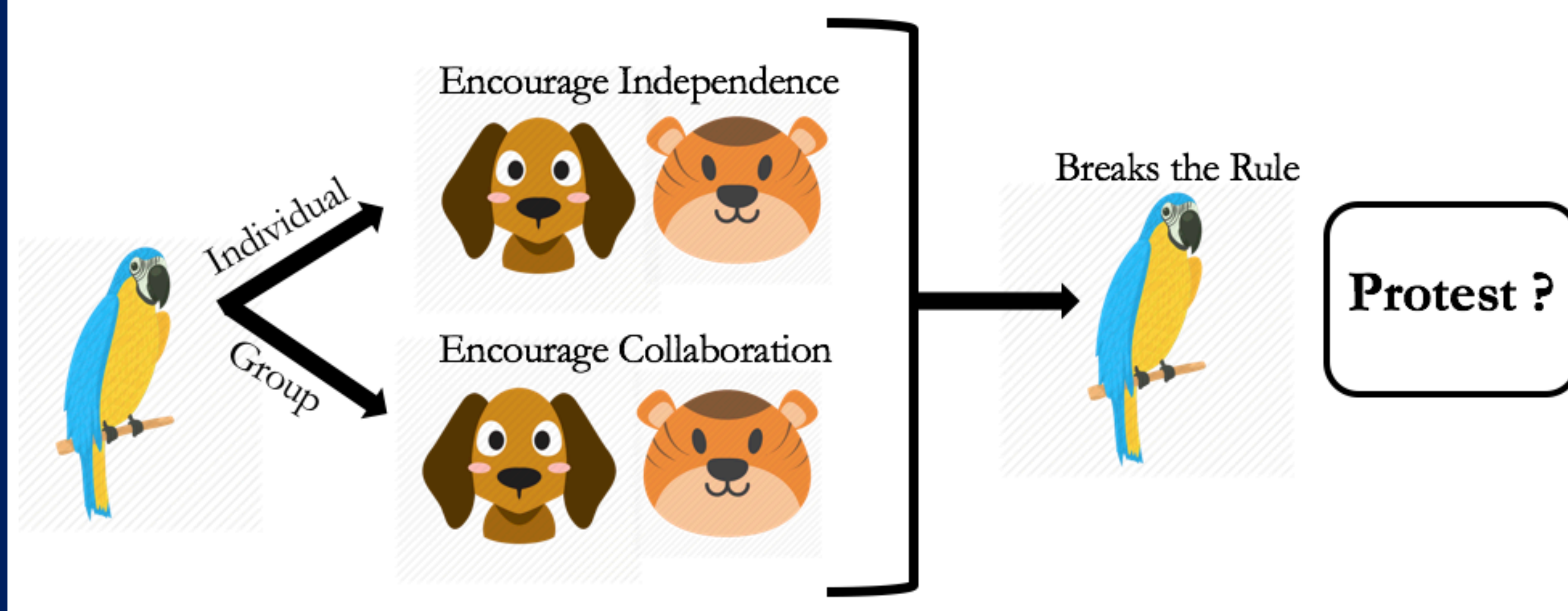
Method:

Participants

N = 46, 5-year-olds
Recruited through online database

Materials

3 puppets: parrot, tiger, and dog
Beanbag and empty trashcan



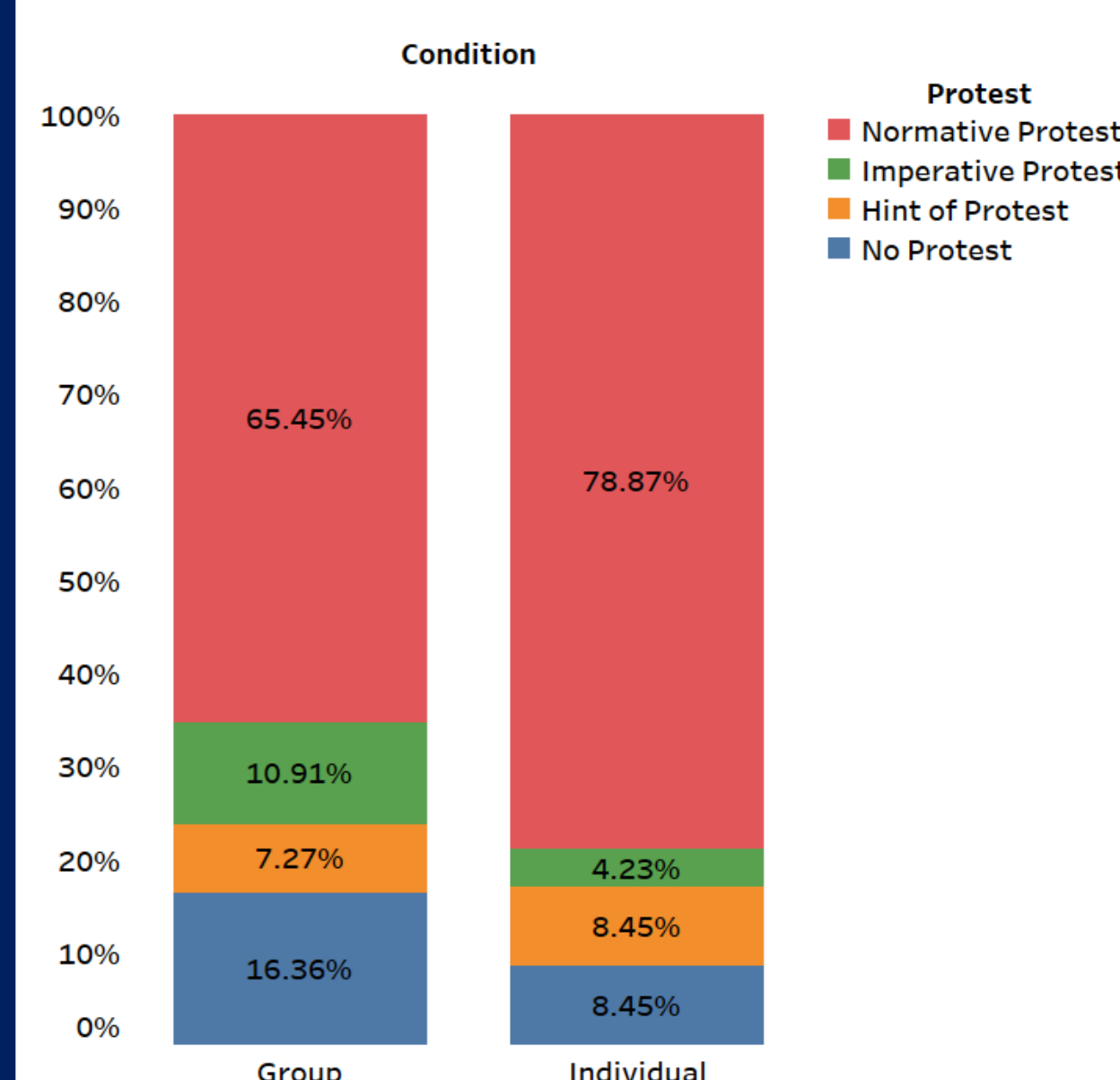
Discussion:

- Our statistical analysis showed no difference between the Individual and Group conditions: children were equally likely to protest against rule-breaking regardless of whether they created the game collaboratively or on their own.
- Possible interpretations include children not having developed a strong enough sense of partnership with the puppets, our game-creation phase being too short, and the young age of our participants.
- Further investigations could include a replication of this study within a different age-group and the usage of a game with a stronger emphasis on cooperation.

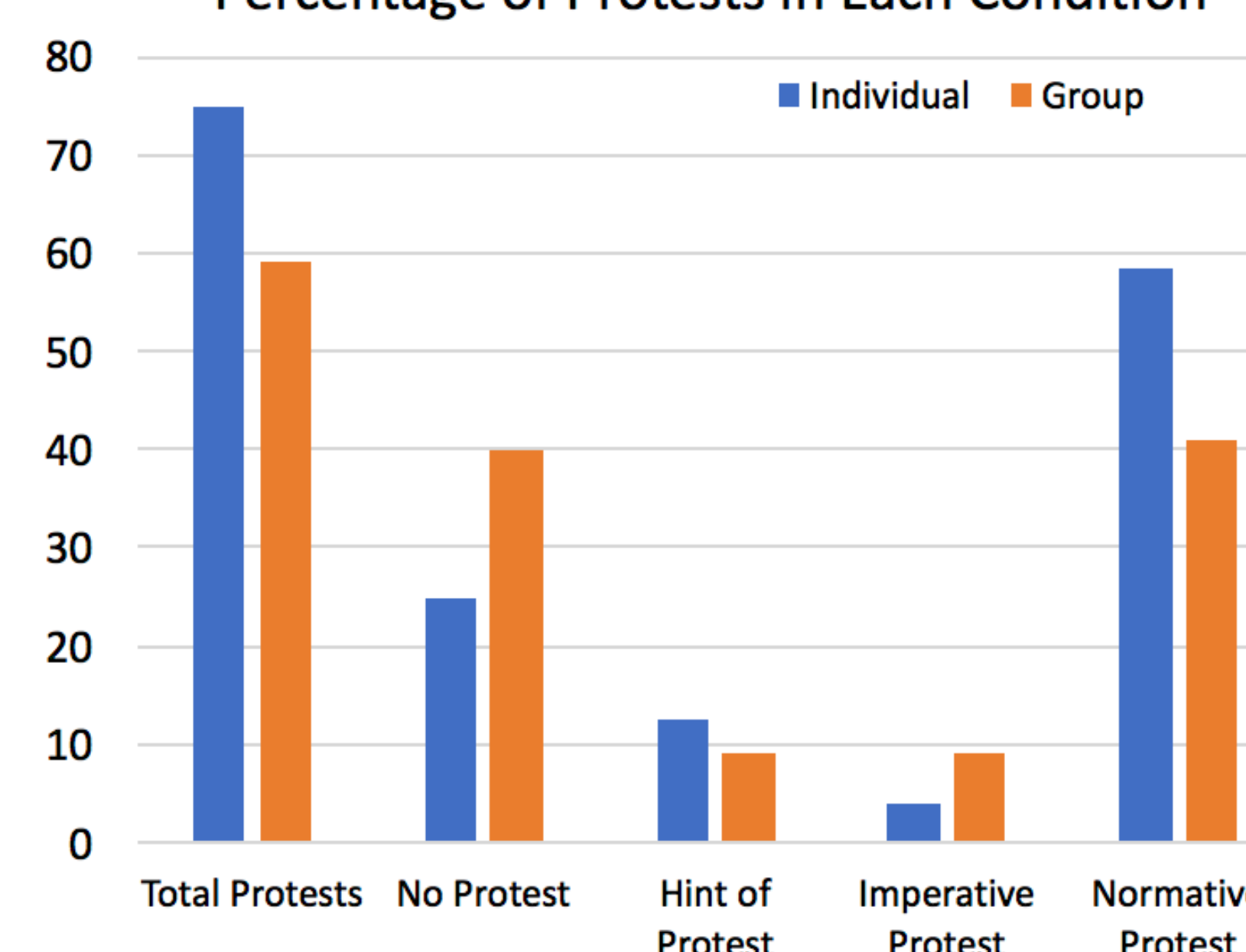
Results:

We conducted a chi-square test of independence to examine the relationship between condition (individual or group) and type of protest (no protest, hint of protest, imperative protest, and normative protest). The results of this test were insignificant, $X^2(3, N = 46) = 2.137$, asymptotic $p = .544$. We also ran an Independent Samples Mann-Whitney U Test, which showed no effect of condition on protest.

Percentage of children displaying different forms of protests in each condition



Percentage of Protests in Each Condition



Acknowledgments:

This research was supported by The Charles Lafitte Foundation for Research in Psychology and Neuroscience at Duke University. I would also like to thank Dr. Michael Tomasello, Dr. Pamela Maxson, and Dr. Susanne Hardecker for their mentorship, graduate students Jared Vasil and Wouter Wolf for their guidance, and undergraduate Tomasello Lab researchers for their assistance with data collection and reliability coding: Julia Thielhelm, Yeonju Suh, Kayla Harris, Caitlin Luby, Anna Fink, and Lucy Pruzan.

References

1. Schmidt, M. F., & Tomasello, M. (2012). Young Children Enforce Social Norms. *Current Directions in Psychological Science*, 21(4), 232-236. doi:10.1177/0963721412448659
2. Schmidt, M. F., Rakoczy, H., Mietzsch, T., & Tomasello, M. (2016). Young Children Understand the Role of Agreement in Establishing Arbitrary Norms-But Unanimity Is Key. *Child Development*, 87(2), 612-626. doi:10.1111/cdev.12510
3. Tomasello, M. (2000). Culture and Cognitive Development. *CURRENT DIRECTIONS IN PSYCHOLOGICAL SCIENCE*, 9(2), 37-40.