

## Introduction

- The primary intent of this study is to address the conformity rates exhibited by individuals with Autism Spectrum Disorder (ASD).
  - The Solomon Asch line judgement task is used to test the effects of peer pressure on social conformity.
  - There is a discrepancy in the conformity exhibited by typically developing individuals (TD) and ASD individuals.
  - This study seeks to address the degree to which ASD individuals are affected by social influence and how likely they will be to conform.
  - Conformity rates will be compared to that of TD college age students as well as students with various intellectual disabilities (ID).
- This study explores the theory of mind (ToM) in individuals with ASD.
  - ToM is an essential function that allows individuals to attribute mental states to themselves and others.
  - Those with ASD lack ToM.
  - This study seeks to address if a lack of ToM will lead to lower rates of conformity for individuals with ASD.
- This study includes:
  - Data of ASD and ID conformity rates using the Solomon Asch line judgement task
  - Comparisons of ASD, ID and TD individuals.

## Literature Review

### Solomon Asch line judgement task

Solomon Asch devised the line judgement task in 1951. This classic experiment in social psychology, whereby there was an obvious answer to a line judgement task, was created to test social conformity (McLeod, 2018). The findings of this experiment were as expected; when individuals are faced with social pressure, they are likely to conform to the popular opinion.

### Conformity

Conformity is an individual's tendency to follow the unspoken rules or behaviors of the social group to which he or she belongs. Asch determined that participants were likely to conform for two different reasons. The first is due to the desire to fit in, Asch deemed this normative influence. The second is due to the belief that the group is better informed than individuals perceived themselves to be. This is referred to as informational influence.

### ASD

ASD is characterized by difficulties in social communication and restricted, repetitive behavior, as well as difficulty with Theory of Mind (ToM). Since impaired ToM was specifically reported in children with ASD, difficulties with understanding the mental states in both self and others, are believed to be core to social-communication deficits (Lai, Lombardo, Baron, 2014).

### Theory of Mind

Most individuals when faced with a group of members who unanimously express a belief to be contrary to one's own will conform their judgement to align with the crowd. However, the ToM difficulties characteristic of ASD, as demonstrated in social-perspective taking tasks, may also impede the perception of social pressure, resulting in a lack of conformity (Yafia, Verrier, Reidy, 2014).

## Research Questions and Answers

### Results of experiment

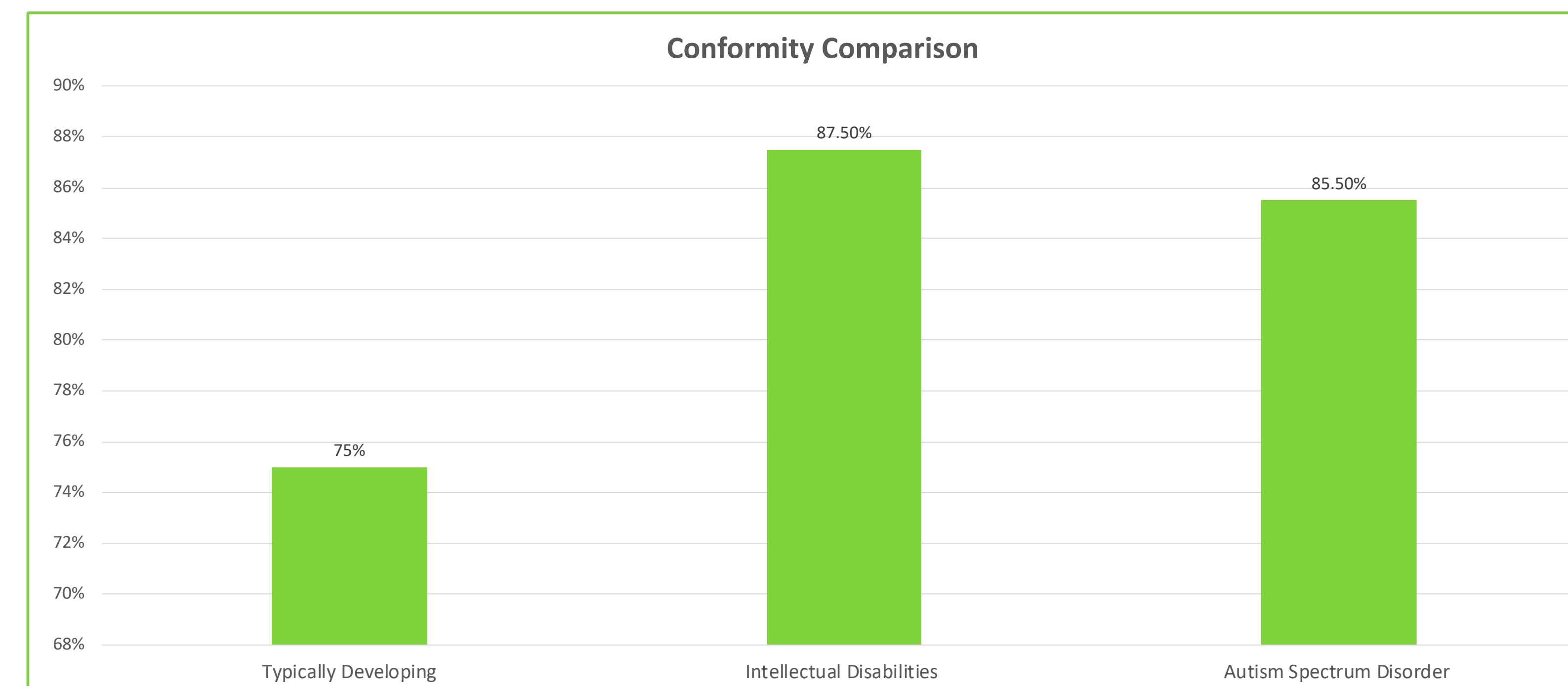


Figure 1. Conformity Comparison among groups

- Individuals with ASD conformed at 85.5%.
- Individuals with ID conformed at 87.5%.
- In previous studies, individuals who are TD conformed at 75%.
- According to these findings: individuals with ASD are more likely to conform than individuals who are TD or ID.

### Material used during experiment

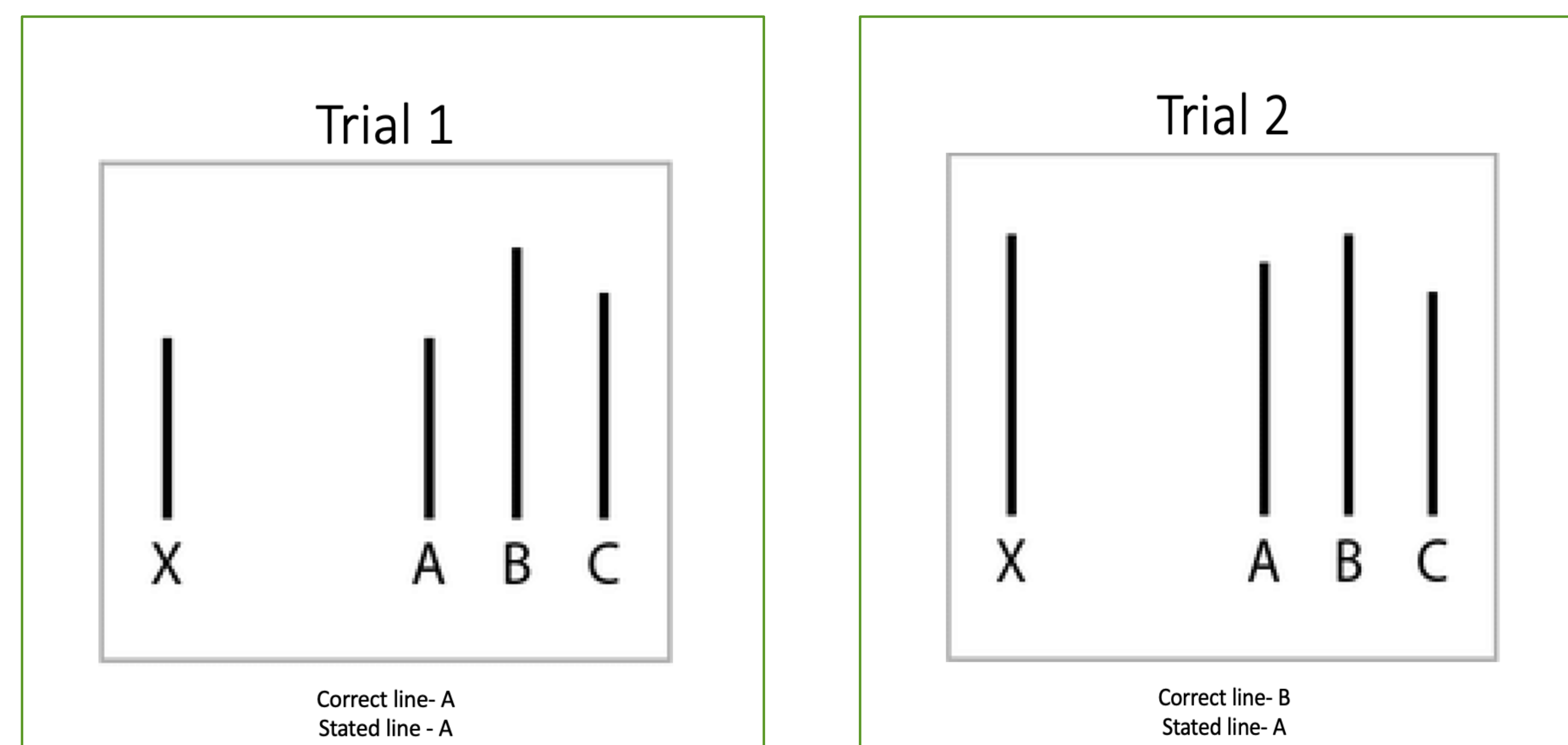


Figure 2: Experimental trials

- Trial 1 is an example of a trial where confederates gave correct answers. This occurred in 4 of 16 trials.
- Trial 2 is an example of a critical trial, where confederates gave false answers. This occurred in 12 of 16 trials. Data from critical trials was used to calculate conformity rates.

## Research Design and Methods

### Participants

- 6 participants with from the University of Arkansas Empower program participated in the experiment.
- 4 of these had ASD: 3 boys and 1 girl. 2 of these had an ID: both girls.
- 7 college students volunteered to serve the role of "confederates" to facilitate the experiment.
- Previous studies used the Solomon Asch experiment to test conformity of TD and that data has been used as a comparison.

### Materials- Solomon Asch line judgement task

- Each participant was given a "visual acuity" test that consisted of 16 different trials.
- Each trial consisted of a target line and 3 lines, A, B, C, of comparable lengths. (See figure 2)

### Procedures

- On 12 out of 16 trials the confederates claimed that A, B, or C, was equivalent to the target line, even though it was clearly false. These were considered critical trials.
- The 7 confederates will unanimously agree and state aloud a line prior to the participant.
- The participants responses were recorded based on whether they conformed to the majority view.

### Analysis

- Results from the experiment were categorized to determine a group percentage rate for the two groups studied: individuals with ASD and ID.
- This data was used to interpret if individuals with ASD were as likely to conform as TD or ID.

## Discussion

### Potential explanations for conformity:

- Belief that the group is more informed than the individual.
- Desire to fit in/ be a part of the crowd.
- Saving face/ avoiding potential embarrassment.
- Cultural considerations. Focus on group unity/ cohesiveness.
- Time period. Rates of conformity vary depending on time period

## Conclusion

- To address the research question: a lack of ToM did not lower the rates of conformity exhibited by individuals with ASD in this study.

## For References and Information

Lai, M., Lombardo, M. V., & Baron-Cohen, S. (2014). Autism. *The Lancet*, 383(9920), 896-910. doi:http://dx.doi.org.library.uark.edu/10.1016/S0140-6736(13)61539-1

McLeod, S. A. (2018, December 28). Solomon Asch- Conformity Experiment.

Yafia, A. F., Verrier, D., & Reidy, L. (2014). Social conformity and autism spectrum disorder: A child-friendly take on a classic study. *Autism*, 18(8), 1007-1013.

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