

# The Temporal Contiguity Effect is modulated, but not eliminated, by orthographic distinctiveness

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## Introduction

- *Temporal Contiguity Effect*: recalling one event triggers recall for other events experienced nearby in time to the initial event
- Effect is robust and almost always found
- One exception: when memorizing words with unusual spellings<sup>1</sup>
  - Challenges existing models

**Research Question:** Does orthographic distinctiveness eliminate the Temporal Contiguity Effect?

## Design

- $N = 338$ 
  - Recruited using Amazon's mTurk
- Free recall list learning task
  - Three trials each with 10 words
- Two conditions, between subjects:
  - Orthographically common ( $n = 162$ ):

arcade	eraser	refinement
bison	glue	ruler
cookie	parachute	shank

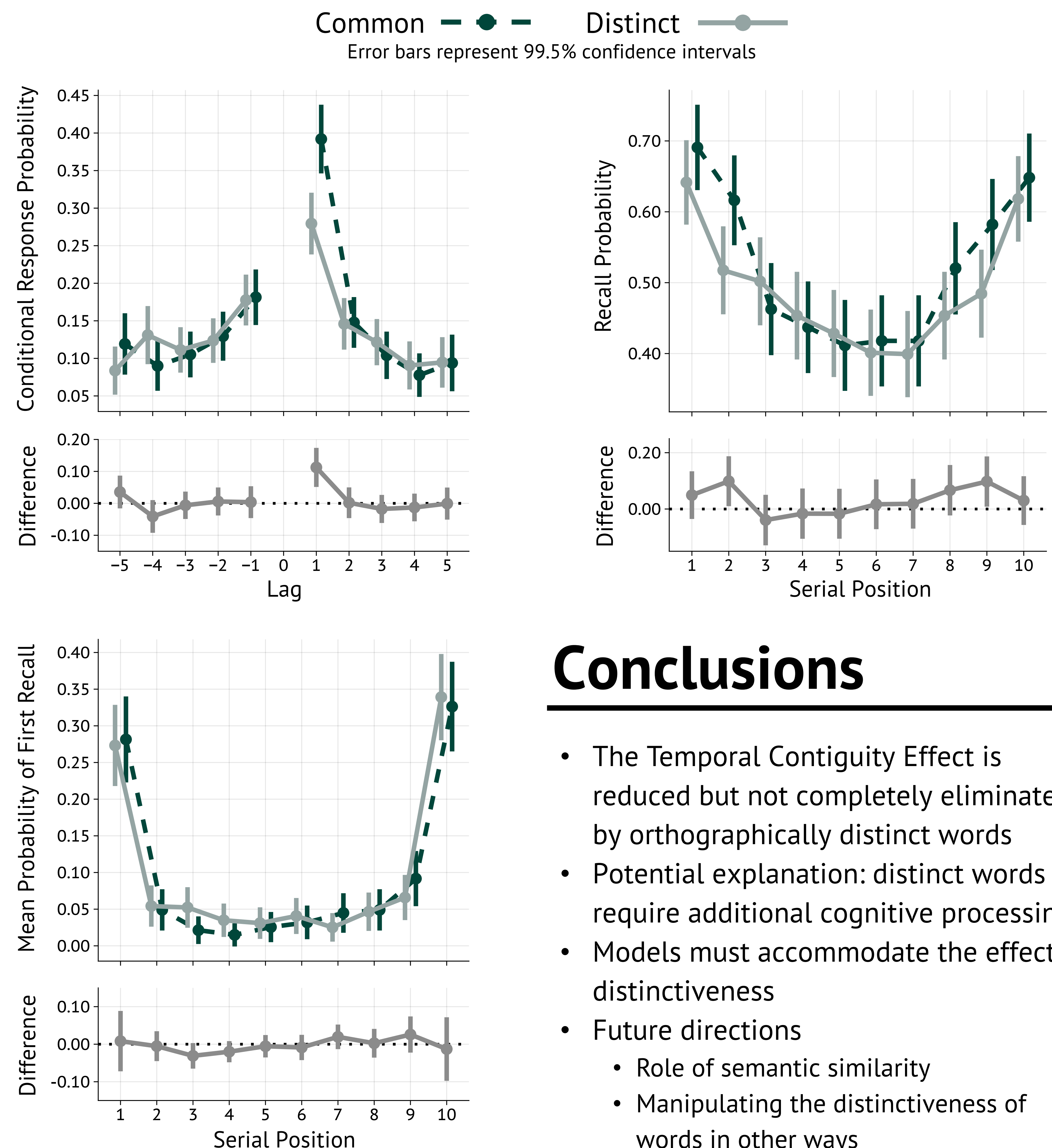
- Orthographically distinct ( $n = 176$ ):

alfalfa	hyena	ptomaine
fjords	khaki	rhetoric
gnat	phlegm	svelte

## References

<sup>1</sup> McDaniel, M.A., Cahill, M., Bugg, J.M., & Meadow, N.G. (2011). Dissociative effects of orthographic distinctiveness in pure and mixed lists: an item-order account. *Memory & Cognition*, 39, 1162-1173.

## Results



## Conclusions

- The Temporal Contiguity Effect is reduced but not completely eliminated by orthographically distinct words
- Potential explanation: distinct words require additional cognitive processing
- Models must accommodate the effect of distinctiveness
- Future directions
  - Role of semantic similarity
  - Manipulating the distinctiveness of words in other ways

## Contact

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