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# Investigating linguistic representations in the structural priming paradigm: The case of adjuncts

## Introduction

### Structural priming

Branigan and Pickering (2017) claim that **structural priming** (Bock, 1986) may become a source of evidence about **linguistic representations**, thereby replacing introspective judgements.

## ... of adjuncts

The representation of **adjuncts** is **controversial** (Hole 2015). Attested priming effects might be due to **form similarity** (PPs) and/or to **proto-role similarity** (proto-recipients):

- Beneficiary PPs (vs. NPs) prime recipient PPs (vs. NPs) (Bock 1989; Pappert & Pechmann 2013).
- Inanimate goal PPs prime animate recipient PPs (vs. NPs) (Pappert, Baumann, & Pechmann, 2012).

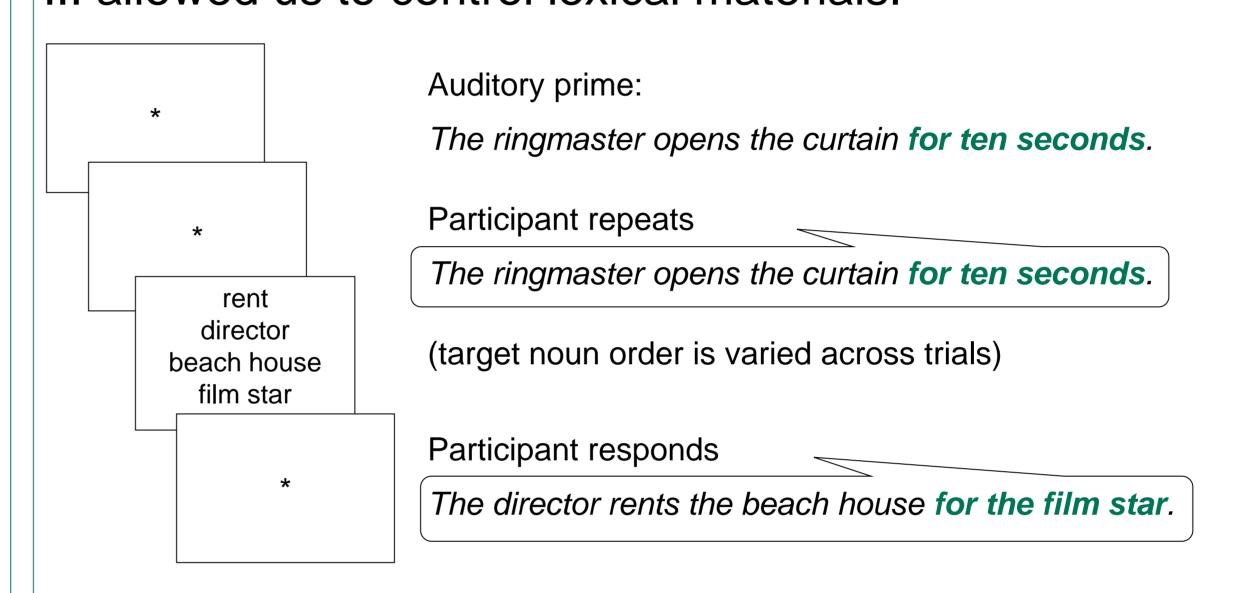
## Method

### Samples per experiment

48 native speakers of German responded to 24 items.

Sentence generation paradigm (Pappert & Pechmann, 2013)

... allowed us to control lexical materials.



# Exp. 1: Temporal vs. beneficiary PPs

## **Materials**

4 prime conditions, with/out PP vs. dative adjunct:



Targets with benefactive alternating between PP and dative

# 100 80 60 40 20 Temporal Beneficiary Beneficiary Control

Results (% beneficiary PP vs. ben dat responses)

## Discussion

Role dissimilarity (temporal vs. beneficiary) hinders priming.

Parallels in phrase structure (PPs) are not sufficient to ellicit priming.

# Exp. 2: Temporal vs. theme accusatives

## **Materials**

MF: Mittelfeld (here positions after the verb)

4 prime conditions, with accusative adjunct vs. argument:

<b>Temporal</b>	Der Mechaniker	hilft	dem	Lehrling	den	ganzen Sommer.
MF-final	the.NOM mechanic	helps	the.	DAT apprentice	the.	ACC whole summer
<b>Temporal</b>	Der Mechaniker	hilft	den	ganzen Somm	<i>ier</i>	dem Lehrling.
<b>MF-initial</b>	the.NOM mechanic	helps	the./	ACC whole sumr	mer	the.DAT apprentice
Theme	Der Mechaniker	überre	eicht	dem Lehrling		den Hammer.
MF-final	the.NOM mechanic	hands		the.DAT appren	tice	the.ACC hammer
Theme	Der Mechaniker	überre	eicht	den Hammer		dem Lehrling.
<b>MF-initial</b>	the.NOM mechanic	hands		the.ACC hamm	er	the.DAT apprentice

Targets with theme and non-alternating dative recipient

Results (% theme MF-final vs. MF-initial responses)

# 100 | 92 | 86 | 89 | 81 | 60 | 40 | 20 | Temporal | Temporal | Theme | MF-final | MF-initial

## **Discussion**

Role dissimilarity (temporal vs. theme) does not hinder priming.

Parallels in case are sufficient to ellicit priming.

• Main effect of word order/position (MF-initial vs. MF-medial)

## General discussion

The outcome of **Experiment 1** favours the **proto-role** approach. In **Experiment 2**, **form similarity** (case) turns out to be crucial (even though it does not seem to be a necessary condition of structural persistence, cf. Pappert & Pechmann, 2014).

dative

 $\beta$ =0.05 *ns* 

## Conclusions

Does this pattern of results justify the conclusion that there are differences in semantic or syntactic representations?

The identification of linguistic representations involved in structural persistence is **not easy**.

## References

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