

‘Give’ and ‘take’ perspective of datives modulates structural priming

Yutong Zhang (Peking University)

Zuoyan Song (Peking University)

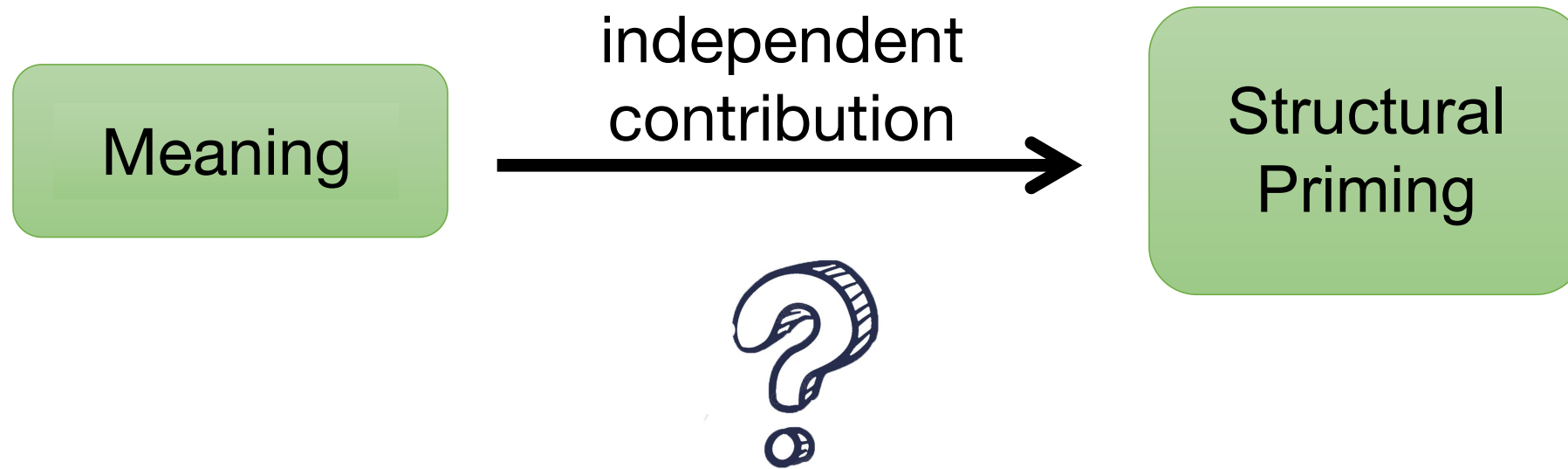
Heeju Hwang (University of Hong Kong)

March 11, 2023

Human Sentence Processing 2023

Structural Priming

- Structural priming is the tendency for speakers to reuse previously spoken or heard syntactic structures.



Does meaning influences structural priming?

- Structural priming is abstract and independent of meaning
 - same surface syntactic structure, different meaning → priming occurs

(1) a. *The 747 was alerted by the airport's control tower. (passive)*

agent

b. *The 747 was landing by the airport's control tower. (locative)*

destination

c. *The man was stung by a bee. (passive)*

agent

(Bock & Loebell, 1990)

Does meaning influences structural priming?

- Structural priming is influenced by meaning
 - same surface syntactic structure, similar meaning → enhanced priming

(2) a. *The boy sprayed cologne on the man. (locative)*

animate destination

b. *The boy loads the bag on the cart. (locative)*

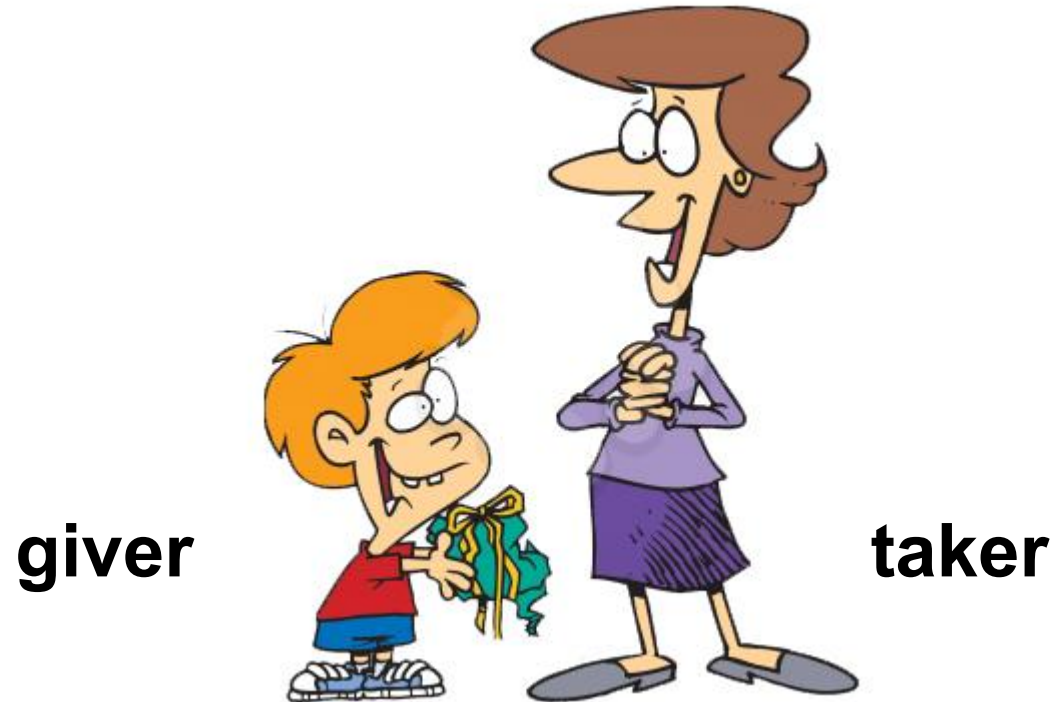
inanimate destination

c. *The boy hands the suitcase to his mother. (PO dative)*

animate goal

(Ziegler & Snedeker, 2018)

Ditransitive Event



From the standpoint of the giver
→ a *giving event*

- *The boy gave a present to the woman.*

From the standpoint of the taker
→ a *taking event*

- *The woman received a present from the boy.*

Mandarin DO vs. English DO

	Mandarin DO	English DO
giving	(3) a. 男孩送了女人一个礼物。 boy gave woman a present 'The boy gave the woman a present.'	(4) a. The boy gave the woman a present.
taking	b. 女人收了男孩一个礼物。 woman received boy a present 'The woman received a present from the boy.'	b. *The woman received the boy a present.

- Mandarin DOs can describe both giving (3a) and taking events (3b) .
- English DOs can only describe giving events (4a).

Research Question

- Does the 'give' and 'take' perspectives in **Mandarin** datives influence speakers' structural choice in **English** datives?

GIVE PERSEPCTIVE

学生送了老师一本书。

student gave teacher a book

enhanced priming?
perspective-consistent

TAKE PERSEPCTIVE

老师收了学生一本书。

teacher received student a book

perspective-inconsistent

GIVE PERSEPCTIVE

The assistant hand the boss a cup of coffee.

Participants

- 20 Mandarin-English speakers from Peking University
(10 males, age range 18–22, mean age 20.5)
- Good users of English
(IELTS score > 7.0)

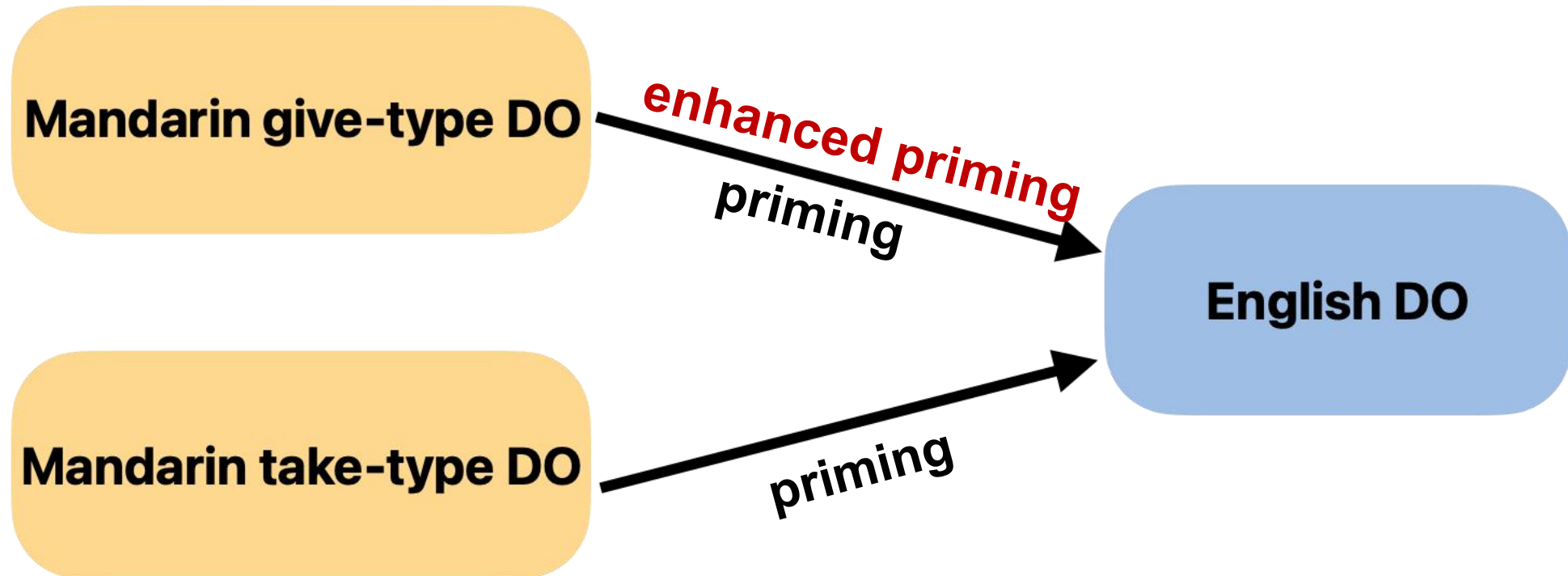
Materials

- IV 1: Sentence structure (2 levels: DO vs. PO)
- IV 2: Verb meaning (2 levels: give vs. take)

		Sentence structure	
		DO	PO
Verb	give	GIVE PERSEPCTIVE 厨师送了将军一本书。 ‘The chef gave the general a book.’	GIVE PERSEPCTIVE 厨师送了一本书给将军。 ‘The chef gave a book to the general.’
	take	TAKE PERSEPCTIVE 老师收了学生一封信。 ‘The teacher received a letter from the student.’	GIVE PERSEPCTIVE 老师收了一封信给学生。 ‘The teacher received a letter and gave it to the student.’

Predictions

- Mandarin give-type DO and Mandarin take-type DO can both prime English DO.
- Mandarin give-type DO has a stronger priming effect on English DO than Mandarin take-type DO.



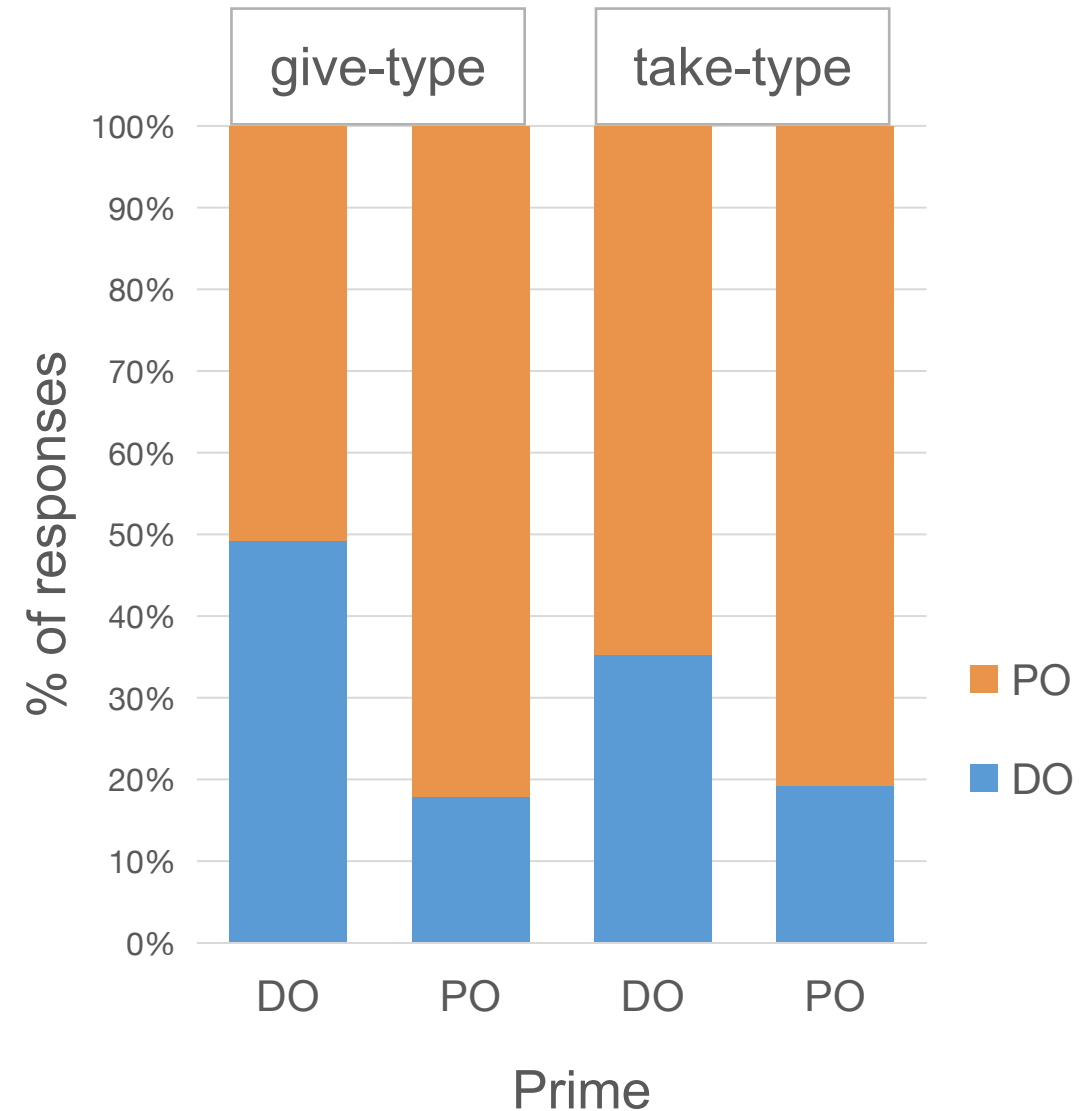
Results

- more English DO responses following Mandarin DO primes than PO primes (42.3% vs. 18.6%, $p < .01$)

→ Perspective-consistency is not necessary for priming to occur.

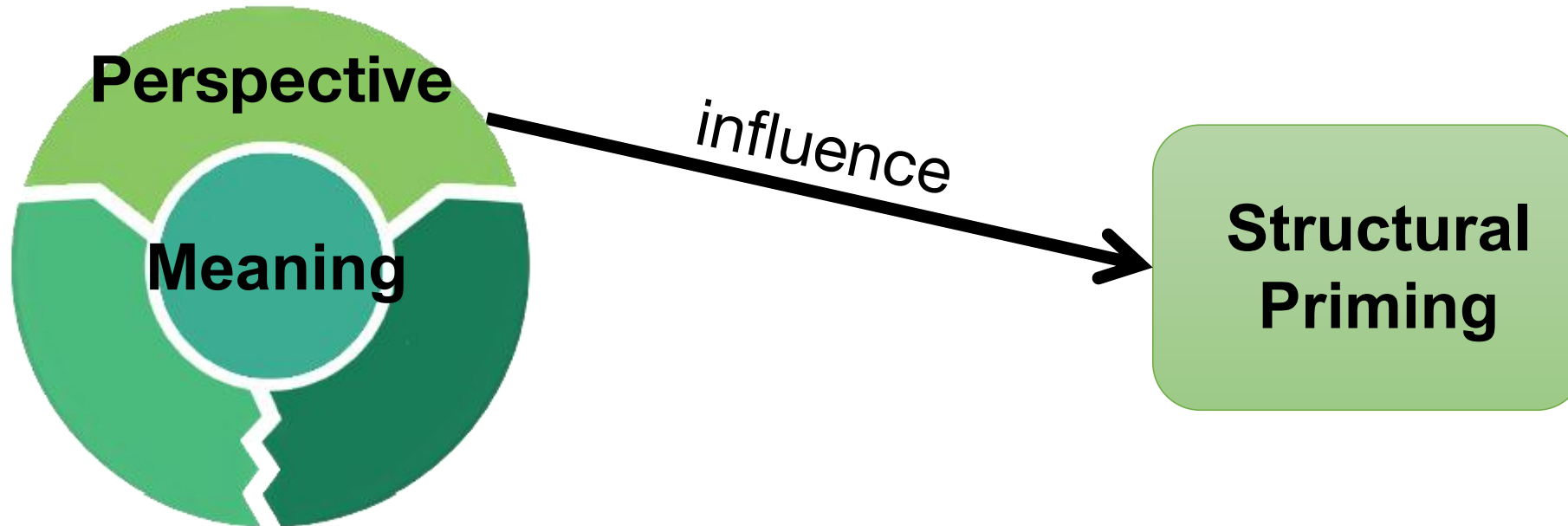
- more English DO responses after Mandarin give-type DO primes than Mandarin take-type DO primes (49.2% vs. 35.3%, $p < .05$)

→ Priming effects are larger when the perspective choices of target and prime are consistent.



Does meaning influences structural priming?

- **Perspective**, as an aspect of meaning, plays a significant role in structural priming.



Thank you for listening!

March 11, 2023

The 36th CUNY Conference on Human Sentence Processing