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THE COMMUNICATIVE STRATEGIES
Sentence topics in Italian Sign Language (LIS)
Chiara Calderone, XXXII course

RESEARCH QUESTIONS
1. How many types of sentence topic exist and how they are realized?
2. How information is managed among signers and reintroduced into the discourse?
3. Which is the syntactic distribution of sentence topic types?

IDENTIFICATION CRITERIA
"Topics have been identified as those entities which were previously introduced into the discourse, except for scene-setting topics which establish the framework within which the sentence is interpreted"
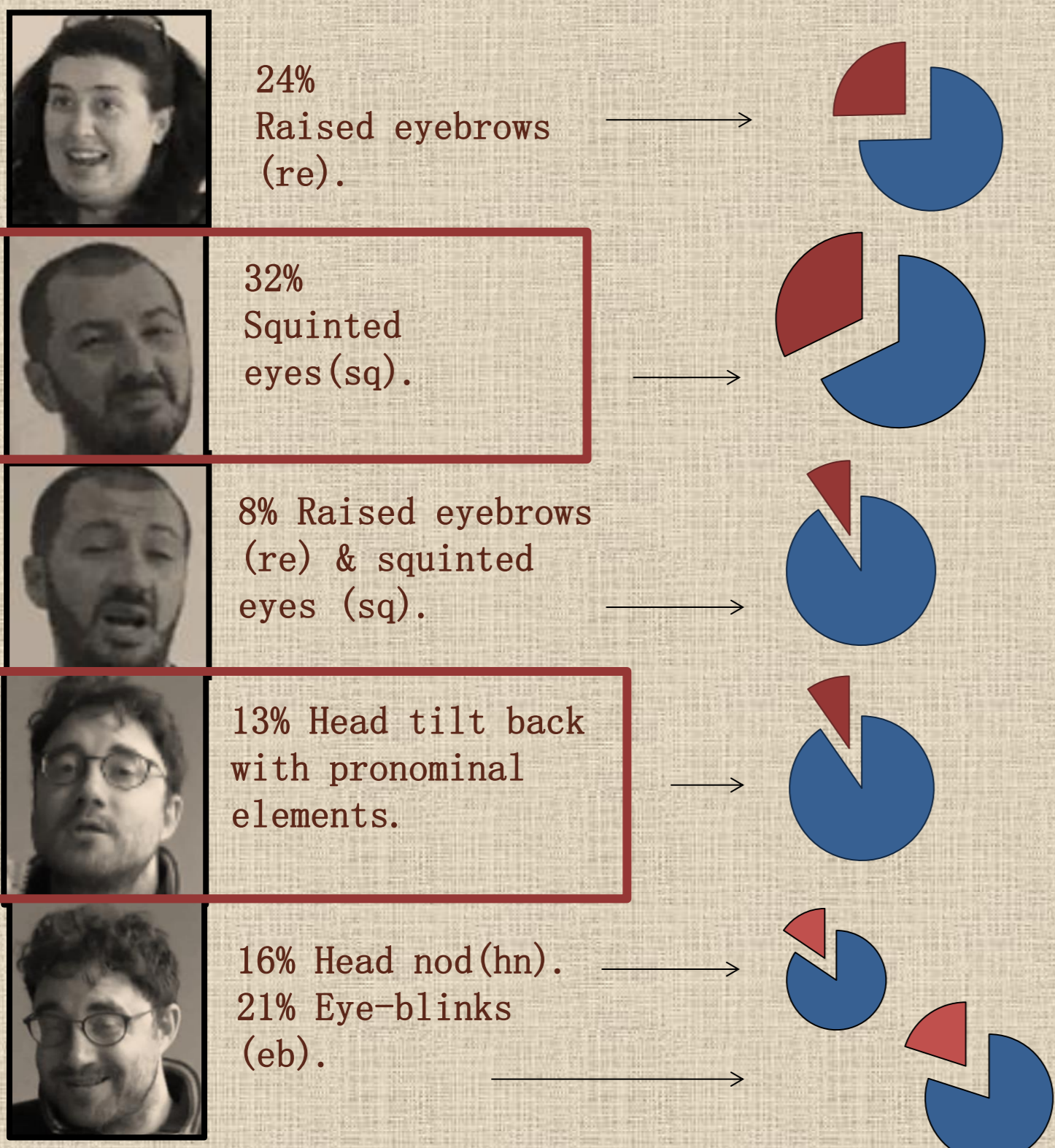Reinhart 1981, Götze et al. 2007, Sze 2011.

DATA COLLECTION (2262 items)
- Spontaneous data: Story-telling (1171 AbT, 274 SsT items). Monologues (484 AbT, 64 SsT items).
- Elicited sentences (89 AbT, 120 SsT, 60 CT items).
- 9 native signers from the northern part of Italy (mean age 36, range 21-52).
- Annotation software ELAN, statistics EXCEL, "R".

ABOUTNESS TOPIC (AbT): An entity already shared between signer and interlocutor about which the sentence adds something new'. Reinhart 1981; Gundel 1988b; Frascarelli & Hinterhölzl 2007, Sze 2008, Kimmelman 2014.

NON-MANUAL MARKERS

- 24% Raised eyebrows (re).
- 32% Squinted eyes (sq).
- 8% Raised eyebrows (re) & squinted eyes (sq).
- 13% Head tilt back with pronominal elements.
- 16% Head nod (hn). 21% Eye-blinks (eb).

Unmarked AbT: 31%

CONTINUED TOPIC AND SHIFTED TOPIC

(1) [...] BEAR CL: LAY_DOWN 72/ Ø TAKE BANANA 73/ Ø THROW_AWAY 74/ Ø CL:

STAND_UP 75/ Ø CL: WALK 76/ Ø CL:TRASH_CAN RAISE 77/ Ø CL: TOP_OPEN 78/
sq
THERE_IS BONE 79/ Ø CL: LOOK_AT 80/ LITTLE DOG FARAWAY SLEEP 81/ Ø SNORE 82/
sq
BEAR CL: LOOK_AT 83 [...]

'[...] The bear lays down, takes off the banana (from his face) and throws it away, then (he) stands up and walks. (He) raises the trash can and opens the top. There is a bone, (he) looks around, the little dog is sleeping far away, snoring. The bear looks at him[...]'

Squinted eyes → ← DPs → ← Shifted topics

- Nominals are significantly correlated to the use of sq (odds: 7.55, p<0.001)
- Nominals are significantly correlated to shifted topics (odds: 3.86 p<0.001)

Main referential expressions with respect to shifted or continued status

	DP	pro	null
continued	21,95%	40,87%	83,90%
shifted	78,05%	59,13%	16,10%
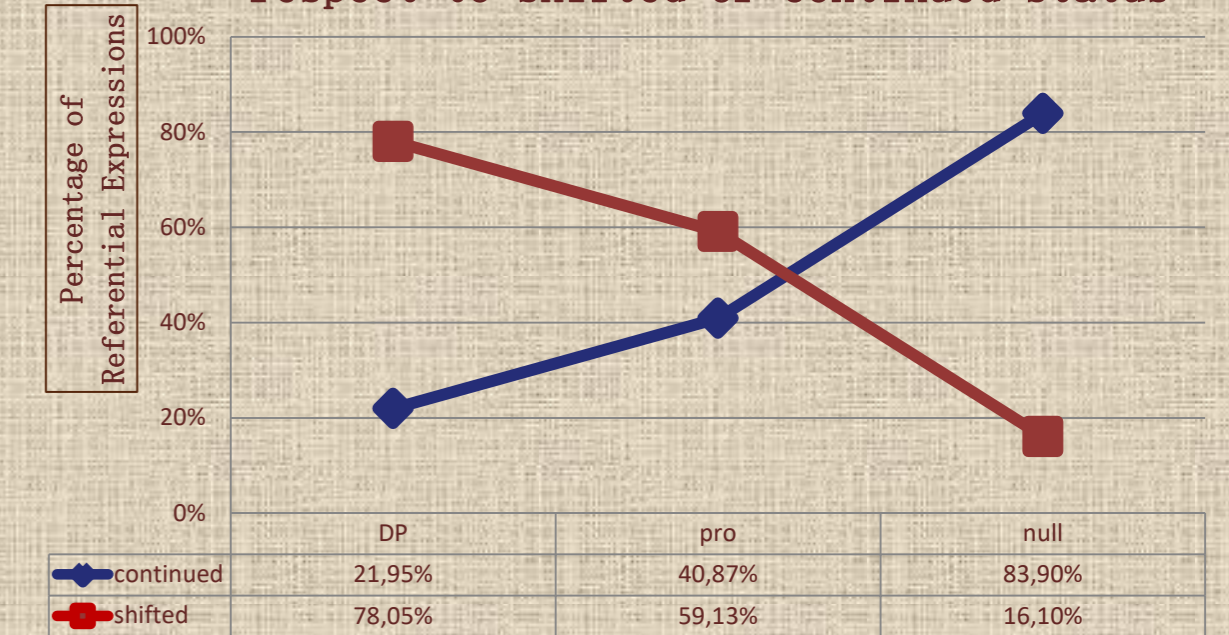
THE ACCESSIBILITY THEORY
Givón 1983, Ariel 1991, Perniss & Özyürek 2014, Frederiksen & Mayberry 2016, Czubek 2017, Ahn 2019
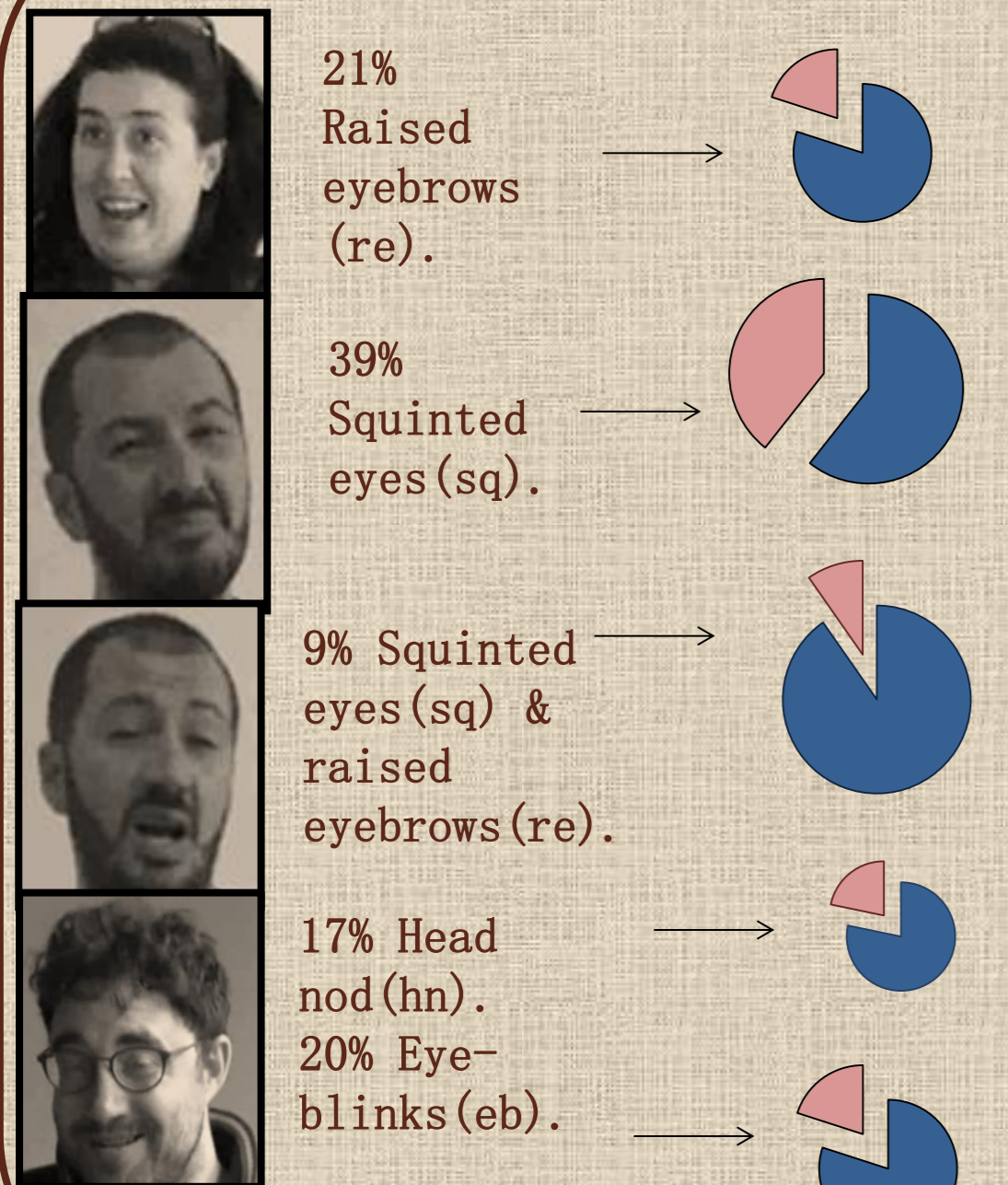
	Sentential Distance (0-639)	Number of Competitors (0-59)	Sentential Distance in cleaned-up data (0-15)	Number of Competitors in cleaned-up data (0-6)
Nominals	9.15	2.33	3.30	0.70
Pronouns	5.10	0.90	3.00	0.50
Nulls	2.15	0.20	1.60	0.15

- The more an element is salient, the less linguistic material needs for identifying it and viceversa.
- Other factors, such as the sentential distance between the antecedent and its anaphoric resumption, and the number of competitors which are introduced within this distance may affect the syntactic choice of the signers.

SCENE-SETTING TOPICS SsT): Frame setters which establish the background in which the main predication holds. Chafe, 1976; Krifka 2008

NON-MANUAL MARKERS

- 21% Raised eyebrows (re).
- 39% Squinted eyes (sq).
- 9% Squinted eyes (sq) & raised eyebrows (re).
- 17% Head nod (hn). 20% Eye-blinks (eb).

Unmarked SsT: 28%

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                re              re
             sq  eb+hn          sq
1) TODAY, PARK,      JOHNi DOG POSSi  CAT
GROWL
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'Today, in the park, John's dog growls at the cat'. [Ma_elA_06]

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             sq  hn
2) HOUSE INSIDE        SASS: ROUND HAT  CL:BE_AT
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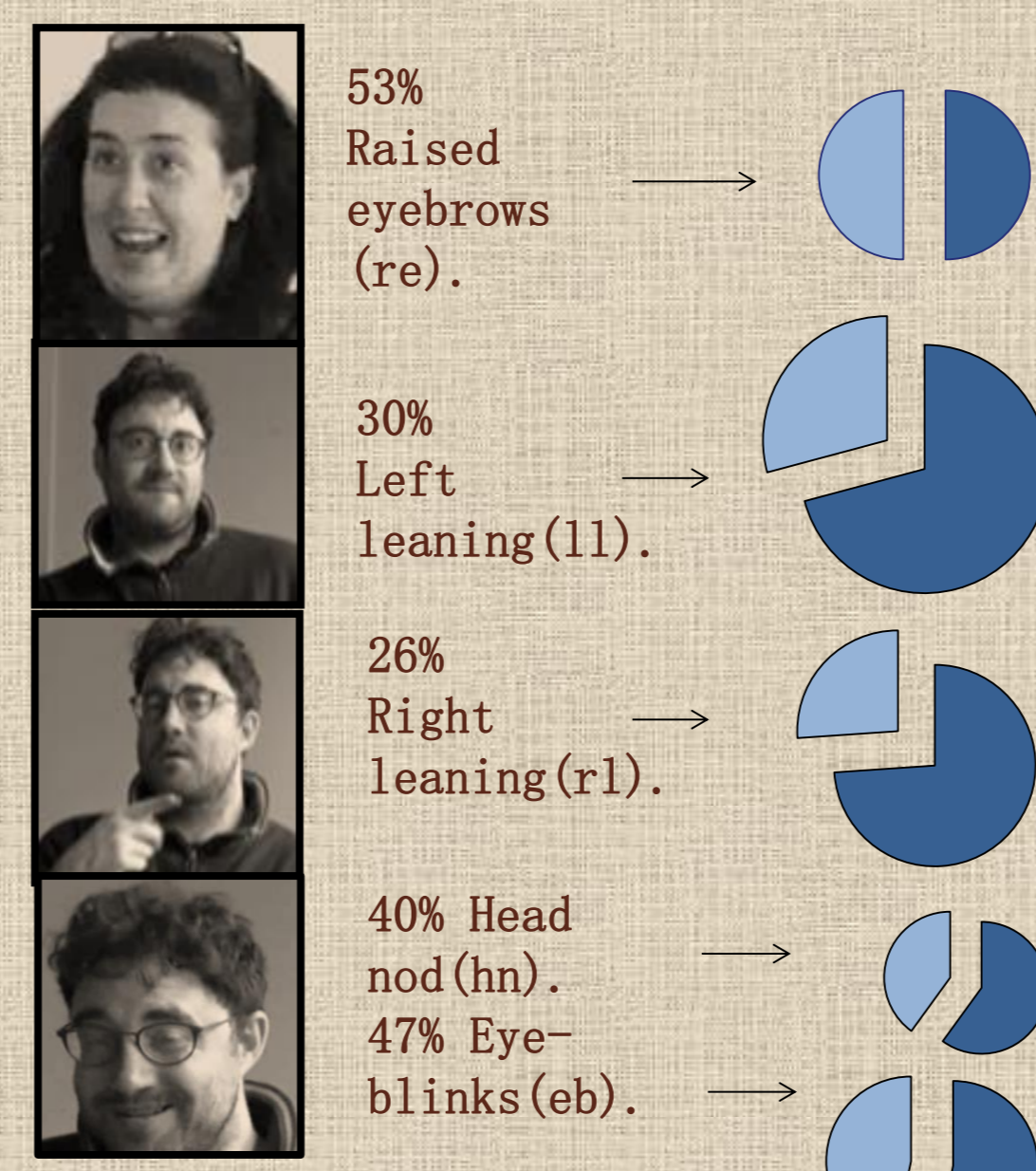'Inside the house, the hat was hanging.' [De_st1_05]

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            sq
3) HOUSE IX-3 PE ROOM SLEEP
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'Inside the house, in the room, the man was sleeping.' [De_st1_05]

SYNTACTIC DISTRIBUTION
SsTopTime*>SsTopLoc*>(...)

*This topic type can recursively appear within a sentence.

CONTRASTIVE TOPICS (CT): They split an issue in sub-issues, by creating a parallel opposition between two or more entities. Wilbur & Patschke 1998, Krifka 2008, Navarrete González (in prep.).

NON-MANUAL MARKERS

- 53% Raised eyebrows (re).
- 30% Left leaning (ll).
- 26% Right leaning (rl).
- 40% Head nod (hn). 47% Eye-blinks (eb).

Unmarked CT: 7%

```
             re  eb+hn          lr
1) DOGi IX-3i,          JOHNj LOVEi,
   ll
MARYk HATEi
```
'The dog, John loves him, Mary hates him'.

```
           eb+hn          eb+hn  hn
     re            sq          sq
2) YESTERDAY, RESTAURANT  FISH JOHN
   EAT DONE IN_CONTRAST PIZZA LEAVE
```
'Yesterday, at the restaurant, John ate the fish and lefts the pizza'.

The study on contrastive topic is preliminary and requires further research because of the paucity of data.

FINAL OBSERVATIONS and CONCLUSIONS
- Different prosodic contours accompany the three types of topics. AbT and SsT share similar markers, such as raised eyebrows and squinted eyes. Conversely, the CT displays specific markers, such as left and right body leaning.
- In line with spoken languages, LIS signers choose the syntactical codification of information depending on the status and the degree of accessibility which is assumed for the entities under discussion.

SYNTACTIC DISTRIBUTION
In line with other studies (Rizzi 1997, Benincà & Poletto 2004, Frascarelli & Hinterölzl 2007, Brunelli 2011), the syntactic hierarchy in LIS is:

SsTopTime*>SsTopLoc*>AbTop>TopContr>[...IP...]

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   Sst-time Sst-location        Abt
(4) YESTERDAY  GARDEN    MARYk CAT POSSk  MOUSEj BEATj
```
'Yesterday, in the garden, the Mary's cat beat a mouse'. [Ma_elA_09]

*The position is recursive, namely it may appear more than one time within a sentence

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