

18 Nov 2019

Binding Theory. Describes the conditions on the structural relations between nouns.

Concerned three types of nouns.

1.00 - R-expressions → Proper names, Common nouns.
↳ express content

1.50 - Pronouns → he, she, it, his, one, them, him, etc.

2.00 - Anaphors → himself, herself, themselves

→ these NPs are semantically distinct, but they also have different syntactic distributions.

1 R-expressions express content.

- NP that gets its meaning by referring to an entity in the world.

∴ The woman in the blue shirt, teddy bear.

2 Pronouns NP that may get its meaning from another word in the sentence.

It can also get its meaning from a noun previously mentioned in the discourse, or context.

"I, me, you, he, him, she, her, it, one, we, us, they, them, his, her, an, my, its, your, their"

∴ Art said that he played basket ball

Art David

3 **Anaphora**: NP that obligatorily gets its meaning from another NP in the sentence.

"myself, yourself, himself, herself, itself, oneself, ourselves, yourselves, themselves, each other"
∴ Heidi hopped herself on the head ...

Antecedent: NP that gives its meaning to a pronoun or anaphor.

∴ Heidi hopped herself on the head ...

antecedent anaphor

Indexing: Means of representing the meaning of an NP.

* each index/indices represents a different reference.

- [Colin]_i gave [Andrea]_j a [basketball]_k.
- [Art]_i said that [he]_j played [basketball]_k in [the dark]_l.
- [Art]_i said that [he]_j played [basketball]_k in [the dark]_l.

Co-indexing & Co-reference

- * if two NPs have the same index they Co-index.
- * if they Co-index, they Co-refer.

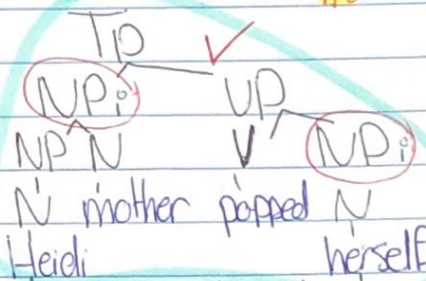
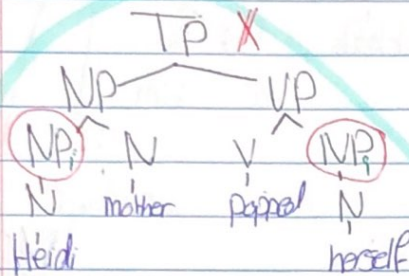
∴ [Art]_i said that [he]_i played basketball ...

20 Nov 2019

Syntactic Restrictions on Anaphors

^{NP}
[Heidi's mother]_k popped herself_k on the ...

*"herself" cannot index "Heidi" because it doesn't C-command it_o



Binding

This fact is captured by binding

Bind₀

- A binds B if only
 - A c-commands B
 - A & B Co-indexed

* Binding is not the same as Co-indexing

→ it requires a C-command relationship

25 Nov 2019

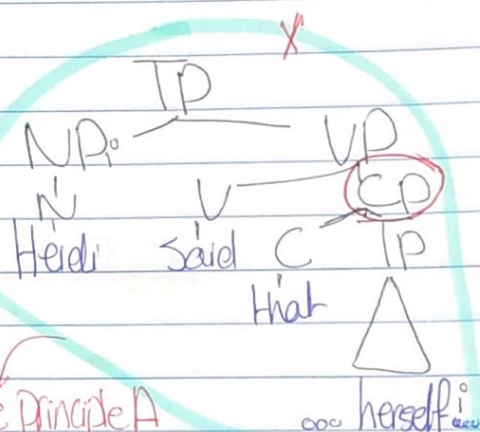
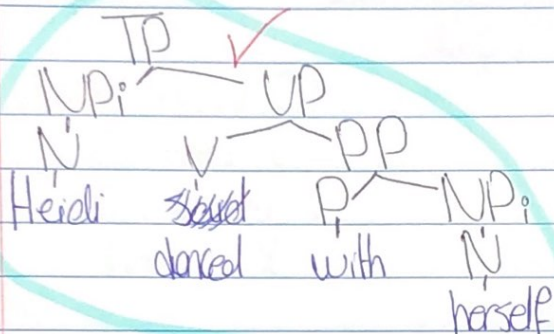
①

Principle A. anaphor must be bound.

Co-index ✓ C-command ✓

• Heidi danced with herself. ✓

Heidi said that Ant danced with herself. X
✓ her



"Co-index ✓, C-command ✓, Binding in domain X"

* Violate Principle A

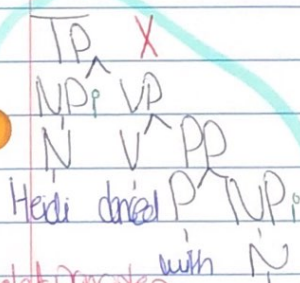
... herself_i

* Binding domain: The clause containing the anaphor.

②

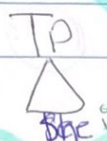
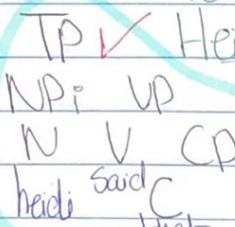
Binding Principle A. anaphor must be bound in its binding domain.

Principle B. Pronouns must be free in their Binding Domain.



* Violate Principle B
Not free in domain Xⁿ

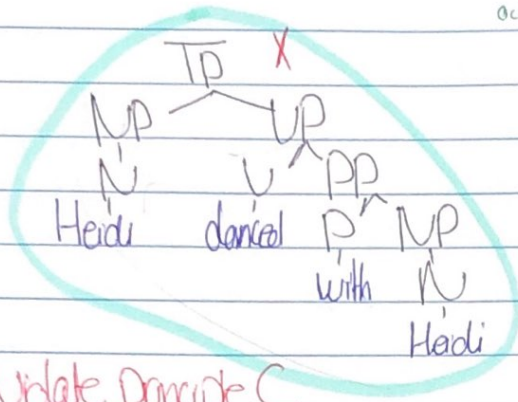
• Heidi danced with her X



24 Nov 2019

Principle C. R-expressions must be free.

Heidi danced with Heidi



* Update Principle C

CO index ✓

C-Command ✓

Free X

free & not bound.

* Summary

1 Binding Principle A anaphor must be bound in its binding domain.

2 Binding Principle B pronouns must be free in their binding domain.

3 Binding Principle C R-expressions must be free.