

## REDUCING ATTRIBUTIVE COMPARATIVE DELETION

### 0. The problem

Various kinds of deletion structures in comparatives – different phenomena?

*Comparative Deletion:*

- (1) Mary is taller than Peter is ~~tall~~. (*predicative*)  
 (2) Mary saw bigger cats than Peter saw ~~big cats~~. (*attributive*)

*Comparative Subdeletion:*

- (3) The dog is bigger than the doghouse is wide. (*predicative*)  
 (4) Mary bought bigger dogs than Peter did ~~see big~~ doghouses. (*attributive*)

Constraints:

- (5) \*Mary bought bigger dogs than Peter bought (wide) doghouses.

Proposal: all of these are reducible to the single process Comparative Deletion – differences due to more general settings

### 1. Constraints on deletion

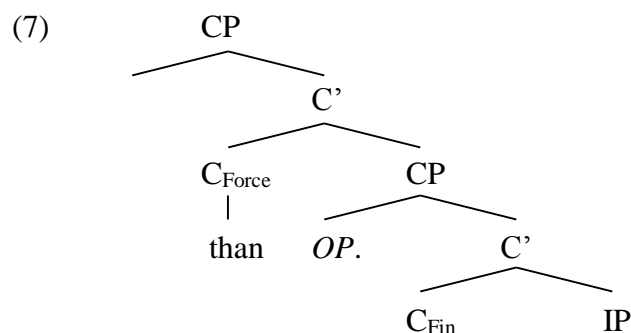
GIVENNESS: elements are either GIVEN or F-marked (Merchant 2001, Selkirk 2005)

- (6) Louise was reading a novel and Peter ~~was reading~~ / \*~~writing~~ an epic.

Recoverability: a constituent  $\alpha$  can be deleted iff  $\alpha$  is e-GIVEN (Merchant 2001: 38)  $\rightarrow$   $\alpha$  has to have a salient antecedent in the discourse (recoverability)

### 2. Comparative Deletion

Comparative Deletion (CD) deletes the QP DP the subclause if it is logically identical to its antecedent in the matrix clause (Bacskai-Atkari 2010)



Predicatives: AP contained within a QP headed by a zero operator  $x \rightarrow$  operator movement: the QP moves up to the lower [Spec; CP], where CD deletes it (Bacskai-Atkari 2010)

- the AP has to move together with the Q head:

(8a) \*Mary is taller than *Op.* Peter is tall.

(8b) \*How is Mary tall?



(8c) How tall is Mary?

- copy theory of movement: the lower copy of the QP is deleted regularly by PF (see Bošković and Nunes 2007: 44–48; Chomsky 2005; Bobaljik 2002); the QP is e-GIVEN

(9) Mary is taller [<sub>CP</sub> than [<sub>CP</sub> ~~{QP x-tall}~~ Peter is ~~{QP x-tall}~~]].

Attributives: QP adjunct within a DP (Kántor 2008; Kennedy and Merchant 2000) → operator movement: the entire DP containing the QP moves up to the lower [Spec; CP], where CD deletes it (Bacskai-Atkari 2010)

- the QP cannot be extracted from the DP (← DP-islands; see Kántor 2008: 148–149; Izvorski 1995: 217; Bošković 2005; Grebenyova 2004; Kayne 1983; Ross 1986):

(10a) \*Mary saw bigger cats than *Op*. Peter saw cats.

(10b) \*How big did Mary see cats?

↓

(10c) How big cats did Mary see?

- again, the lower copy of the DP is deleted regularly by PF; the DP is again e-GIVEN:

(11) Mary saw bigger cats [<sub>CP</sub> than [<sub>CP</sub> ~~{DP x-big cats}~~ Peter saw ~~{DP x-big cats}~~]].

- the deletion of the entire DP in attributive comparatives is a result of other constraints
- deletion is permitted under logical identity with the quantified element in the matrix clause

### 3. Comparative Subdeletion

Subcomparatives: the relative quantities of different properties or entities are compared (Kennedy 2000):

(12a) The dog is bigger than the doghouse is wide.

(12b) Mary bought bigger dogs than Peter did ~~see big~~ doghouses.

the QP and the DP remain → are the sentences in (12) exceptions?

but recall the definition of CD: deletion takes place in the lower [Spec; CP] position and is licensed under identity with the quantified element in the matrix clause

→ the QPs *big* and *wide* in (12a) and the DPs *dogs* and *doghouses* in (12b) are not logically identical

→ the QP *wide* and the DP *doghouses* are not in the lower [Spec; CP] position of the comparative subclause

CD takes place in the lower [Spec; CP] regularly – Bacskai-Atkari (2010)

lower copy: cannot be deleted because it is F-marked

Bošković and Nunes (2007: 48): lower copies may be phonologically realised if the pronunciation of the highest copy causes the derivation to crash at PF

Derivation:

(13) The dog is bigger [<sub>CP</sub> than [<sub>CP</sub> ~~{QP x-wide}~~<sub>F</sub> the doghouse is [QP x-wide]<sub>F</sub>]].

→ subcomparatives are not exceptional in terms of CD → it is enough to have CD in the grammar, no need for a separate subcomparative deletion process (the operator is phonologically null anyway)

#### 4. Attributive Comparative Deletion

Not the entire lower copy remains (↔predicative comparatives):

(14a) Mary bought bigger dogs than Peter did ~~buy big~~ doghouses.

(14b) \*Mary bought bigger dogs than Peter did ~~buy~~ big doghouses.

possible reason: the QP (*x-big*) is e-GIVEN, so it should be subject to deletion ↔ the NP *dogs* is F-marked

But rather a positional problem:

(15a) % The dog is bigger than the doghouse is big.

(15b) The dog is bigger than the doghouse is WIDE.

(15c) \*Mary bought bigger dogs than Peter did big DOGHOUSES.

(15d) \*Mary bought bigger dogs than Peter did WIDE DOGHOUSES.

- in (15a), *big* has to be unstressed – it violates the constraint that the lower copy should be deleted
- however, (15c) and (15d) are not unacceptable

→ (15d) is underivable in English: either illicit configuration or deletion of an F-marked constituent:

(16) \*Mary bought bigger dogs than Peter did ~~buy~~ [<sub>DP</sub> [<sub>QP</sub> ~~wide~~]<sub>F</sub> doghouses]].

→ is Attributive CD a special process? – QP only part of a lower copy, not the lower copy itself

Attributive CD involves deletion of the lexical verb:

(17a) Mary bought bigger dogs than Peter bought ~~x big dogs~~.

(17b) \*Mary bought bigger dogs than Peter bought ~~x big~~ doghouses.

(17c) Mary bought bigger dogs than Peter ~~bought x big~~ doghouses.

(17d) Mary bought bigger dogs than Peter did ~~buy x big~~ doghouses.

→ is Attributive CD carried out by some verb deletion process?

But deletion seems to target discontinuous constituents:

(18a) \*Mary saw a bigger cat than Peter did ~~see a x big~~ dog.

(18b) Mary saw a bigger cat than Peter did ~~see a x big~~ dog.

### 5. The syntax of attributive modification

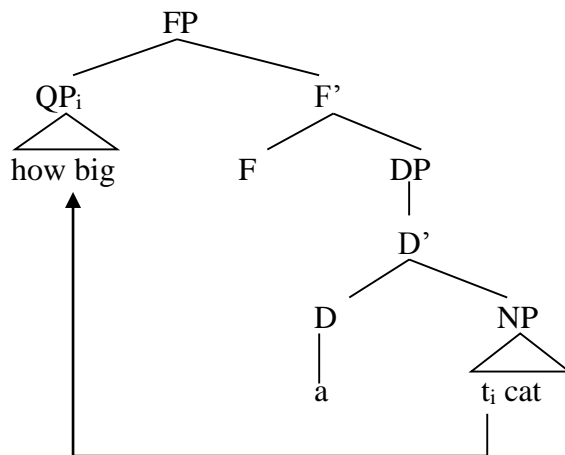
In the case of attributive modification involving an operator, the QP moves up to the specifier of a functional projection (FP), a functional extension of the DP (cf. Kennedy and Merchant 2000)

(19a) \*[A how big] cat did you see?



(19b) [How big a cat] did you see?

(20)



Similarly (cf. Kennedy and Merchant 2000: 124):

(21a) Mary saw [too big a cat].

(21b) Peter didn't see [as big a cat] as Mary did.

(21c) Mary saw [so big a cat] that she couldn't believe it.

The F head can sometimes be filled (Kennedy and Merchant 2000: 125–126):

(22) [How big of a cat] did Mary see?

Structural ambiguities (Kennedy and Merchant 2000: 127–130):

(23) Mary saw a big cat but Peter did see a dog.

'Mary saw a big cat but Peter saw a dog.' / 'Mary saw a big cat but Peter saw big a dog.'

### 6. Conclusions

The QP modifier of the DP in the subclause moves up in attributive comparatives

→ string in (18) explained:

(24) Mary saw a bigger cat than Peter did see ~~[FP [QP ~~big~~] a \_\_\_i dog]~~.

Kennedy and Merchant (2000): the QP moving to [Spec; FP] equips the F head with a [+wh] feature, which is PF-uninterpretable on the F head (↔ D heads like *which*): this can be checked off only if the entire FP moves to [Spec; CP]

higher copy: remains in (19) but elided by CD in comparatives like (24)

lower copy: can be deleted in (19) but not in (24) as the DP within it is F-marked; but the F head bears the PF-uninterpretable [+rel] feature on it and should be deleted (cf. Bošković and Nunes 2007)

→ how is it possible that the lexical verb has to be deleted alongside with the QP but the DP can remain?

The process of deletion:

Reich (2007: 472–472): when deletion applies at PF, it does not (and cannot) affect F-marked material

Verb Gapping:

(25a) Mary likes cats and Peter [<sub>VP</sub> likes [<sub>DP</sub> dogs]<sub>F</sub>].

(25b) Mary likes cats and Peter ~~{<sub>VP</sub> likes [<sub>DP</sub> dogs]<sub>F</sub>}~~.

(25c) \*Mary likes cats and Peter ~~{<sub>VP</sub> likes [<sub>DP</sub> dogs]<sub>F</sub>}~~ too.

→ Verb Gapping is an instance of VP-deletion; deletion targets the e-GIVEN VP, within which there is an F-marked DP – linear PF application stops

if no F-marked DP, there is nothing to prevent deletion of the DP:

(26a) Mary likes cats and Peter [<sub>VP</sub> likes [<sub>DP</sub> cats]].

(26b) \*Mary likes cats and Peter ~~{<sub>VP</sub> likes [<sub>DP</sub> cats]}}~~.

(26c) Mary likes cats and Peter ~~{<sub>VP</sub> likes [<sub>DP</sub> cats]}}~~ too.

→ target of gapping not the V head but the VP

VP-deletion takes place in the case of attributive comparatives: the F-marked constituent is the DP, not the FP

(27a) \*Mary saw a bigger cat than Peter [<sub>VP</sub> saw [<sub>FP</sub> x-big [<sub>DP</sub> a dog]<sub>F</sub>]].

(27b) \*Mary saw a bigger cat than Peter ~~{<sub>VP</sub> saw [<sub>FP</sub> x-big [<sub>DP</sub> a dog]<sub>F</sub>]}}~~.

(27c) Mary saw a bigger cat than Peter ~~{<sub>VP</sub> saw [<sub>FP</sub> x-big [<sub>DP</sub> a dog]<sub>F</sub>]}}~~.

(27d) \*Mary saw a bigger cat than Peter ~~{<sub>VP</sub> saw [<sub>FP</sub> x-big [<sub>DP</sub> a dog]<sub>F</sub>]}}~~.

VP-deletion: optional process that may save the construction from being ill-formed (cf. sluicing)

→ Attributive Comparative Deletion is reducible to Comparative Deletion and VP-deletion

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