

# On the syntax of quotation in French

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# Outline & motivation

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- ▶ The internal syntax of a quotation is unconstrained:
  - (1) a. Paul said “I goed there”.
  - b. Paul said “Mary believ... knew I was there.”
  - c. Paul said “Marie était là”.
  - d. The balloon went “pshhhhhhhh”
  - e. Paul went [speaker frowns].
  - f. The car went [spkr moves his hand in a zizag].
- ▶ Yet externally a quotation is a complement:
  - (2) a. Paul said “You’re stupid” to Mary.
  - b. I believe that [Paul said “You’re stupid” to Mary].
  - c. Paul said this to Mary: “You’re stupid”.
  - d. What [Paul said \_\_ to Mary] was “You’re stupid”.

# Outline & motivation

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- ▶ Postal (2004): direct quotation provides a strong argument in favor of model-theoretic (à la Pullum & Scholz 2001) approaches to syntax.
  - ▶ In a Generative-Enumerative approach, each grammatical sentence must be generated from a finite lexicon/alphabet.
    - ▶ But there is no (simple) way to enumerate possible quotations.
  - ▶ In a Model-Theoretic approach, one need only put necessary conditions on what a grammatical sentence consists of.
    - ▶ An open, unconstrained slot can be left for quotation, where “totally free expression” (Jackendoff, 1984) occurs.
- ▶ The argument against a generative approach is disputable, but the proposed model-theoretic analysis is simple and elegant.

# Outline & motivation

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- ▶ The French construction in (3) poses strong problems for the “open slot” theory:

(3) a. « **Le président est arrivé** », dit Marie.

the president is arrived said Marie

*Marie said “The president has arrived”.*

b. **Le président**, dit Marie, **est arrivé**.

c. \* **Le pré**, dit Marie, **sident est arrivé**.

- ▶ The quotative clause can be linearized inside the quotation.

- ▶ Yet it can not be linearized *anywhere* within the quotation.

- ▶ Outline:

- ▶ Quotation in general

- ▶ French Incidental Quotative Clauses

- ▶ Extraction sites, incidental adjuncts

- ▶ Linearization-based analysis

# Quotation in general

# A typology of quotation

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- ▶ Combination of Cappelen & Lepore (2007) and Récanati (2001):
  - ▶ Direct quotation
  - (4) a. Paul said “**The President has arrived**”
  - ▶ Indirect quotation
  - (4) b. Paul said that the President had arrived.
  - ▶ Open quotation
  - (4) c. “**The President has arrived**”. That’s what Mary said.
  - ▶ Hybrid quotation
  - (4) d. Mary really hates “**that jerk Paul**”.
  - e. Mary said that the President “**is really a jerk**”.
  - ▶ “Pure” quotation
  - (4) f. “**Run**” is a verb
- ▶ We model only direct quotation

# Faithfulness in direct quotation

- ▶ When quoting nonlinguistic behavior, it is obvious that the quote only reflects some aspects of the relevant event. Recall (1f):
  - (1) f. The car went [speaker moves his hand in a zizag]
- ▶ Clark & Gerrig (1990): even when quoting linguistic behavior, the quote may highlight different aspects of the speech event, depending on both the intentions and the abilities of the speaker.
  - (5) a. He said in French: “The president has arrived”.
  - b. He said “The PreSIdent has Arrived”, with a strange intonation.
- ▶ Motivates their view of **quotation as demonstration**: the quote is not a description, but a demonstration mimicking the actual behavior
- ▶ Yet the argument of the quotative verb is the sign (or behavior) demonstrated, **not** the demonstration (Cappelen & Lepore 2007).

# Homolinguistic quotation: a partial analysis

(4) a. Paul said “The President has arrived”.

- ▶ Target semantics (compare Potts 2007):

$$\exists u[\text{resembles}(u, \text{“The President has arrived”}) \wedge \text{say}(p, u)]$$

- ▶ Notice scope interaction between the quotation and other operators:

(6) a. Everybody said “The President has arrived”.

$$\forall x[\text{human}(x) \rightarrow \exists u[\text{resembles}(u, \text{“The President has arrived”}) \wedge \text{say}(x, u)]]$$
$$\exists u[\text{resembles}(u, \text{“The President has arrived”}) \wedge \forall x[\text{human}(x) \rightarrow (\text{say}(x, u))]]$$

- ▶ What counts as resemblance is determined contextually.

(7) A: Mary said “Paul is stupid”.

B1: Yes, but she did not use that word.

B2: No, she did not say that exactly.

# Homolinguistic quotation: a partial analysis

(4) a. Paul said “The President has arrived”.

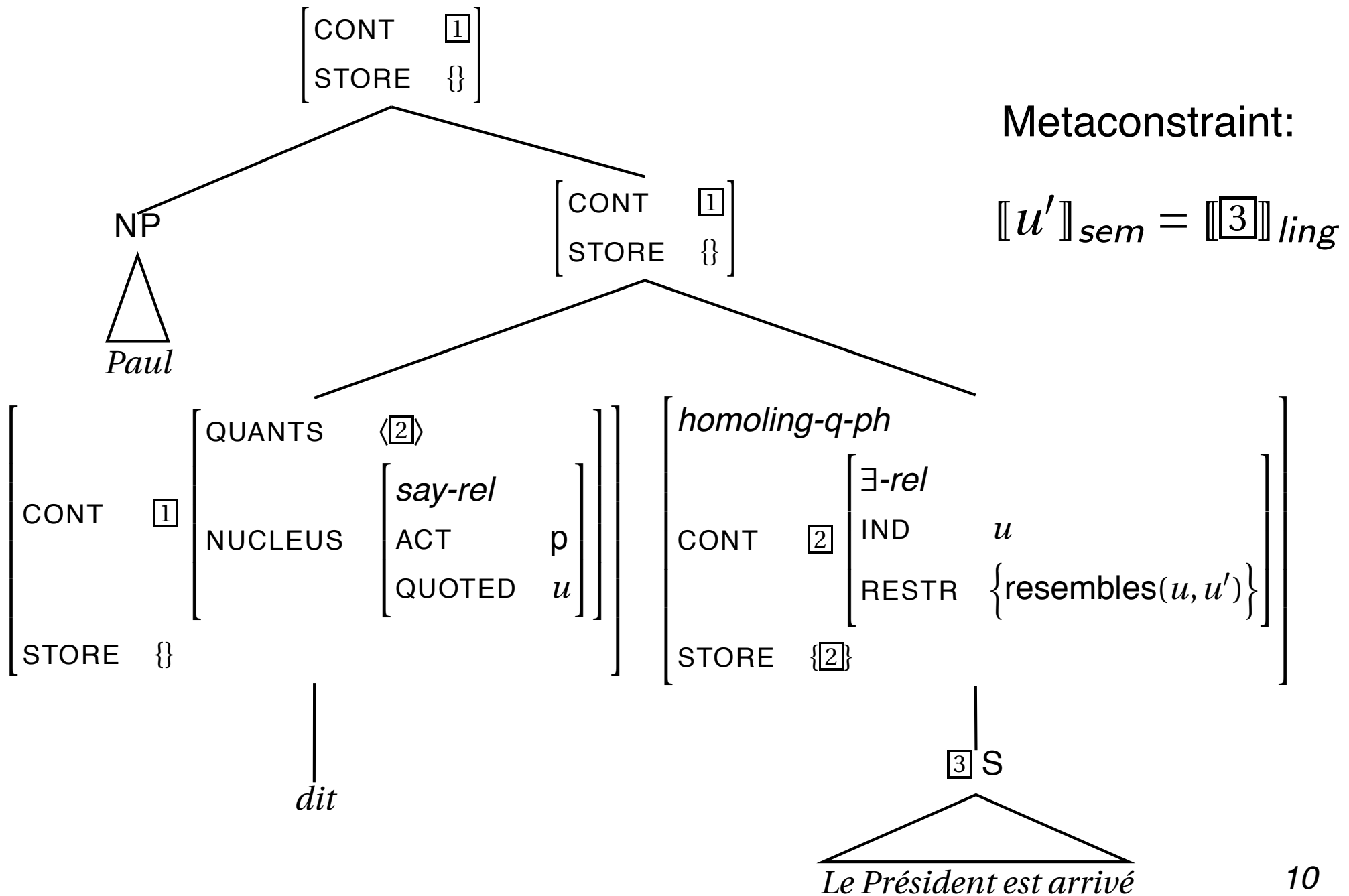
$\exists u[\text{resembles}(u, \text{“The President has arrived”}) \wedge \text{say}(p, u)]$

- ▶ Problem: the resemblance relation cannot be stated directly, because it mixes semantic (“logical form”) interpretation and the interpretation of linguistic descriptions.
- ▶ We need a metaconstraint linking two interpretation functions.

$$\text{homoling-}q\text{-ph} \rightarrow \left[ \begin{array}{l} \text{PHON} \quad \textit{fr-phon} \\ \text{CONT} \quad \boxed{1} \\ \text{STORE} \quad \left\{ \boxed{1} \left[ \begin{array}{l} \exists\text{-rel} \\ \text{IND} \quad u \\ \text{RESTR} \quad \{\text{resembles}(u, u')\} \end{array} \right] \right\} \end{array} \right]$$

- ▶ Metaconstraint:  $\llbracket u' \rrbracket_{sem} = \llbracket \boxed{2} \rrbracket_{ling} \quad \boxed{2} \text{sign}$

# Homolinguiistic quotation: an example



# Other quotations

- ▶ Minimal analysis of non-homolingistic quotation:

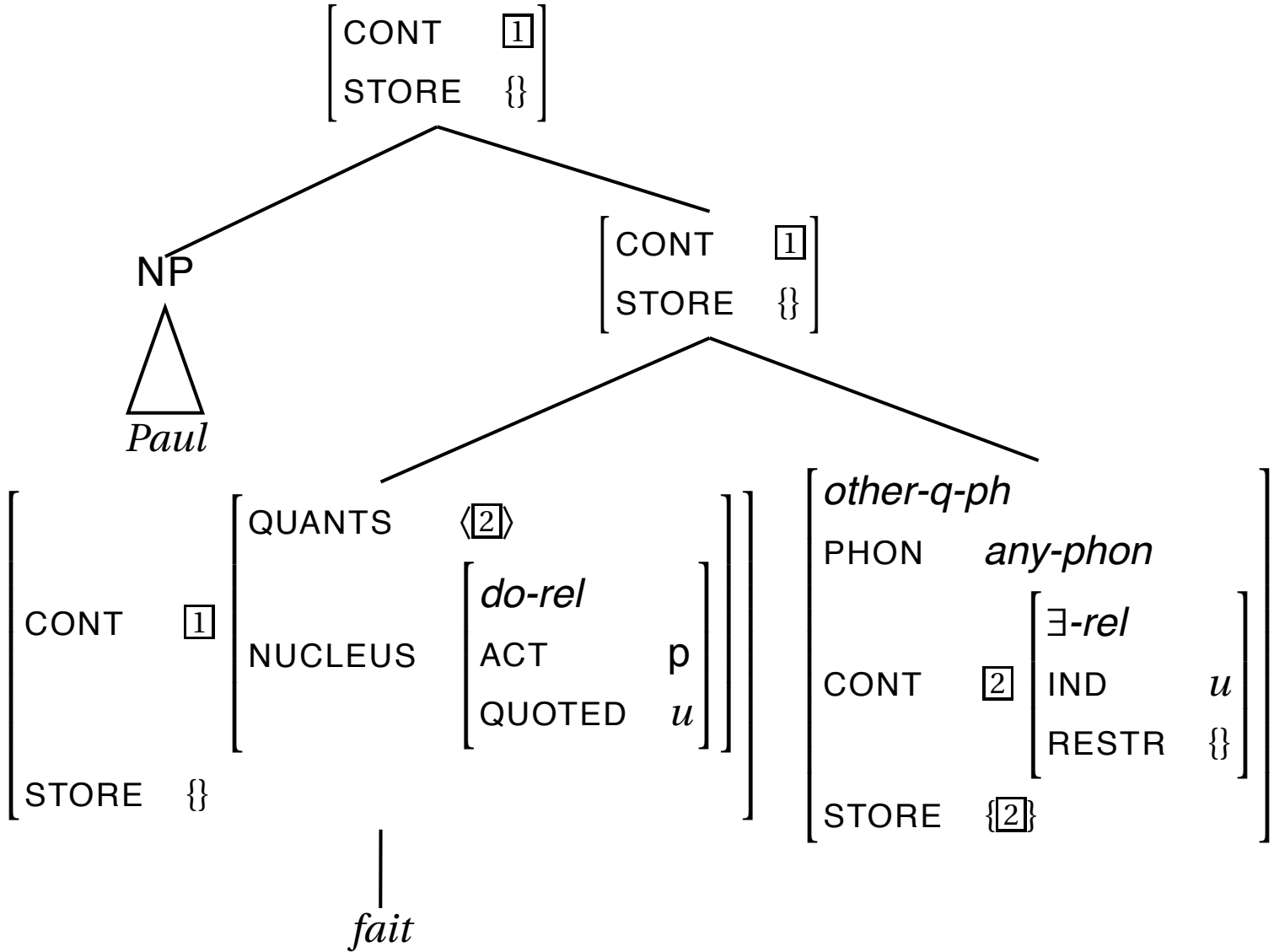
*quotation-ph* → *homoling-q-ph* ∨ *other-q-ph*

*phon* → *fr-phon* ∨ *any-phon*

$$\textit{other-q-ph} \rightarrow \left[ \begin{array}{l} \text{PHON} \quad \textit{any-phon} \\ \text{CONT} \quad \boxed{1} \\ \text{STORE} \quad \left\{ \boxed{1} \left[ \begin{array}{l} \exists\text{-rel} \\ \text{IND} \quad u \\ \text{RESTR} \quad \{\} \end{array} \right] \right\} \\ \text{DTRS} \quad \langle \rangle \end{array} \right]$$

- ▶ No distinction between heterolingistic and a-linguistic cases
- ▶ No explicit modelling of the mimicry: we just provide for a constituent which does not respect any phonotactic constraint
- ▶ Going further requires a major redesign of the feature geometry.

# Other quotations



# **French Incidental Quotative Clauses (IQC)**

# The basic data

- ▶ Incidental quotative clauses (IQC) are an alternate way of quoting directly, where the quotation is not syntactically subordinate:

- (8) a. Paul<sub>i</sub> a dit « Mon<sub>i</sub> frère est arrivé ».  
*Paul<sub>i</sub> said “My<sub>i</sub> brother has arrived.”*  
b. « Mon<sub>i</sub> frère est arrivé », a dit Paul<sub>i</sub>.

- ▶ In French grammar IQCs are grouped with other types of clauses under the heading “incises”; they differ in that only IQCs correspond to direct quotation.

- (9) a. Paul<sub>i</sub> a dit que mon<sub>j</sub> frère est arrivé. (*i* ≠ *j*)  
*Paul<sub>i</sub> said that my<sub>j</sub> brother has arrived*  
b. Mon<sub>j</sub> frère, Paul<sub>i</sub> l’a dit, est arrivé. (*i* ≠ *j*)

- (10) Mon frère, semble-t-il, est arrivé.  
*My brother has arrived, it seems.*

# IQCs are adjuncts

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- ▶ It is clear that the IQC is the semantic operator and the quotation the argument.
- ▶ The placement of the IQC is natural if it is an adjunct, surprising if it is a head or a filler.

(11) a. « **Mon frère est arrivé** », a dit Paul.

b. Mon frère est arrivé, récemment.

*My brother arrived recently.*

(12) a. Mon frère est, récemment/a dit Paul, arrivé.

b. Mon frère, récemment/a dit Paul, est arrivé.

c. Récemment/\*A dit Paul, mon frère est arrivé.

- ▶ It is quite common for adjuncts (but not for heads) to be associated with incidental prosody ('comma intonation').
- ▶ If it is an adjunct it should be optional.
  - ▶ It is indeed: see open quotation (4c).

# Extraction, 1

- ▶ Quotative verbs impose selectional restrictions on the quotation

(13) a. Paul dit « **Je suis content|Tu es content ?|table|\*pfff** ».

*Paul said “I’m happy|Are you happy?|table|pfff”.*

b. Paul afferma « **Je suis content|\*Tu es content ?|\*table|\*pfff** ».

*Paul stated “I’m happy|Are you happy?|table|pfff”.*

c. Paul demanda « **\*Je suis content|Tu es content?|\*table|\*pfff** ».

*Paul asked “I’m happy|Are you happy?|table|pfff”.*

d. Paul fit « **Je suis content|Tu es content ?|table|pfff** ».

*Paul went “I’m happy|Are you happy?|table|pfff”.*

- ▶ The same restrictions hold “at a distance” in IQC constructions

(14) a. \*« **pfff** », dit Paul.

*“pfff”, Paul said.*

b. \*« **Tu es content ?** », afferma Paul.

*“Are you happy?”, Paul stated.*

# Extraction, 2

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- ▶ An IQC must contain a quotative verb, but there may be long distance between that verb and the quotation (although intervening finite clauses are dispreferred).

(15) a. « **Je n'en peux plus** », semblait croire pouvoir dire Paul à ses étudiants.

*“I can't take it anymore”, Paul seemed to think he could say to his students.*

b. %« **Je n'en peux plus** », croyais-je que Marie avait dit.  
*I thought that Marie said “I can't take it anymore.”*

# Inversion

- ▶ Five types of subject inversion in French (Kayne, 1972, Bonami *et al.* 1999)

(16) a. Simple subject clitic inversion

Quel livre lit-il ? *Which book is he reading?*

b. Complex subject clitic inversion

Quel livre Paul<sub>i</sub> lit-il<sub>i</sub> ? *Which book is Paul reading?*

c. Stylistic inversion

Quel livre lit Paul ? *Which book is Paul reading?*

d. Unaccusative inversion

Entrèrent trois hommes. *Three men entered.*

e. Heavy subject inversion

Pourront demander une dérogation les étudiants dont le nom figure dans la liste qui suit.

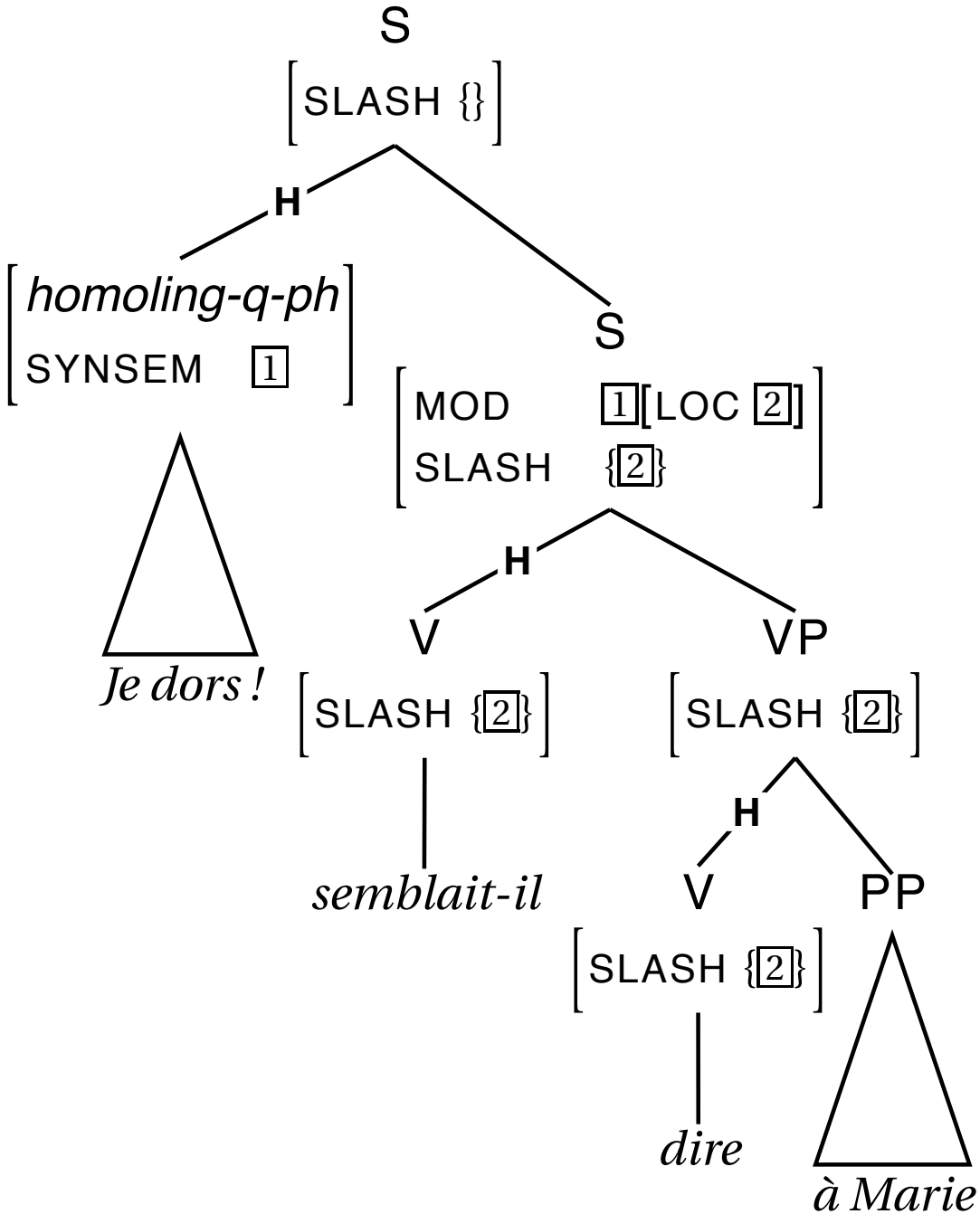
*The students whose name occurs in the following list may ask for a dispensation.*

# Extraction, 3

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- ▶ Two types of inversion are possible in IQC (mandatory in Standard French):
  - (17) a. « **Mon frère est arrivé** », a-t-il dit à Marie.  
*“My brother has arrived”, he said to Marie.*
  - b. %« **Mon frère est arrivé** », il a dit à Marie.
  - c. « **Mon frère est arrivé** », a dit Paul à Marie.  
*“My brother has arrived”, Paul said to Marie.*
  - d. %« **Mon frère est arrivé** », Paul a dit à Marie.
  - e. \*« **Mon frère est arrivé** », Paul a-t-il dit à Marie.
- ▶ Bonami et al. (1999) argue that stylistic inversion as in (13c) is possible only in extraction contexts.
- ▶ This confirms that IQCs are extraction constructions.

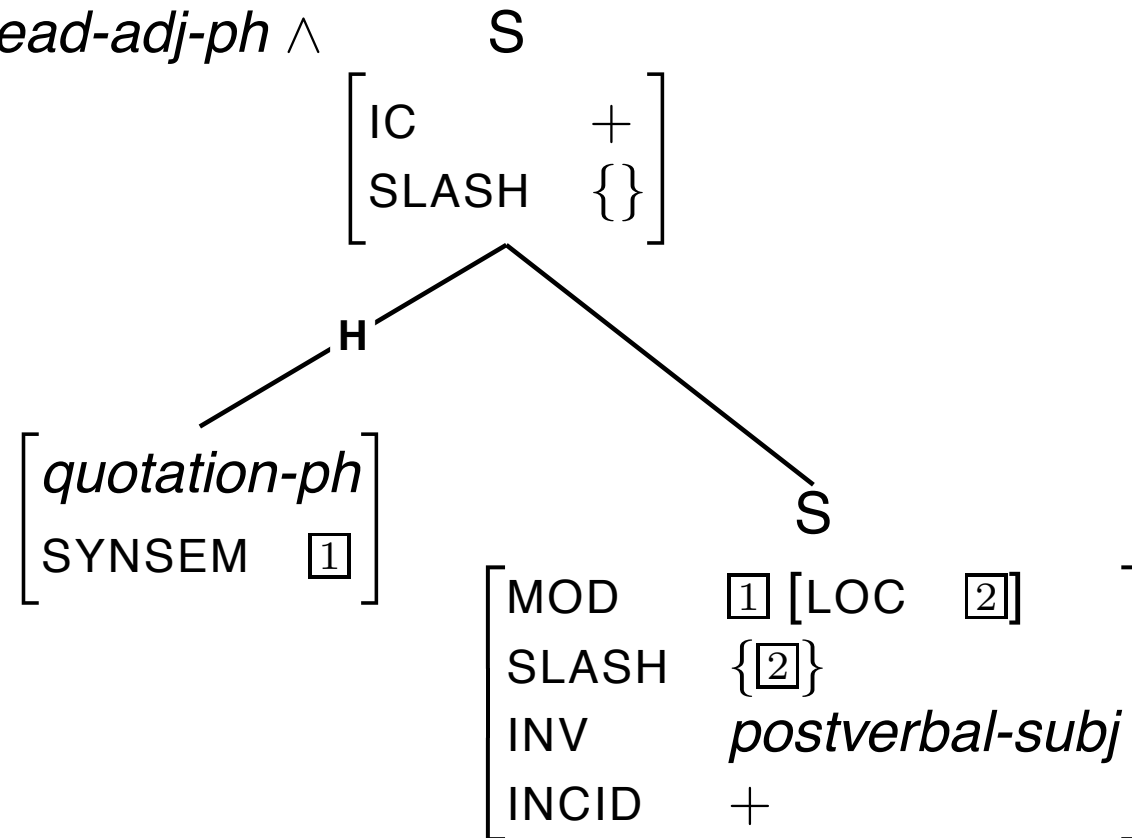
# Sketch of the analysis



Notice the similarity with a *that*-less relative clause.

# IQC introduction: a subtype of *hd-adj-ph*

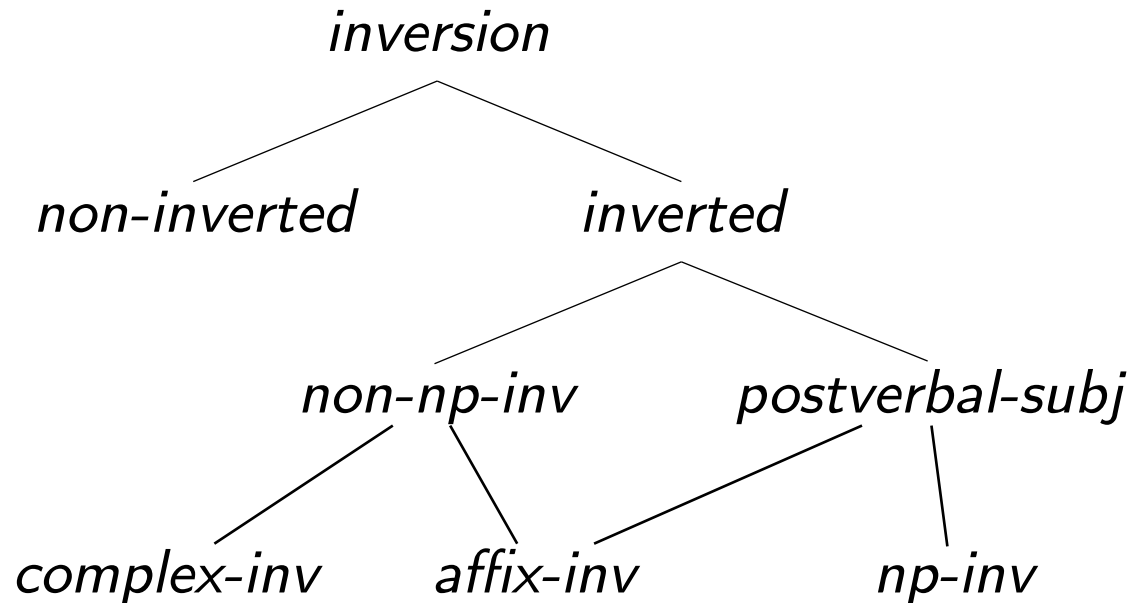
*head-IQC-ph* → *head-adj-ph* ∧



- ▶ IC + is necessary because IQCs are never embedded
- ▶ INCID + takes care of the prosody—more on this later

# A parenthesis: modelling inversion

- ▶ Hierarchy of INV values:



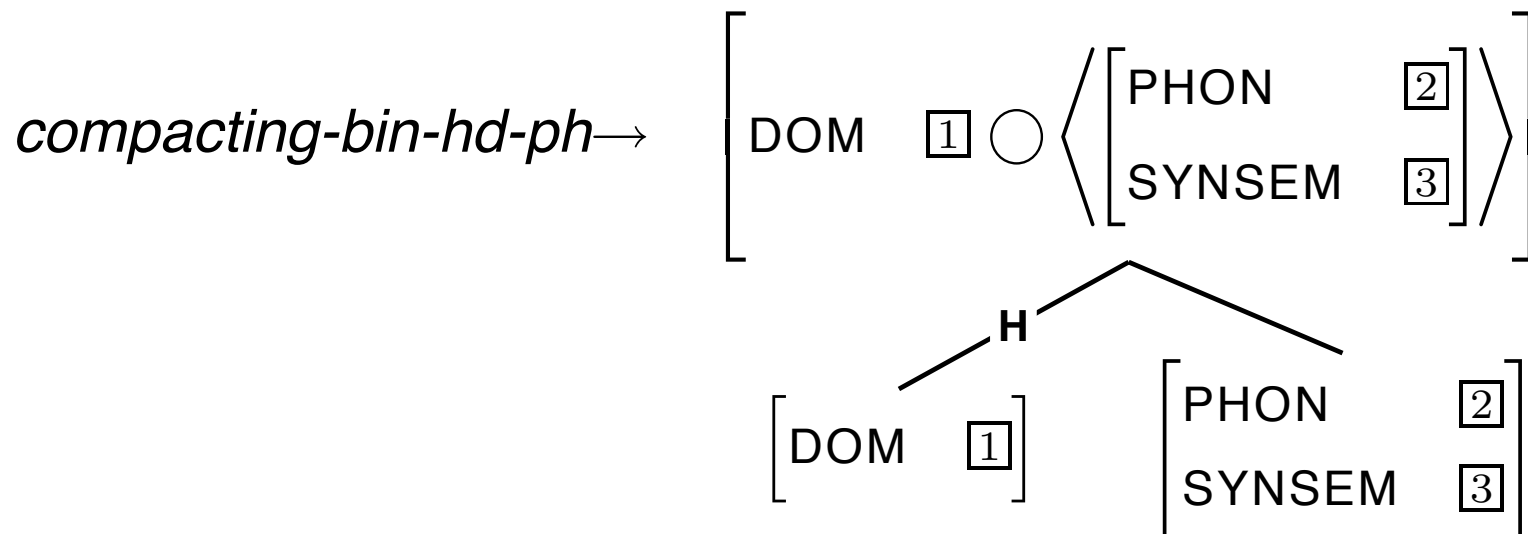
- ▶ [INV *np-inv*] triggers noncompaction of complement VPs (Bonami, Godard & Marandin 1999)
- ▶ [INV *non-np-inv*] triggers realization of a enclitic (Miller & Sag 1997; Bonami & Boyé 2007)
- ▶ In Standard French, [INV *affix-inv*] verbs do not require a phrase-structural subject, but [INV *complex-inv*] verbs do (Tseng 2008).

# Background on incidental adjuncts

- ▶ IQCs are a special case of *incidental adjuncts*, which are studied in detail in Bonami & Godard (2007).
  - ▶ Incidentalness is a prosodic property of various constituents which are ‘set apart’ from the rest of the utterance by pauses, vowel lengthening,  $F_0$  peaks, and/or register variation.
  - ▶ Incidentalness is not correlated in general with any syntactic, semantic or pragmatic property. Rather, various constructions use incidentalness to different ends.
  - ▶ In the case of incidental **adjuncts**, incidentalness indicates a scopal property: whereas scope correlates with order for integrated adjuncts, it does not for incidentals.
- (18) a. Paul a probablement répondu rapidement.  
*Paul probably answered quickly.*
- b. \*Paul a rapidement probablement répondu.
- c. Paul a rapidement répondu, probablement.

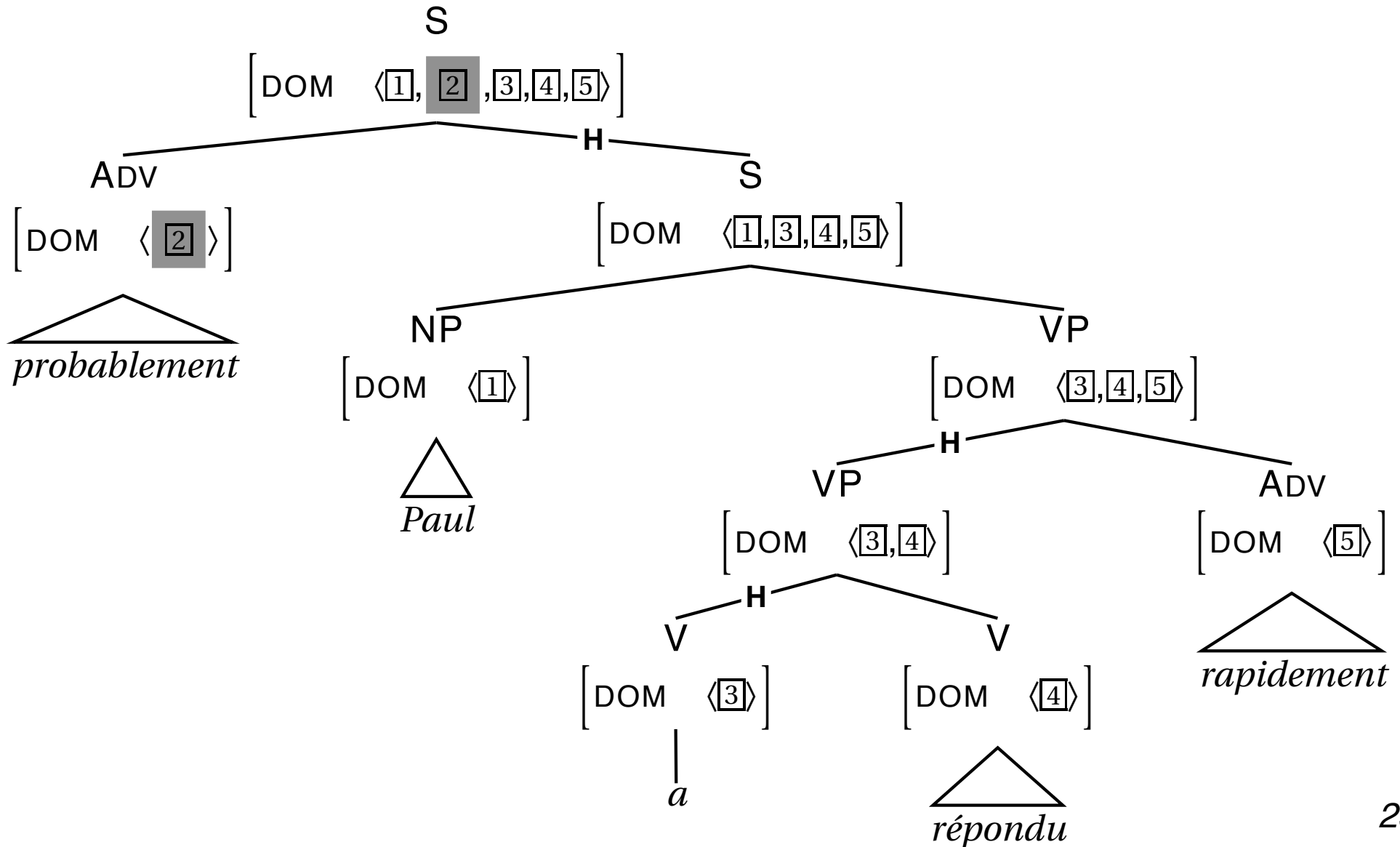
# An linearization-based analysis of incidental adjuncts

- ▶ We assume a (Kathol-style) linearization framework:
  - ▶ DOM is populated with *domain objects* combining *synsem* and *phon*.
  - ▶ All phrases are unary or binary
  - ▶ Heads are never compacted
  - ▶ Nonheads are normally compacted
    - ▶ exception: VP complements in subject inversion



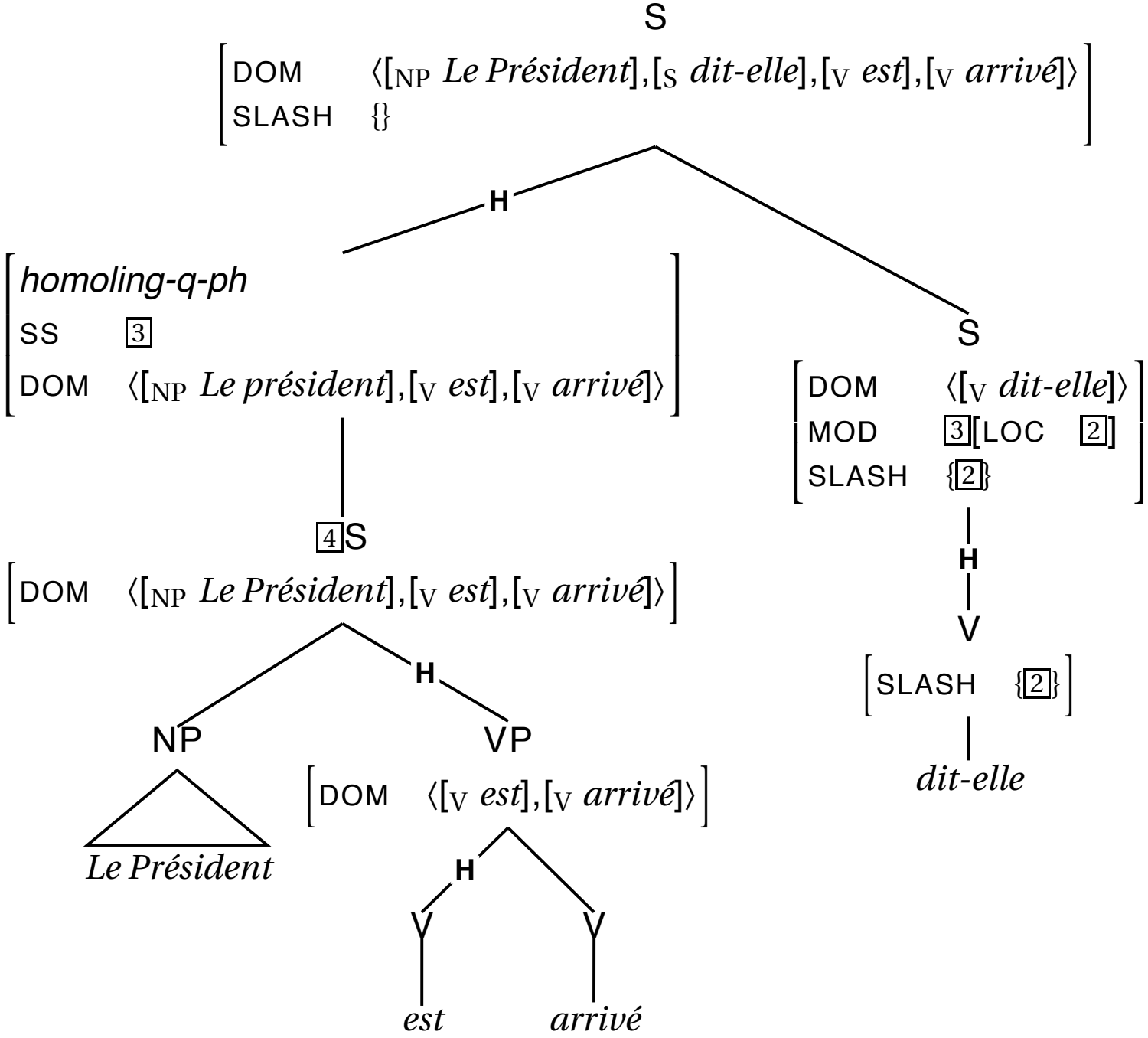
# An linearization-based analysis of incidental adjuncts

- Incidental modifiers are adjuncts to clauses, whereas postverbal integrated modifiers are complements (Bouma *et al.* 2001).





# An example



# What we have done

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- ▶ The basic point (contra Pullum & Scholz 2001, Postal 2004):
  - ▶ **some quotations have syntactic structure.**
- ▶ Full analysis of incidental quotative clauses
  - ▶ Extraction construction: accounts for long-distance, subject inversion
  - ▶ Placement properties follow from
    - ▶ Incidental adjunct status
    - ▶ Syntactic analysis of the quotation
- ▶ Many foundational questions are still open
  - ▶ Modelling of non-homolingustic quotation
  - ▶ IQCs inside clauses with repairs, errors, disfluencies.

# A final puzzle

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- ▶ We usually do not model disfluencies, self-repairs, etc. within HPSG grammars
  - ▶ Assumption: these can be modelled separately from traditional grammatical constraints.
- ▶ Yet one can quote such utterances, and even linearize an IQC in the middle of such an utterance:

(18) a. **Paul**, a dit Marie, **est sa... satis... content de cette solution.**  
*“Paul is sa... sat... happy with this solution”, Marie said.*

b. **Paul**, a dit Marie, **a fait un infractus.**  
*“Paul had an infraction”, Marie said.*
- ▶ We are dealing with a case of homolinguistic quotation.
  - ▶ Thus disfluencies and self repairs are to be modelled explicitly if we are to account for the full grammar of quotation.

# References

- Bonami, Olivier and Gilles Boyé. 2007. French pronominal clitics and the design of Paradigm Function Morphology. *Proceedings of the 5th Mediterranean Morphology Meeting*, pp. 291-322.
- Bonami, Olivier and Danièle Godard. 2007. Integrating linguistic dimensions: The scope of adverbs, *Proceedings of the 14th HPSG Conference*. Stanford: CSLI Publications, pp. 25–45.
- Bonami, Olivier, Danièle Godard, and Jean-Marie Marandin. 1999. Constituency and word order in French subject inversion. In G. Bouma, E. Hinrichs, G.-J. Kruijff, and R. T. Oehrle, eds. *Constraints and resources in natural language semantics*. Stanford: CSLI Publications, pp. 21–40.
- Bouma, Gosse, Rob Malouf, and Ivan A. Sag. 2001. Satisfying constraints on extraction and adjunction. *Natural Language and Linguistic Theory* 19: 1–65.
- Cappelen, Herman, and Ernest Lepore. 2007. *Language turned on itself*. Oxford: Oxford University Press.
- Clark, Herbert H., and Richard J. Gerrig. 1990. Quotations as demonstrations. *Language* 66: 764–805.
- Davidson, Donald. 1979. Quotation, *Theory and Decision* 11: 27–40.
- Geurts, Bart, and Emar Maier. 2005. Quotation in context. *Belgian Journal of Linguistics* 17: 109-128.
- Jackendoff, Ray. 1984. On the phrase the Phrase ‘the phrase’, *NLLT* 2: 25–37.
- Kathol, Andreas. 2000. *Linear syntax*. Oxford: Oxford University Press.
- Kayne, Richard S. 1972. Subject inversion in French interrogatives. In J Casagrande and B Saciuk, eds., *Generative studies in Romance languages*. New York: Newbury House, pp. 70–126.
- Postal, Paul M. 2004. *Skeptical linguistic essays*. Oxford: Oxford University Press.
- Potts, Christopher. 2007. The dimensions of quotation, In C. Barker and P. Jacobson, eds., *Direct Compositionality*. Oxford: Oxford University Press, Oxford, pp. 405–431.
- Pullum, Geoffrey K., and Barbara C. Scholz. 2001. On the distinction between model-theoretic and generative-enumerative syntactic frameworks, *Proceedings of LACL 2001*. Berlin: Springer Verlag.
- Recanati, François. 2001. Open quotation. *Mind* 110: 637–687.
- Tseng, Jesse. 2008. L’inversion pronominale: histoire et analyse. *Actes du premier congrès mondial de linguistique française*, pp. 2610-2632.