

# The Effect of Position on Understanding: Preposed vs Inserted ‘*selon X*’ (‘according to X’)

Anne-Marie Argenti<sup>1</sup> and Michel Charolles<sup>2</sup>

<sup>1</sup> LATTICE UMR 8094 CNRS, <sup>2</sup> Université de Paris III

Contact: [anne-marie.argenti@ens.fr](mailto:anne-marie.argenti@ens.fr)

Centering theory (Grosz et al., 1983) establishes a structural relationship between the form of referential expressions and attentional focus. It predicts specifically that highly focused entities tend to be realized with less marked forms (e.g. pronouns) and that factors such as grammatical status or surface position affect prominence. The experiments reported here aimed to test a claim put forward in linguistic studies on French evidential adverbials (Schrepfer-André, 2005) concerning the functioning of the preposed position as a potential frame influencing the following pronominal resolutions: a preposed Prepositional Phrase (PP), but not an inserted PP, is considered to frame an informational bloc in which antecedents are easily accessed compared to antecedents located outside the bloc.

In the first experiment, the texts used began with a sentence (P1) including an evidential PP in *selon X* (*according to X*) where X was a Noun Phrase (NP) referring to a speaker’s proper name (here Rsp). The subject NP of the sentence was also introduced by a proper name (here Rsj). The PPs were either preposed as in (1)/(3) or inserted after the verb as in (2)/(4). The subsequent target utterance (P2) started with a subject pronoun whose gender selected either Rsj or Rsp, thus allowing the prominence of the two referents to be compared. The predictions were that preposed PPs would entail quick “Inside Frame” reading for targets starting with Rsj’s gender pronoun, and slow “Outside Frame” reading for targets starting with Rsp’s gender pronoun. Inserted PPs were hypothesised to be control conditions because Rsj was in that case much more available than Rsp. The results showed that the reading time of targets was shorter when the pronoun referred to Rsj than to Rsp (main effect) and that with preposed PPs, Rsp is as prominent as Rsj, which is not the case with inserted PPs (interaction of the two factors).

- 1) *Selon Francine, Vincent a trouvé un stage dans une agence de publicité. Il/Elle apprécie que les cursus étudiants incluent une expérience professionnelle...*
- 2) *Vincent a trouvé, selon Francine, un stage dans une agence de publicité. Il/Elle apprécie que les cursus étudiants incluent une expérience professionnelle...*
- 3) *According to Francine, Vincent found an advertising agency internship. He/She appreciates the fact that the curriculum includes work experience...*
- 4) *Vincent found, according to Francine, an advertising agency internship. He/She appreciates the fact that the curriculum includes work experience...*

The second experiment tested the possibility that these results were due to the first mention effect reported by Gernsbacher et al. (1989). A third factor, protagonist prominence, was manipulated: the texts used in the first experiment were preceded by two additional sentences (P-2) and (P-1) as in (5)/(6) where (P-2) focused on one of the previous protagonists and (P-1) was a contextually coherent filler. The results show the same main effect and a similar interaction as before.

- 5) *Vincent/Francine prépare un master de gestion à Paris-Dauphine. Les programmes comprennent des enseignements théoriques et des mises en situation...*

- 6) *Vincent/Francine is taking a Master in Management at Paris-Dauphine. The syllabus includes theoretical knowledge and applied skills...*

The third experiment tested the possibility that these results were due to opinion verbs such as “appreciate, find, think, hope...”, which were systematically used in target sentences. The opinion verbs were replaced by verbs denoting a congruent action accomplished by Rsp or Rsj as in (7)/(8). The results show that the reading time of targets was no longer affected by the PP’s position: instead of the interaction between PP’s position and the target pronoun, there was an interaction between the focused character and the target pronoun.

- 7) *Vincent/Francine prépare un master de gestion à Paris-Dauphine. Les programmes comprennent des enseignements théoriques et des mises en situation. /Selon Francine,/ Vincent a trouvé /, selon Francine,/ un stage dans une agence de publicité. Il/Elle a mis à contribution proches et relations du secteur en début d'année...*
- 8) *Vincent/Francine is taking a Master in Management at Paris-Dauphine. The syllabus includes theoretical knowledge and applied skills. /According to Francine,/ Vincent found /, according to Francine,/ an advertising agency internship. He/She asked some friends and colleagues for help early this year...*

The results of the first expt. are similar to those reported by Gordon et al. (1993) with the Repeated Name Penalty Paradigm which they interpreted as suggesting that “initial and non subject” or “non-initial and subject” entities are equally prominent. The second expt., however, shows that the preceding results are too robust to be attributed only to surface order. The third expt. suggests that the semantic affinity between the evidential PPs and the VP of subsequent utterances could enhance the preposed PP’s effect: opinion VPs seem to be primed by preposed evidential PPs, inducing a possible narrative transformation from an objective story about the subject referent to a story about the speaker’s inner thoughts. Altogether, these results tend to show that preposed PPs fulfil a specific framing function (Charolles, 1987) in certain conditions, which further studies will develop.

#### References:

- Charolles, M.B. (1987), Spécificité et portée des prises en charge en "selon A". *Revue Européenne des Sciences Sociales*, Genève, Droz, T XXV, n°77, 243/271.
- Gernsbacher, M. A., Hargreaves, D. J., Beeman, M. (1989), Building and Accessing Clausal Representations: The Advantage of First Mention versus the Advantage of Clause Recency. *J.M.L.*, 28, 735-755.
- Gordon, P.C., Grosz, B., Gilliom, L. (1993), Pronouns, Names and the Centering of Attention in Discourse. *Cognitive Science*, 17(3), 311-47.
- Grosz, B.J., Joshi, A.K., & Weinstein, S. (1983), Providing a unified account of definite noun phrase in discourse. *Proceedings of the 21<sup>st</sup> Annual Meeting of the Association of Computational Linguistics*, Cambridge, MA.
- Schrepfer-André, G. (2005), Incidence des formes de reprise du SN régime des SP en *selon X* énonciatifs sur leur portée phrastique et textuelle. *Langue Française*, 4: 80-94.