


Gestural Presuppositions*

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For Ebert and Ebert 2014, co-speech gestures contribute supplementary meanings, analyzed as 'appositive impositions' (AnderBois et al. 2015). Thus (1)a (with the gesture co-occurring with the bracketed part in bold) is analyzed as in (1)b-c, with p corresponding to at-issue and p^* to non-at-issue proposals. We suggest that some gestural enrichments might be better analyzed as presuppositions – which makes them comparable to iconic enrichments in sign language, as in Schlenker et al. 2013.

- (1) a. I brought  **[a bottle of water]** to the talk.
b. At-issue: the speaker brought a bottle of water to the talk
Non-at-issue: the bottle is big
c. $\exists z \wedge z = [\text{bottle } g] \wedge \exists x \wedge \text{bottle}_p(x) \wedge \text{SIM}_{p^*}(x, z) \wedge \text{bottle}_{p^*}(z) \wedge \text{bring}_p(\text{speaker}, x)$

Appositives are highly restricted in downward-monotonic environments, but some gestural enrichments aren't, as suggested by (2)a-(3)a-(3)a, which contrast with (2)b-(3)b-(4)b. Furthermore, for some speakers these gestural enrichments project like presuppositions: they 'project out' of conditionals/modals, and yield universal inferences under *no NP* (Chemla 2009). We suggest that for these speakers they might be presuppositions that can be justified on the basis of the clause or predicate they attach to; underlining gestural presuppositions, (2)a/(3)a have the LFs *if* $p \wedge p'$, *q/unlikely* $p \wedge p$, and both yield the presupposition $p \Rightarrow p'$; while (4)a has the LF $[No P](Q \wedge Q')$ and yields $[Every P](Q \Rightarrow Q')$.¹ For other speakers, the gestural contributions seem to be assertive and do not 'project out' – which is also inconsistent with a standard supplementary behavior.

- (2) a. If the session chairman brings  **[a bottle of beer]**, I'll feel free to bring one too.
=> if the session chairman brings a bottle of beer, it will be a small one.
b. ? If the session chairman brings a bottle of beer, which is  **[this]** large, I'll feel free to bring one too.
- (3) a. It's unlikely that the next speaker will bring  **a bottle of beer** to his talk.
=>? if the session chairman brings a bottle of beer, it will be a large one
b. #It's unlikely that the next speaker will bring a bottle of beer, which is  **[this]** large.
- (4) a. No philosopher brought  **[a bottle of beer]** to the workshop.
=>? when a philosopher brings a bottle of beer, it is usually a large one
b. #No philosopher brought a bottle of beer, which is  **[this]** large.

Potts 2005 argues that supplements cannot contain bound elements. But we believe that gestural enrichments can – just like presupposition triggers: in (5), the 'high glasses' gesture interacts with a quantifier binding a pronominal variable (it is somewhat similar to sign language agreement verbs or pronouns pointing upwards, which trigger presuppositions that interact with quantifiers, as in Schlenker et al. 2013).²

¹ Here P denotes $\lambda x. x$ is a philosopher, Q denote $\lambda x. x$ brought a bottle of beer, and Q' denote $\lambda x. [\text{ly: } y \text{ is a bottle of beer and } x \text{ brought } y] \text{ is large}$. To avoid technical complications, we can take ι to be a non-presuppositional maximality operator. Alternatively, we can take the underlined expression to correspond to an E-type pronoun whose presupposition is satisfied by the first conjunct. This is thus a presupposition within a presupposition, since Q' is itself presuppositional; a similar case can be seen in *Did [every student]_x bring a bottle of Champagne and pop its cork?*, where *its cork* goes proxy for *the cork of the bottle of champagne that x brought*. (Thanks to E. Chemla for suggesting that we clarify these points.)

² The sentence in (5) also triggers a presupposition that each of the five guys was tall. The universal inference obtained in (4)a suggests that the co-speech gesture under *[no NP]* can indeed trigger such an inference. Still, there might be a confound in (5), as 'x allowed me to

- (5) *Context: Context:* The speaker uses body-oriented psychotherapy to help people who are self-conscious about their height deal with their emotions. He usually encourages participants to remove non-essential accessories.





I had five guys standing in front of me, and not a single one allowed me to remove [his glasses].

A supplementary approach could deal with (2)-(3)-(4) by taking the gestures to behave like the appositives in b., but with *which would be* replacing *which is*; the question is why this option should be available. Alternatively, it could analyze the gesture in (5) as a supplement modifying the verb (with unsaturated argument slots), but the interaction with quantification would need to be worked out.


Finally, the analogy with sign language iconic enrichments is further highlighted by the behavior of gestural enrichments under *only* and ellipsis: in both cases, the gesture can be ignored in the focus dimension, just as iconic enrichments in Schlenker 2014.

- (6) I had two guys standing in front of me, one of them very short and the other one very tall.

a. The tall one allowed me to remove  [his glasses], but the short one didn't.

b. The tall one allowed me to remove  [his glasses], but the short one didn't allow me to remove #  [his

glasses]/ok  [his glasses])

c. Only the tall one allowed me to remove  [his glasses].

References

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Note: An earlier version of this manuscript included the claim that gestural enrichments do not have to obey a 'non-triviality requirement', and behave in this respect like presuppositions and unlike supplements. But the initial judgments appear to be

...x...' might already come with a presupposition that 'it was possible for me to ... x...'. With a 'high glasses' component in the *to*-complement, this would already entail that 'x was tall'; the normal interaction of presuppositions and quantification would then explain why a universal inference is obtained in the end.

in error, and were contradicted by several native speakers; in this respect, these speakers' judgments provide an argument *for* Ebert and Ebert's supplementary analysis.