## Rethinking Coercion as a Cognitive Phenomenon: Data from Processing, Frequency, and Acceptability Judgments

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**Coercion** is defined as the resolution of semantic incompatibility between a construction and a lexical item occurring in it (Michaelis 2005). Coercion plays an important theoretical role in Construction Grammar (CG): it is a theoretical device that accounts for how lexical items can occur in constructions whose semantic specifications they do not fit. For example, the English Caused Motion Construction signifies the motion through space of a subject entity; but it occurs with verbs not entailing motion (*kick, sneeze*). CG's claim is that the construction itself provides the meaning of motion in examples like *I kicked the ball across the room* (Goldberg 1995): the verbal semantics, lacking a motion specification, is here coerced into a motion sense not independently coded by the verbs. Similar accounts are given by Michaelis for other constructions.

For such an important theoretical notion, the conceptual foundations of coercion remain surprisingly unexplored. For example, coercion is discussed by Michaelis in terms of changes of binary feature specifications that yield semantic compatibility from incompatibility. CG itself, however, was developed within a larger framework that actually rejects feature specifications in favor of frame semantics, with flexible, situation-based, and gradient semantic specifications.

Starting from the Usage-Based Model (UBM) of language (Langacker 1988), we argue for a view of coercion that makes sense from a cognitive standpoint and follows from other tenets of the model. If coercion, as we argue, is essentially a cognitive resolution process during semantic interpretation, then greater semantic incompatibility between lexical items and host constructions should require greater resolution effort, hence more processing time. UBM holds that linguistic units are combined during use in context, based in part on their categorization according to conventional syntactic-semantic specifications. This leads to a similar processing interpretation: greater semantic incompatibility should lead to more difficulty in categorizing a verb-construction combination as a valid member of the constructional category, and hence should require more processing time (Kemmer 2008). Third, in a UBM, constructions and lexical items are learned bottom-up from instances of use. Thus speakers' linguistic knowledge is sensitive to frequency patterns of co-occurrence of lexical items with their host constructions. Frequency is well known in other domains to correlate with ease of processing, and we predict that it should do so also for lexical/constructional combinations. Finally, because a UBM is a dynamic system that interacts with context, it predicts semantic gradience and gradient acceptability judgments. These are expected to relate to differences in degree to which lexical items and their host constructions are semantically compatible. The results of 3 experiments from processing, frequency of collocation in corpora, and acceptability judgments for the ditransitive construction support these predictions for correlations among these 3 phenomena, and lead us to argue for viewing coercion as a cognitive process of semantic resolution in language comprehension. Speakers must dynamically integrate conventional semantic interpretations of both lexical and constructional units along with contextual information that affects the interpretation of either or both. It is shown that although constructional semantics does affect lexical interpretations as suggested by Michaelis' "override principle" (constructions coerce lexical items but not vice versa), it is nevertheless possible for lexical semantics to affect the interpretation of a construction.

Considering coercion against these tenets leads to a coherent view of it that is empirically supported through data derived from processing time, frequency, and acceptability judgments. The significant correlation found among these phenomena, showing their empirical relation to one another, thus supports this dynamic and gradient view of the nature of coercion.

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