

## The meaning of time. Polysemy, usage and conceptual structure

Dylan Glynn  
Université Paris 8, St-Denis - Vincennes  
dsg.up8@gmail.com

Keywords: behavioural profile approach, corpus linguistics, polysemy, prototype set theory

In contrast to the foundational theories of Cognitive Linguistics, Evans (2005) argues that lexical senses are discrete and that context dependent readings should be distinguished from semasiological structure *per se*. This study seeks to refute this claim by demonstrating empirically that a usage-based (Langacker 1987) and prototype-based (Lakoff 1987) approach adequately and parsimoniously accounts for polysemy. Cognitive Linguistics holds that repeated context-dependent uses result in an emergent semantic structure that varies dynamically for individual competences (Geeraerts 1993). This model elegantly integrates the role of context and variation in structure. Moreover, its accuracy can be empirically determined using corpus data and quantitative tools. With a sample of 1000 occurrences taken from the Corpus of Contemporary American English, the study examines the semasiological variation / structure of the lexeme time in contemporary American English. Using the Behavioural Profile Approach (Geeraerts *et al.* 1994; Gries 2003), the study compares the descriptive and predictive accuracy of Cognitive Linguistics' theory and Evans' theory of Principled Polysemy.

The premise tested is that an entirely bottom-up approach to semantic structure, where said structure is operationalised as the clustering of multidimensional characteristics of use, will produce a descriptively accurate account of the lexical semantics. Firstly, in order to compare the approaches, the semantic categories derived from the criteria proposed by the Principled Approach will be applied to the corpus data. These "sense" categories are discrete and so the first step will be to discern if all natural contextualised occurrences are accounted for by the senses proposed in Evans (2005). Following this, the criteria proposed by Evans will be applied to the examples, producing a set of metadata based on the principles used to propose the semantic model of the lexeme. If the combination of these criteria accurately predicts the discrete sense categorisation of the examples produced through their direct analysis, then the model demonstrates internal cohesion. The second step involves the multifactorial usage feature analysis. This will be based on Talmy's (2000) model of Plexity and Langacker's (1987) work on conceived and processed time as well as the profiling of summary and sequential scanning. A combination of these semantic features will represent the behavioural profile of the lexeme. Discriminatory statistical techniques will then be used to cluster these features, "automatically" identifying distinctive patterns that are interpreted as lexical senses. Importantly, these senses are not discrete and their relationship to each other will reflect centrality and periphery relations based on the number of shared versus distinctive features. In other words, prototype effects are inherent in the results.

Since we have no gold standard (accepted semasiological structure) against which to compare the predictive results of the two approaches, it is not possible to calculate which method better explains the semantic structure. However, we can compare and judge the two descriptions for their coherence and parsimony. If the usage-based (bottom-up) approach produces clear patterns and those patterns can be used to accurately predict categories of usage, then we can be confident that the approach is coherent. If those categories and their relations are at least as simple as the semantic model produced by the Principled Approach, then we can say that the usage-based approach produces parsimonious results. Ultimately, however, deciding whether the usage-based prototype-based theory of semantic structure or the discrete context-independent theory better explains how we structure meaning will be open to discussion and interpretation.

### References

- Evans, V. (2005). The meaning of time: Polysemy, the lexicon and conceptual structure. *Journal of Linguistics* 41: 33-75.
- Geeraerts, D. (1993). Vagueness's puzzles, polysemy's vagaries. *Cognitive Linguistics* 4, 223–72.
- Geeraerts, D., S. Grondelaers & P. Bakema. 1994. *The Structure of Lexical Variation. Meaning, naming and context*. Berlin: Mouton de Gruyter.
- Gries, St Th. (2003). *Multifactorial Analysis in Corpus Linguistics: A study of particle placement*. London: Continuum Press.
- Lakoff, G. (1987). *Women, Fire, and Dangerous things: What categories reveal about the mind*. London: University of Chicago Press.
- Langacker, R. (1987). *Foundations of Cognitive Grammar*. Vol. 1. Stanford: Stanford University Press.
- Talmy, L. (2000). *Toward a Cognitive Semantics*. Vol. 1. Cambridge: MIT Press.