

Source-Goal Asymmetry in Event Segmentation: A Comparison of English, Korean, and Mandarin

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This study explored the features of Source-Goal asymmetry (Lakusta & Landau, 2005; Lakusta & Landau, 2012; Lakusta et al., 2017; Papafragou, 2010; Regier, 2007) in event segmentation by comparing verbalization data from English (Satellite-framed), Korean (Verb-framed), and Mandarin (Satellite- or Verb-framed). We predict that Source-Goal asymmetry is robust in cross-linguistic event segmentation but not encoded uniformly across different morphosyntactic devices (verbs vs. satellites in Talmy's terms).

In the verbalization task, 20 English speakers, 20 Korean speakers, and 20 Mandarin speakers orally described "what happened" in 11 short animated videos on complex motion events involving a circle (cf. Bohnemeyer & Caelen 1999; Bohnemeyer et al., 2007) in their native languages. The subevents of [Departure], [Passing] and [Arrival] were coded and multiple comparisons of English, Korean, and Mandarin in goal-bias (one-way ANOVAs) were computed.

The results showed that Source-Goal asymmetry affected the amount of event unit information given in English, Korean, and Mandarin—i.e. the asymmetry persisted despite the typological differences amongst the three languages. Notably, the asymmetry was less evident in English as compared to Korean, since path adpositions might be the only means of encoding path information in English but not in Korean (path verb and path adpositions were both used). The asymmetry was significantly less evident in Mandarin as compared to Korean ($F(1, 57) = 5.31, p = .006$). The Source-Goal asymmetry might be diminished in or absent from uses of the Mandarin path verb system either because verbs (unlike adpositional phrases) cannot be omitted, and/or because Mandarin possesses dedicated source and goal path verbs.

Our findings suggest that a shared bias in spatial language interacts with language-specific aspects of spatial encoding, and this interaction shapes event segmentation across languages (Gerwien & Stutterheim, 2018)..

References

- Gerwien, J., & Stutterheim, C. 2018. Event segmentation: Cross-linguistic differences in verbal and non-verbal tasks. *Cognition*, 180, 225–237.
- Lakusta, L., & Landau, B. 2005. Starting at the end: The importance of goals in spatial language. *Cognition*, 96, 1–33.
- Lakusta, L., & Landau, L. 2012. Language and memory for motion events: Origins of the asymmetry between goal and source paths. *Cognitive Science*, 36, 517–544.
- Papafragou, A. 2010. Source-goal asymmetries in motion representation: Implications for language production and comprehension. *Cognitive Science*, 34, 1064–1092.
- Regier, T., & Zheng, M. 2007. Attention to endpoints: A crosslinguistic constraint on spatial meaning. *Cognitive Science*, 31, 705–719.
- Talmy, L. 2000. *Toward a Cognitive Semantics (Volume II): Typology and Process in Concept Structuring*. Cambridge, MA: MIT Press.