## Usage-based approaches to syntax and semantics

Convenor: Stephen Wechsler

This section presents usage-based approaches to explaining grammatical complexity and the diverse forms that languages take. The basic assumption underlying the usage-based paradigm is that grammar emerges out of patterns of usage. On the semantic side, those patterns reflect the thoughts and feelings that people choose to convey in their utterances, which in turn depend upon their interests and goals, and on the role of an utterance as a social act woven into the text of human society. On the formal side, those patterns are subject to forces involving phonological simplicity, information theoretic efficiency, surprisal, discourse coherence, and other factors. Patterns of usage are studied in an attempt to identify the influences just noted, and to show how mere tendencies can be systematically amplified through repeated frequency-based learning, until they develop, in some cases, into rules of grammar.

Usage-based approaches have been applied successfully to studies in morphologization, such as the incorporation of argument pronouns or light verbs into a verb, or the fusing of function and content words. Studies of phrase structure and word order rules have identified factors affecting their emergence, such as cooccurrence frequency and dependency length. Usage-based research has shed light on grammaticalization, that is, the development of content words into function words that signal constructions, and on the semantic interpretation of the resulting constructions (for example, the perfect aspect constructions signaled by auxiliary verbs). Among the many other topics that have been addressed are the semantic interpretation of utterances as expressing objective versus subjective judgments, and idiosyncratic, rare or restricted constructions. The degree of fixedness versus productivity of constructions, in particular, has been shown to have broad implications for grammar, acquisition and even the typology of aphasic disorders. Biases related to information theoretic efficiency have been proposed as the basis for the typology of word meaning, the semantics of quantifiers, compositionality, the syntax-phonology interface and other important aspects of grammar. What ties this work together is a belief that the origins of grammar lie in language use itself, and so we begin to understand grammars by examining usage. This section of the conference will present a sample of work taking this perspective on the broad research goal of explaining the grammatical forms and structures of the languages around us.