Abstract

One of the currently debated topics in Natural Language Processing is the problem of semantic role labelling. Given a sentence like "I want to reserve a flight from Geneva to New York", how do we determine automatically that "from Geneva" is the source of the flight and "to New York" is the destination? The solution to this problem lies at the heart of all applications that require language understanding, such as dialogue systems, question answering, or machine translation. Recent successes of machine learning methods in statistical parsing and lexical acquisition pave the way to a learning approach for this problem too. In this presentation, I will motivate a probabilistic model of joint learning of syntactic trees and semantic role labels, and will illustrate its computational and linguistic properties. This method achieves competitive results.