In this talk, I will present the Paris 7 treebank for French and its annotations for words, constituents and grammatical functions (Abeillé et al 2003), as well as some of its applications. As one of the results of the corpus, one can cite a version with lexical dependencies (Candito et al 2010, Crabbé and Candito 2008), a dictionary of verb valencies (Treelex: Kupsc Abeillé and 2008) and several automatic analyzers. Extensions of the project include the annotation of referents of pronouns, support verbs, and semantic verb classes. Finally, I will also present a draft of syntactic annotation of spoken corpora (such as radio and television transcripts) based on the same annotation schemes, in collaboration with Benoit Crabbé.