Opponents review of master thesis

Opponent: Jiří Hana

Thesis: An online collaborative platform for the development of empirical grammars

Author: Antonio Fernando García Sevilla

The thesis describes a cloud-based environment for a collaborative development of grammars. It aims to fulfil several goals, mainly to provide an accessible system supporting the development of complex formal grammars by non-technical linguists. It is accompanied by a sample grammar of Spanish in the formalism of Head-driven Phrase Structure Grammar (HPSG).

The system is modular and well designed. It is a server-client system, with a rich client. The architecture and code is very well explained and documented. The whole system is programmed in javascript. A substantial functionality is provided by Borjes and Borjes-react, open-source libraries developed by the author as well. It is nice to see that the author does not try to reinvent the wheel: the server and client communicate via REST API and he uses multiple existing libraries and frameworks from react for user-interface to log4js for logging. The server runs on Node.js.

One minor issue: I missed a more detailed discussion explaining why javascript was used for the whole system and not just for the presentation layer.

It was a real pleasure to read the thesis. It is well structured and easy to follow. In addition to the system per se, it nicely discusses also the motivation behind it and relevant context. Its English is virtually flawless. Needless to say it fulfils the standard formal requirements such as proper references.

In sum: the thesis develops (describes and documents) a substantial, well designed and useful piece of software. It not only demonstrates the software-development abilities of the author, but the resulting system is viable product that can be already at its present state be used by linguists and their students to develop and teach formal grammars (and provide feedback and testing to further improve it).

Recommendation for defense:

For the above reasons, I recommend the thesis for defense.

Contest of students' theses:

An excellent thesis, appropriate for the contents of students' theses: YES

Prague, January 31, 2016

Jiří Hana