

Czech Technical University in Prague
Faculty of Electrical Engineering

Department of Computer Science

DIPLOMA THESIS ASSIGNMENT

Student: **Dávid Ocetník**

Study programme: Open Informatics
Specialisation: Software Engineering

Title of Diploma Thesis: **Mobile client for IoT**

Guidelines:

Review the platform independent frameworks for mobile application design and choose one for a development of a mobile application controlling IoT smart spaces.

The app will recognize the nearby wireless smart space HUB
The app will support identification and authentication
Upon HTTP GET the HUB will return a hypermedia type
The hypermedia type will be walkable allowing discovery of all resources (sensors/actuators)
The app will self configure and initialize a UI
The app will allow also a user to add simple mobile apps.


Implement and test the app with an emphasis on usability.

Bibliography/Sources:

- [1] Samuel Greengard, The Internet of Things, The MIT Press Essential Knowledge series, March 20, 2015
- [2] Richardson, Leonard; Amundsen, Mike; Ruby, Sam, Restful Web Apis, Oreilly & Associates Inc, 2013

Diploma Thesis Supervisor: Ing. Jan Šedivý, CSc.

Valid until the end of the summer semester of academic year 2016/2017


prof. Dr. Michal Pěchouček, MSc.
Head of Department




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Prague, February 19, 2016