

Thomas Donahue

 donahut.github.io
 redacted for web
 donahut.se@gmail.com
 github.com/donahut

Experience

- Mar 2014 – **Robot Software Engineer**, *Aldebaran Robotics*, Boston, MA
Member of a small agile team, as well as apart of a larger multinational team with others headquartered in Paris and Shanghai. *Select accomplishments*: Designed and built autonomous office companion/receptionist (regularly demoed for external clients). Developed and implemented touch sequence gesture extraction algorithm and devised API to allow for future extensibility. Generated dynamic natural language dialogs by combining external knowledge bases, knowledge extracted from interactions over time and bootstrapped knowledge.
Keywords: Python, Robotics, HRI, NLP/NLG, JS, HTML/CSS, C++, Scrum, Linux, Git
- 2012 - 2014 **Research Assistant**, *Human Robot Interaction Lab*, *Tufts University*, Medford, MA
Implemented distributed notification system for the ADE robotics middleware. Overhauled system GUIs for ADE middleware with improved efficiency and speed, as well as a simplified UX. Developed data-mining tools for rich audio and video corpora and annotations. Designed and built web-survey platform for multiple HRI studies. Designed, conducted and analyzed multiple HRI studies investigating multiple factors within human-robot teams.
Keywords: Java, Robotics, HRI, NLP/NLG, PHP, JS, HTML/CSS, Linux, Git, SVN, \LaTeX , R
- 2012, 2013 **Teaching Assistant**, *Computer Science Dept.*, *Tufts University*, Medford, MA
Maintained automated testing suite and grading system used by dozens of teaching assistants for introductory C++ course. Provided instruction to students during lab sections as well as office hours. Graded homework and exams.
Keywords: C++, Shell scripting, Linux
- 2010 - 2012 **Research Assistant**, *Computer-Human Interaction Lab*, *Bowling Green State University*, Bowling Green, OH
Part of a team that developed a novel, tangible password input system. Designed, built and tested an alternative UI for World of Warcraft for the visually impaired community. Helped build a series of web-tools for use in undergraduate Geology courses. Investigated the learning benefits of and trade-offs between mouse, touch and tangible input systems via novel deduction puzzle/game.
Keywords: Java, C++, HCI, Tangible/Touch UIs, Accessibility, Windows
- 2008 - 2010 **Research Assistant**, *Rhythm, Attention and Perception Lab*, *Bowling Green State University*, Bowling Green, OH
Independently designed and built neural-network in MATLAB that modeled human auditory tone categorization.

Technical Skills

	Languages		Tools
Core:	Java, Python, C++	src Control:	Git, Subversion
Experienced:	JS, Clojure, PHP, HTML/CSS	Build:	Ant, Leiningen
Exposure:	C, R, SQL, Scheme, SML, Prolog, MATLAB, CUDA	Editors:	Emacs, IntelliJ IDEA, Visual Studio
		Writing:	\LaTeX , Org-mode
Platforms			
Linux:	Preferred OS. Considerable Linux development experience, and comfortable at the command line shell		
Robotics:	Extensive experience working with Aldebaran's NaoQi robotics middleware, as well as ADE – a research focused distributed, multi-agent robotics middleware. Familiar with ROS.		

Education

- 2012 - 2014 **Graduate studies in Computer Science**, *Tufts University*, Medford, MA
Withdrew in good standing from Computer Science & Cognitive Science Joint-Ph.D. program
- 2011 - 2012 **M.S. in Computer Science**, *Bowling Green State University*, Bowling Green, OH
- 2007 - 2011 **B.S. in Computer Science & Psychology**, *Bowling Green State University*, Bowling Green, OH
Minor in Mathematics, Cum Laude