JESSY CEHA · CV

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Information 5195806977

CITIZENSHIP Canadian, Dutch LANGUAGES English, Dutch

EDUCATION

University of Waterloo, Waterloo, ON, Canada

Ph.D. in Computer Science: Human-Computer Interaction, Sept. 2017 - present

Advisors: Edith Law (CS) and Dana Kulic (ECE)

Thesis Proposal: Curiosity-Driven Learning

Key Courses: Experimental Design (STAT830), Empirical Software Evolution (CS846),

Human-AI Interaction (CS889)

University of Groningen, Groningen, the Netherlands

M.Sc. in Human-Machine Communication, *cum laude*, 2014 - 2016 Advisor: Marieke van Vugt (Institute of AI & Cognitive Engineering)

Thesis: Investigation into the Enhancement of Voice Perception: with simulations of

cochlear implants and bimodal hearing

Key Courses: Auditory and Visual Perception, User Models, Cognitive Modeling, Neuro-

Ergonomics, Computational Discourse, Semantic Web Technology

Honours Master in High Tech Systems and Materials, 2014 - 2016

UGroningen, in cooperation with companies of the Innovation cluster Drachten (Philips, Astron, BD Kiestra, Perkin Elmer etc.) aims to equip talented, motivated students with the knowledge and skills needed to excel at the frontiers of High Tech Systems and Materials. This 1.5 year programme worth 20 ECTS is followed in addition to the standard Master's programme.

University of British Columbia, Vancouver, BC, Canada

B.Sc. in Cognitive Systems: Cognition & Brain, with Distinction, 2009 - 2014

Honours and Awards University of Waterloo Provost Doctoral Entrance Award for Women, Sept. 2017 University of Waterloo Entrance Scholarship, Sept. 2017

Avril McDonald Prize, August 2016

ACADEMIC CONTRIBUTIONS Ceha, J., Chibberr, N., Goh, J., McDonald, C., Oudeyer, P-Y., Kulic, D., and Law, E. (2019). Expression of Curiosity in Social Robots: Design, Perception, and Effects on Behaviour. In *CHI Conference on Human Factors in Computing Systems Proceedgins (CHI 2019) May 4-9, 2019, Glasgow, Scotland, UK.* ACM, New York, NY, USA, 12 pages.

Law, E., Ceha, J., Kulic, D., Oudeyer P-Y., and Roy, D. (2019). Participatory design for identifying the roles of robots in learning activities. In preparation.

Baskent, D., Luckmann, A., **Ceha, J.**, Gaudrain, E., and Tamati, T. N. (2018). The discrimination of voice cues in simulations of bimodal electro-acoustic cochlear-implant hearing. *The Journal of the Acoustical Society of America*, 143(4), pages 292-297.

Ceha, J. M. (2016). Investigation into the Enhancement of Voice Perception: with simulations of cochlear implants and bimodal hearing. (Masters thesis)

Theta-band phase locking after attentional blink training. Ceha, J., Buwalda, T., Taatgen, N., Borst, J., and van Vugt, M. December 2015. Poster presentation at the 15th NVP Winter Conference on Cognition, Brain, and Behaviour. The Netherlands.

SKILLS AND EXPERIENCE

- Teaching & Instructional Assistant (University of Waterloo 2017-2018: CS105, 106, 349)
- Matlab, Python, HTML, CSS, Processing, Java, OpenViBE, R, SPSS, Arduino, DrRacket, ROS
- User Studies
- Voice Assistants (Amazon Alexa)/NAO robot
- Eye-Tracking/Pupil Dilation & Cognitive Modelling
- Electroencephalography (EEG), Electromyography (EMG) & Brain-Computer Interfaces (BCIs)
- Product Design & Development (consumer electronics at Philips)

Research

Teachable Robot Project, Human-Computer Interaction Lab, University of Waterloo 2017 - present

- Curiosity-driven learning with educational social robots
- Co-designing educational robot peers with teachers
- Neural correlates of curiosity using EEG

Speech Perception, Dept. of Audiology, University Medical Centre Groningen 2015 - 2016

- Psychoacoustic experiments with simulations of bimodal cochlear-implant hearing
- Developed an EEG BCI for improving auditory speech perception in cochlear-implant users

Cognitive Modelling, Institute of AI and Cognitive Engineering, University of Groningen 2014 - 2016

• EEG study on theta oscillation phase-locking after attentional blink (AB) training

The "eh" Lab, Dept. of Linguistics, University of British Columbia 2014

• Behavioural study on the syntax of speech acts

OUTREACH

Volunteer Educational Assistant, Kitchener, Canada, Feb - April 2019 Prueter Public School

Peer Reviewer for CHI Conference, 2018 Reviewed full-length (10 page) manuscript

SHAD, Waterloo, Canada, July 2018

Led a 3-day workshop on Human-Robot Interaction for an annual Canadian summer enrichment program for high-achieving high school students

GIRLsmarts4tech, Waterloo, Canada, June 2018

Day-long workshops aimed at inspiring girls to explore technology

Best Buddies, Waterloo, Canada, Oct. 2017 - May 2018 Weekly volunteering with individuals with developmental or intellectual disabilities

Girls in STEAM event, Waterloo, Canada, Jan. 2018 Role model for elementary & middle school girls

Women in Computer Science (WiCS) Event, Waterloo, Canada, Nov. 2017 Mentor to undergraduate CS students

Learning Buddies Network, Vancouver, Canada, Jan. - April 2014 Elementary school math tutor