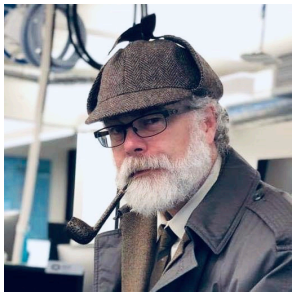
HUMANITY CENTERED ROBOTICS INITIATIVE

BROWN

Nick Porcino
Facebook Reality Labs

"An Architecture for Emotional Intelligence in Synthetic Characters"



Thursday, February 21, 2019
12:00-12:50
CIT 477 Lubrano

Abstract: Research into biological brain structure in the 1980's led to the development of a novel architecture for the control of robotic and avatar behavior. An interacting network of intentions, needs, senses, and behavioral state awareness looped through environmental feedback yield engaging and lifelike behavior. These principles fed into the Tamagotchi's breakthrough product design and are more relevant today than ever as synthetic characters become more and more a part of everyday life.

Nick Porcino has been working at the intersection of art and engineering since the days of 8 bit computers and consoles. Early research into computer graphics, neural networks and robotics in the 1980s led to career in developing those technologies for toys, game engines, film production, mobile phones, and AR/VR. He has developed toys at Bandai, tools and engines for dozens of games and films at Disney, Lucasfilm, and Industrial Light and Magic, developed tools and frameworks for interactive 3d for iOS and macOS at Apple, spearheaded a collaboration between Pixar and Apple to bring their scene description technology to everyone, and is currently working to develop digital human avatars at Facebook Reality Labs.

Host: Peter Haas/HCRI and co-sponsored by the Conference for Research on Choreographic Interfaces at Brown University